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THE TRANSCULTURATION OF THE AMERINDIAN PIPE/TOBACCO/SMOKING COMPLEX AND ITS IMPACT ON THE INTELLECTUAL BOUNDARIES BETWEEN "SAVAGERY" AND "CIVILIZATION," 1535-1935

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ALEXANDER D. VON GERNET

A DISSERTATION SUBMITTED TO THE FACULTY OF GRADUATE STUDIES AND RESEARCH IN PARTIAL FULFILLMENT OF THE REQUIREMENTS FOR THE DEGREE DOCTOR OF PHILOSOPHY

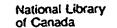
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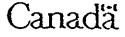
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#### ABSTRACT

While the sixteenth-century transculturation of tobacco was an event of momentous significance in European and Amerindian history, no thorough, anthropological analysis of its effects has heretofore been attempted. This may be attributed partly to traditional acculturation models which have tended to emphasize only changes inflicted on native populations and have often failed to contextualize natives and newcomers within a single bilateral, historical trajectory. This study surveys the effects of smoking on European culture and on colonial activities in followed by America. This is an extensive scrutiny of ethnohistoric and archaeological evidence relating to the use of pipes and tobacco at all socio-political, economic ideological levels of contact between Europeans and and and North American Indians. While sharing the pipe fortified native institutions and served as a lubricant in relations between two very different peoples, it eroded the intellectual boundaries between "savagery" and "civilization." The final chapters of the study trace the reactions to this erosion in both academic and popular discourse.

### RÉSUMÉ

Bien que la transculturation du tabac au 16e siècle ait constitué un événement lourd de signification dans l'histoire européene et amérindienne, on n'en a pas, jusqu'à date, entrepris d'analyse anthropologique profonde des effets. Cette lacune partiellement s'explique par les cadres traditionnels d'acculturation qui tendent à accentuer uniquement les changements imposés aux populations indigènes et ont négligé de contextualiser, à l'intérieur d'une seule trajectoire historique bilatérale, les indigènes et les nouveaux arrivés. Cette étude se donne pour but d'examiner les effets du tabac sur la société européenne et sur les activités des colonies américaines. On examine ensuite des documents ethnohistoriques et archéologiques portant sur l'usage de la pipe et du tabac à tous les niveaux de contact (socio-politique, économique et idéologique) entre les Européens et les Amérindiens. Alors que partager la pipe a fortifié les institutions indigènes et a servi de "lubrifiant" dans les rapports entre deux peuples bien distincts, cet acte a réduit les frontières intellectuelles entre "les sauvages" et "la Les derniers chapitres de l'étude tracent les civilisation". réactions devant cette détérioration des frontières dans les discours savant et vulgaire.

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Bruce Trigger deserves a special thanks for serving as my thesis advisor, and for creating the intellectual environment in which I could mature as a professional anthropologist. He, perhaps more than any other individual, is the reason I made Montreal my home for so many years. The intellectual environment would not have been complete without the rest of the staff of the Department of Anthropology, or without the many seminars and informal discussions I have had with my fellow graduate students.

The manuscript has been greatly enhanced by the proof reading and comments of Bruce Trigger, Toby Morantz, George Vaia and Dorothea Helmer. The few errors which might remain, must be attributed to the magnitude of the project and the imperfection of my word processing skills.

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I wish to thank my parents and sisters, who expressed confidence in me, despite struggling to understand how anyone could still be a student ten years after graduating from high school. Finally, I must thank the two individuals without whom the past year would not have been the most successful of my career: my wonderful wife and companion, Dorothea, and our dear friend George. To both of you, I dedicate this work.

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### CHAPTER ONE

### INTRODUCTION

### A) PROJECT ORIGINS AND DEVELOPMENT

This work had its origin in the down-to-earth experience of excavating Iroquoian archaeological sites when I was an undergraduate in the late 1970s. Among the pottery shards, projectile points and bone tools recovered, were peculiar little artifacts of clay or stone which had been hand-crafted into a bewildering array of shapes and designs. While the morphological mysterious remained compelled novice embellishments and excavators to gape with wonder, the function of these prehistoric objects was clear. They were smoking pipes.

Meanwhile, I was pursuing a degree in symbolic anthropology at the University of Western Ontario where I learned, among other things, that in many societies even the most mundane behaviors and cultural productions often had extraordinary significance to either the participant or the observer. On campus there were numerous professors (both male and female) who filled offices and lecture halls with odiferous pipe-smoke. I could never escape the feeling that this activity was somehow an ostentatious Whether consciously promoted by display of profundity. the smoker or not, the feeling was shared by many, and I was determined to one day explore its significance and cultural foundation.

Different interests took me to Egypt where I did fieldwork in the Dakhleh oasis of the Western Desert. Once again I was reminded of tobacco. Amidst the frightening stratigraphic jumble characteristic of the region, appeared strangely familiar fragments of smoking devices dating from the 1600s. I left North Africa with a lasting impression that something remarkable had . human history occurred in between the fifteenth-century deposition of pipes in the Canadian wilderness and their seventeenth-century occurrence in the middle of the Sahara.

anthropologists we had been taught to appreciate the As profound technological, social and ideological changes in Amerindian life which had taken place throughout the period of European colonialism in North America. Yet, here was an example of influence in the opposite direction. The contribution was often acknowledged, though only as a minor appendage to the usual list of agricultural products that included maize, potatoes and In an age of Surgeon Generals' Reports it had become cacao. fashionable to avoid praising the American Indian for having introduced the use of an apparently carcinogenic weed to the world. One contributor to Chiappelli's marvelous collection of essays on First Images of America bluntly concluded that "tobacco was the very worst gift of the New World to the Old. "<1> the strength of a Recognizing that this merely reflected twentieth-century ideology of health, I remained convinced that the impact of tobacco throughout history went far beyond the pragmatism of medical controversies and had had a much wider effect on human thought. After all, the origins and use of

**Nicotiana** was in many respects highly unusual, and anthropologists had long understood that the anomalous is often a subject of intense cultural attention.

By 1981 the focus of my academic labors was directed towards my master's thesis. I blended my archaeological interest in site formation processes with my anthropological fascination with smoking to produce a detailed study of nearly 4,000 pipe fragments recovered on a single prehistoric Huron site in Ontario.<2> My intention was to demonstrate that this artifact class could reveal valuable information about prehistoric lifeways, and that researchers should not restrict its role to of a diagnostic tool in culture-chronological that reconstruction. Complementing the archaeological data was an aggregate of seventeenth-century missionary accounts which described the Iroquoian use of pipes and helped to further illuminate the evidence from the ground.

The sheer quantity of pipe fragments on Amerindian habitation sites, and the frequent allusions to native smoking and tobacco rituals in early European accounts, piqued my curiosity as never before. By graduation I had decided to initiate a massive research project on the subject. During the next five years of full-time doctoral studies I compiled a reference library of 40,000 articles and books containing information on all aspects of the pipe/tobacco/smoking complex of the American Indian. Although the prodigious task of collecting and perusing these sources aroused suspicion among fellow students that I had entered the fringes of lunacy, I managed to maintain control of the data base by treating the published sources in much the same way that I would treat artifacts in an archaeological assemblage: as cultural productions from which patterns of meaning could be derived to produce a coherent story of anthropological interest. What had originally been envisioned as a routine literature review for a doctoral dissertation, eventually evolved into the Amerindian Pipe/Tobacco/Smoking Project which has spawned a variety of different studies.

The wider project has a number of interrelated goals. In addition to the complete documentation of the Amerindian use of tobacco in the historic and ethnographic records of North provides a computerized data bank for the America, it cross-cultural comparison of prehistoric pipes recovered on With these resources it is possible to archaeological sites. address questions about the changes and continuities of a single cultural trait throughout the continent, over a period of centuries. The comparative investigations are not only shedding on North American culture history, but are providing light insight into the complexities of Amerindian ideology.

While the results of these studies are preliminary, one observation deserves mention. The first thing that impresses anyone who tackles the literature, is that **Nicotiana** was used in every conceivable context by the great majority of native peoples in both North and South America. Usage was not restricted to either highly ceremonial occasions, or to routine daily life.

Rather, it bridged, what in Western parlance is generally referred to as, the "sacred" and the "profane." It is clear that, on one level, widespread use was linked to the same physiological factors contributing to Western smoking, such as nicotine addiction, stimulation of cognitive functions and the deadening of hunger. On another level, tobacco use had profoundly spiritual connotations, was incorporated as a powerful symbol in numerous rituals and was even fed to the gods. There is scarcely a single source in the vast body of literature on the American Indian that does not at least mention tobacco.

In my reaction against logical positivism, cultural materialism and any other "ism" that espouses the discovery of nomothetic principles or truths, I tried to avoid the formulation of any clearly-defined hypotheses. I simply wanted to explore, within the strictures of my own biases, why Amerindians had invested such an incredible proportion of their symbolic thought in a solanaceous weed. An understanding of this, promised to be a significant contribution to knowledge.

From the beginning it became clear that I had to abandon traditional disciplinary boundaries. Like a Levi-Straussian **bricolage**, the story that would provide a satisfactory answer to my question could only be constructed from miscellaneous bits derived from sources as disparate as ethnopharmacology and Jesuit theology. While the result would obviously be epistemologically eclectic, I felt that this was preferable to specific forms of reductionism.

Boundaries were also soon to fall when it came to geographic or cultural areas. Originally, I had hoped to restrict the dissertation to Iroquoian-speaking peoples. To contextualize tobacco use within this linguistic family, I undertook an extensive study of Iroquoian ideology with an emphasis on their oneirology and eschatological conceptions. In these aspects I found, to my surprise, that Iroquoian beliefs were fundamentally most similar to other Amerindian groups--a conclusion contradicting the common assertion that this northeastern culture had independently developed a unique and psychologicallysophisticated theory of dreams and souls. $\langle 3 \rangle$ It seemed inappropriate to study Iroquoian tobacco use in isolation when the ideology of which it was a subset was shared by native peoples throughout the continent.

The rubric that best described the pan-American ideology was shamanism. I use this term not in the restricted "medical" sense of a "medicine man" prancing about, blowing ashes on a patient, but in Robert Lowie's wider notion of democratized power, where all individuals have at least some capacity for attaining the altered states of consciousness necessary to communicate with guardian souls and other spiritual potencies. In all Amerindian cultures investigated, I found that tobacco use was in one way or another linked to communication, transformation, acquisition of spiritual power and related shamanic concepts.

But why had native peoples selected Nicotiana as opposed to something else? I soon realized that Amerindians of the

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Northeast smoked a variety of mind-altering plant substances, presumably to produce altered states of consciousness and enhance visionary experiences. Using evidence from various disciplines and cultural contexts I was able to show that Nicotiana rustica (the potent native tobacco employed in most of eastern North America) as well as a number of other plant species were capable of producing major dissociative states, and were consumed in quantities sufficient to reach the pharmacological threshold at which most humans experience the sensation of flight or other This confirmed suspicions by other out-of-body phenomena. researchers(4) that native tobacco species might legitimately be added to the long list of 'hallucinogens' used by New World Since nicotine liberates epinephrine, norepinephrine peoples. and serotonin, its effect on the central and peripheral nervous system would have fortified any ideology that valued altered states of consciousness. It is conceivable that, through a careful regulation of alkaloid ingestion, native peoples were able to have some control in their efforts to communicate with preternatural potencies. Tobacco became popular in Amerindian ideology because it gave one the power to reach the spirit world while allowing a safe return with few ill effects.

In 1987 Peter Timmins and I published some of these thoughts in a contribution to Ian Hodder's Archaeology as Long-Term History. We attempted to give the ubiquitous tobacco use and ideological continuities, which I had found in ethnographic and historical records, a prehistoric temporal dimension.<5> We were treading on thin ice while trying to overcome a widespread and established archaeological axiom with which neither of us had felt entirely at ease: the notion that the religious and symbolic superstructure of prehistoric Amerindian culture was far less accessible to scientific inquiry than were technology, economy and modes of production.<6> Archaeological data, combined with rigorously-controlled analogical reasoning, led us to conclude that Iroquoian tobacco use was demonstrably equivalent to usages in other New World cultures not only because of the pharmacological properties of the plant, but also because deep in prehistory it had become part of an underlying ideological substratum that gives native peoples in the Americas a culture-historical unity. We were compelled to agree with the conclusions of Peter Furst, Weston La Barre and other anthropologists, that tobacco use was a logical extension of an ancient New World cultural predisposition for the use of psychoactive plants--a predisposition with roots in Mesolithic Asia.<7>

All this talk of ethnographic similarities on a continental scale and of continuities over breathtaking time periods is bound to raise the eyebrows of those still clinging to the vestiges of Boasian particularism. While I have always been a strong advocate of cultural relativism, I have often wondered why this hallmark of anthropological objectivity has so often led scholars to overemphasize differences between peoples. Surely our discipline has matured enough to appreciate that comparisons for the purposes of ascertaining similarities between cultures, no longer imply recourse to the racist ideas of 1880s evolutionism or 1920s diffusionism. My own interests and biases have led me to study cultural traits, such as tobacco-smoking, which cross-cut spatial and temporal boundaries. If I have overemphasized this, then it should be viewed as an effort to counter-balance the common propensity for accentuating cultural differences.

### B) A STUDY IN TRANSCULTURATION

In the spring of 1987 it became apparent that my original over-zealousness had led to several different doctoral dissertations being written simultaneously. The time had come to select a particular aspect of the wider research project and distil it to a manageable size. I chose to explore my earlier interest impact tangential in the of the Amerindian pipe/tobacco/smoking complex on European culture after the Columbian discovery of the New World. One of the things that had impressed me in my research was that, in the case of this complex, the continuity evident in the stream of prehistory had persisted right into the twentieth century, despite the tidal upheavals of post-contact native America. My suspicion was that this survival was not merely a function of indigenous forces but had actually been facilitated by the attitudes and actions of the very newcomers who landed on the shores of the New World. Ι sensed, moreover, that tobacco had had a significant effect on the relations between natives and newcomers and the ωn. conceptions each held about the other. What was the essence of

these attitudes, relations and conceptions?

To answer this question one must first thoroughly examine documents written by Whites about their European contemporaries and predecessors. One must explore the construction of a specific social reality in the discourse of post-contact literature--the stories Europeans told themselves about The result can only be described by what the French themselves. call **1'histoire** des mentalités.<8> This type of historiography will hopefully shed light on the beliefs that gave ideological form to the European side of culture contact.

What about the Amerindian side? The anthropological lamentation over an incomplete understanding of post-contact cultures (which left no written documentation) does have a consolation: the collection of stories Europeans told themselves about Indians. Contact of literate and pre-literate peoples inevitably results in the production of texts, by the former, about the curious customs of the latter. When these descriptions date from before the era of anthropological ethnography, they are commonly referred to as ethnohistoric accounts. Ethnohistory is providing a extremely useful in time perspective for twentieth-century ethnography and in offering a rich source of analogies for the archaeological analysis of cultural systems which are no longer observable.

Modern ethnohistory does, however, suffer under the combined weight of two problems inherited from the history of its own

The first of these is that it has too often development. considered itself a discipline rather than a methodology, and hence, has tended to separate itself from either history or anthropology. <9> Aside from the implied ethnocentricity of such a disengagement, it has become increasingly apparent that the period of culture-contact, by definition, denies the possibility of separate histories. As Eric Wolf put it, "the more ethnohistory we know, the more clearly 'their' history and 'our' history emerge as part of the same history. "<10> This was particularly true of tobacco use which, by the late sixteenth and early seventeenth centuries, was no longer part of an integrated and bounded Amerindian system, but had become a truly global Tobacco-use among natives and newcomers of North complex. America in the colonial period must be understood as part of the same historical trajectory.

The second major problem with contemporary ethnohistory is its excessive preoccupation with culture change. Trigger notes that ethnohistory "developed as the study of change among indigenous peoples, (11) and his own research stresses the internal evolution and external impositions that put Amerindian cultures in a perpetual state of flux throughout the prehistoric and post-contact periods.<12> There is no denying that considerable social, political, economic and technological changes occurred throughout the many millennia of human occupation in North America. An a priori suggestion of wholesale culture change is, however, as logically indefensible as the common nineteenth-century assumption that pre-contact native

cultures had been relatively s ble and unchanging.(13) It has, for example, already been suggested that archaeologicallyobservable changes in modes of subsistence, social composition, etc., did not necessarily lead to concomitant alterations in religion, ideology and world view. To put it simply, the study of historic culture contact must address not only questions about change but about continuity, since both are evident in the trajectory of prehistory.

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The accounts written by Europeans about Native Americans in the sixteenth and seventeenth centuries are generally seen as documenting a period of acculturation in which substantial cultural upheavals caused by European contact were superimposed upon an ever-changing pattern of native lifeways reaching back into remote prehistory. With the exception of Trigger, (14> Chiappelli, (15> Arciniegas(16> and a few other scholars who have emphasized the impact of Amerind contact on European and colonial history, this period of acculturation has been viewed primarily in terms of its effects on "traditional" **native** culture (whether perceived as inherently static or not). Relatively little has been said of the Amerind cultural elements which were **not** significantly changed in this period and which, by infiltrating and being adopted by **European** society, not only survived but grew in importance on both sides of the Atlantic.

Part of the problem is that ethnohistorical discourse has adopted the unfortunate term **acculturation** (together with its connotations of unilateralism) to describe the contact of Amerindian and European cultures. Kraus even saw in this "a new approach to the Iroquoian problem" and issued a plea for the complete reworking of the archaeological and historical material from the perspective of acculturation.<17> This appelation does not, either etymologically or in spirit, suggest the loss or uprooting of a previous culture (deculturation?) or the creation of new cultural phenomena (neoculturation?). More importantly, it de-emphasizes the bilateral exchange that is the necessary result of most contact situations.<18> Recognizing the need for a more appropriate term, the Cuban scholar Fernando Ortiz offered the neologism **transculturation** to characterize the history of contact in the West Indies.<19> Despite Bronislaw Malinowski's enthusiastic sanction of the new nomenclature,<20> it has fallen into disuse in anthropological writings.

Reviving transculturation from the neologistic graveyard (where many new but unnecessary tautologies rightfully belong) is admittedly difficult. From the outset there may be confusion with A. Irving Hallowell's equally forgotten notion of transculturalization, by which he meant

the process whereby individuals under a variety of circumstances are temporarily or permanently detached from one group, enter the web of social relations that constitute another society, and come under the influence of its customs, ideas, and values to а greater or lesser degree. A correlative term, transculturite, can then be used to designate those individuals who have undergone transculturalization. <21>

In other words, Hallowell's "transculturites" are Jennings'
"synethnics"<22> and Axtell's "White Indians."<23>

My own usage is clearly different for I am not speaking of individuals but, rather, of phenomena that transcend traditionally- delimited cultural boundaries. The phenomena do not necessarily change one culture into another but may constitute a third cultural domain in which elements of two groups in contact become part of the same interactive complex. The syncretic nature of the new complex allows indigenous elements of a pre-contact cultural system to survive the currents of history.

Those scholars interested in copper kettles, alcohol, Christianity and other components in the European "invasion" of America may wish to retain "acculturation" as a description of lop-sided culture change. Yet, to view culture contact as synonymous with acculturation is to impose an unnecessary generalization that too often implies a European encroachment on native peoples. As the following analysis of tobacco in the colonial period will hopefully demonstrate, it is not always apparent who inflicted change on whom or which side wielded more control and influence. What is presented is a study in transculturation; as such, it is not traditional "ethnohistory" or an analysis of change among indigenous peoples in the historic period, but a study of culture contact in which all sides are simultaneously envisioned both as identifiable interest groups and as parts of a single culture-historical system. The phenomenon being transculturated within this system may be referred to as the Euro-Amerindian pipe/tobacco/smoking complex.

It has been remarked that smoking was one of the few customs indigenous to America that quickly became part of European culture.<24> Ortiz suggested that, upon its first introduction into Europe, tobacco had to be transplanted into western consciences before it could be adapted to European soil and habits.<25> The resultant history, he added, "affords an example of of the extraordinary processes of one most transculturation. (26)

Few anthropologists are aware of the profound impact the New World custom of smoking tobacco had on sixteenth and seventeenth-century Europe. It is not an exaggeration to assert that no plant in the history of western civilization has affected politics, economics, morals, social life and medicine more than have species of the genus Nicotiana. The rapidity with which tobacco spread following the discovery of the New World is simply incredible and constitutes one of the most remarkable phenomena in the history of drugs, as well as in the study of cultural diffusion.<27> When European explorers penetrated the remote lands in Africa and Asia, they often discovered that tobacco had reached there before them. <28> As Rublowsky observes, "it seemed almost as if the world had been waiting for this aromatic leaf and, more important perhaps, this novel method of ingestion through inhalation of smoke." <29> The English sociologist Lord Raglan exclaimed (in pre-Coca-cola times) that "there is not a single cultural element common to all the territories and peoples of Black Africa with the single exception of tobacco."<30> Within half a century the plant had spread into remote regions

and had become incorporated into the life of virtually every culture on earth.<31>

#### C) THE DATA BASE

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When European explorers and settlers in the New World first began reporting on the strange practice of tobacco smoking, Gutenberg's wooden presses had been churning out the printed word for scarcely a generation. Books were still relatively rare and costly to produce; yet there are few important works on the discovery and exploration of the New World that do not devote some space to a discussion of tobacco. As early as 1572 the first French book devoted principally to the plant was published.<32> By 1610 Edmund Gardiner was able to say:

Many men have, many times sette foorth to the publike viewe of the world, diuers books entreating specially of one subject, and those either in praise or dispraise of the matter they wrote of, but yet amongst all writers or exscriptors there have beene in my judgement no treatises so often divulged, so greatly discoursed of, and presented to the eies of the world (especially of late time) as those, that discourse of Indian Tabacco.<33>

Since that time it has continued to be so much a subject of fascination and dispute that J. Tanner believes it "has consumed more ink and paper than have any topics other than love, religion and war."<34> When, in 1901, W.A. Penn decided to add his own history of the "Soverane Herbe" to the already staggering bibliography, his preliminary research led to a momentary fit of frustration: With probably the single exception of religion, there is no subject on which so much printer's ink and paper has been expended as on tobacco and the practice of The literature of tobacco is exceeded in smoking. quantity only by its inferiority in quality. The hundreds of volumes in all languages which tobacco has called form, with scarcely an exception, wearisome and tedious reading, whether the subject is approached from medical, moral, poetic, social, or rational а standpoint... Beside the task of reading and reviewing the books, pamphlets, poems and treatises written for and against tobacco during the last three centuries, Carlyle's 'job of buckwashing' for his 'Life of Cromwell' sinks into insignificance. It is improbable that any man ever will, and indesirable that he should, devote himself to the truly Herculean task of sifting and sorting the huge mass of nicotian printages to present an intelligible précis thereof, and to rescue from deserved oblivion the few gems of wit or wisdom that problematically are buried therein. The best and fairest method of review would be to estimate them, as a ponderous tome, by the aid of Macaulay did avoirdupois, linear, square and cubic measures. But the task, in which a modern statistician would revel, in folios, of numbering the volumes quartos and octavos, in piling them to the height of St. Paul's, in girding the earth with them, in covering Africa with the area of their pages, in dwindling Mont Blanc beside their cubic mass, and arraying in serried lines the railway trains necessary to convey the tons of tobacco books, we will not attempt.<35>

It was not long after I had decided to focus on tobacco use as a means of raising a number of anthropological concerns that the full meaning of Penn's rhetorical exaggeration began to sink in. I discovered that the New York Public Library required an entire facility, complete with its own curator, to house the George Arents Collection of early works (in twenty languages and 120 disciplines) exclusively on, or containing information about, tobacco.<36> A 2464-page, five-volume set, together with a 650-page supplement was published merely to describe the contents of this esoteric branch of the library.<37> In addition to the remarkable catalogues of this unique collection, a number of more

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modest bibliographies on tobacco literature have been published. These include Carmen Marin's compilation of 2,467 book titles<38> and Benjamin Rapaport's<39> list of over 1,700 works on the subject. To these must be added the thousands of entries in Eugene Umberger's bibliography of the periodical literature<40> and Marin's<41> compendium of 1,130 U.S. masters' and doctoral theses on tobacco.

To keep up with the geometrically-increasing contemporary world literature on tobacco, the North Carolina State University Tobacco Literature Service has, for the last thirty years, published the monthly periodical **Tobacco Abstracts**, which summarizes the thousands of scientific articles published on the subject each year. The Technical Information Center of the U.S. Office on Smoking and Health also publishes a **Bibliography** every eight weeks which contains abstracts of the most recent published articles in the Center's collection of over 57,000 documents relating to tobacco and smoking.

None of these sources, even when combined, exhausts the total literature on tobacco and pipe smoking, as was made painfully obvious when even my own focused research encountered thousands of additional published references. If one measures the impact of a given trait or phenomenon on the western world by the amount written about it, then it is beyond question that the Amerind custom of tobacco smoking has preoccupied occidental thought in an unparalleled manner.

Efforts to achieve the specific research objectives outlined above are certainly not hindered by a paucity of primary and secondary sources. Fortunately, researchers have come a long way since 1857, when Daniel Wilson complained that "the libraries of Canada furnish very slender means for dallying with the bibliography of the nicotian art." <42> With the aid of the photocopier and inter-library loan services one is able to peruse a considerable portion of the relevant literature and explore the remarkable transculturation of tobacco in the period of European contact with the New World.

The 1500 sources used in the present study are derived from the data bank of the Amerindian Pipe/Tobacco/Smoking Project. Each reference in this data bank is coded with a six-digit accession number, and all information associated with a particular reference is identified by that code. The 40,000 documents in the collection were perused using a speed-reading technique in which pages are scanned for key words. All primary and most secondary sources were processed on a page by page basis; indexes were found to be useless in many instances, and were abandoned as guides to text contents. Relevant information was highlighted on photocopied material and transferred to electronic files on the McGill University mainframe computer. The coded information was subsequently sorted into thematic categories, which served as the basis for individual chapters. To avoid a cluttered text filled with copious citations, all references have been placed in notes at the end of the work. The notes are designed as a thorough research guide that links the

text with the bibliography.

In Chapter Two the reader will encounter tobacco as seen through the eyes of the first European explorers, and will examine its concomitant effects on western thinking in the Old World. This will serve as a backdrop for Chapters Three through Seven in which the scene shifts to North America, where both natives and newcomers jointly participated in a new pipe/tobacco/smoking complex.

The syncretic nature of the complex posed a serious intellectual problem for Europeans and Euro-Americans that eventually culminated in a persistent controversy over whether the "savages" of the New World had discovered tobacco and invented pipes.<43> In Chapters Eight and Nine the published expressions of this dilemma in nineteenth and twentieth-century anthropological, archaeological and popular discourse will be explored. It is here that the intellectual history of culture contact merges with the history of those professional disciplines which made the classification and analysis of cultures their primary concern.

### CHAPTER TWO

### PETUN AS PANACEA: EUROPE ADOPTS AN AMERINDIAN HABIT

### A) THE STRANGE HERB REACHES FRANCE

## early contact

One of the first French encounters with Amerind smoking behavior was recorded in Jacques Cartier's Brief recit, & succincte narration, de la nauigation faicte es ysles de Canada, Hochelaga & Saguenay (Paris, 1545). <1> The sea captain from St. Malo had been commissioned to explore the New World in the hope that either a new passage to the Orient or the discovery of During his second precious metals might enhance French commerce. voyage of 1535-36 he penetrated as far as modern Quebec City, and even visited the Amerind town of Hochelaga (Montreal), where he met Iroquoian-speaking peoples. The mariner's account (of what was presumably the native use of tobacco) includes the first description of pipe-smoking to appear in print in any language, and has thus received singular attention in the voluminous literature on the history of tobacco.<2> The definitive modern English translation by Biggar reads:

Furthermore they have a plant, of which a large supply is collected in summer for the winter's consumption. They hold it in high esteem, though the men alone make use of it in the following manner. After drying it in the sun, they carry it about their necks in a small skin pouch in lieu of a bag, together with a hollow bit of stone or wood. Then at frequent intervals they crumble this plant into powder, which they place in one of the openings of the hollow instrument, and laying a live coal on top, suck at the other end to such an extent, that they fill their bodies so full of smoke, that it streams out of their mouths and nostrils as from a chimney. They say it keeps them warm and in good health, and never go about without these things. We made a trial of this smoke. When it is in one's mouth, one would think one had taken powdered pepper, it is so hot.<3>

The indefatigable (albeit sophistic) Harvard philologist Leo Wiener felt Cartier was claiming that tobacco was smoked only in winter to keep the Indians warm (a curious misreading), and this but one of the many inaccuracies proving that "nothing was positive can be said of his account of tobacco."<4> Since Cartier apparently visited Brazil, where he may have encountered the Tupinambas, Wiener suggested that the great mariner hađ suffered from a temporary bout of amnesia, managed to get his explorations mixed up, and had inserted a description of South American behavior into his summary of North American native customs.<5> Alternatively, he argued, sixteenth-century Iroquoian peoples had been in commercial relations with Europeans on the Gulf of Mexico, where they had obtained tobacco for the first time, <6> while "French adventurers who came up the St. Lawrence before Jacques Cartier also carried with them the tradition of tobacco from Brazil."<7> These arguments were intended to give support to the outrageous thrust of Wiener's book: tobacco-use originated in Africa, diffused to South America, and from there to the northern continent--all after European contact with the New World.

Riener's specious treatment of this early source has been

adequately repudiated, <8> and it is generally agreed that the Cartier narrative represents an eye-witness account of the natives of the St. Lawrence River Valley by Frenchmen who had never encountered pipe-smoking and experimented with it for the first time. It seems highly unlikely that the French traded tobacco to Amerindians or consumed it themselves in significant quantities during the first half of the sixteenth century.

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It is nonetheless conceivable that some anonymous sailor (or even one of the numerous Amerindians brought to the Old World)<9> was the first to import tobacco into France. If this were the case, it likely occurred in the decade following Cartier's celebrated visit to Canada, and undoubtedly involved contact with South America. An intriguing clue comes from an account of the coronation of the French King Henry II on October 1, 1547. Arciniegas (who unfortunately supplies no source) describes the festivities at Rouen:

spectacle is organized An extraordinary for the celebration: lawns bordering the Seine are transformed into Brazilian jungles. Tree bark is painted red, like the fiery embers of brazilwood. As backdrop there are fake palm trees. Hammocks hang from trunk to trunk, the branches. macaws on Three hundred naked fifty are authentic; Indians--of which the rest "costumed" French sailors returned from the other world and acquainted with its ways and habits...smoking as they loll on the hammocks. <10>

The writings of the great French poet La Boetie (who is said to have witnessed this Brazilian carnival on the Seine) helped inspire Montaigne's Noble Savage.(11> Yet the smokers of Rouen do not appear to have initiated the fad that was to storm Europe twenty years later.

Henry II was not known for his tolerance of Protestantism, and his religious repression soon prompted many Huguenots (as French Protestants were known) to flee the country and head for exotic South America. It is therefore not surprising that the next significant French exposure to tobacco occurred at the ill-fated Huguenot colony at Guanabara (Rio de Janeiro, Brazil) In his exceedingly rare Copie de quelques letres sur la in 1556. navigation du Cheuallier de Villegaignon es terres de l'Amerique oultre l'Aequinoctial (Paris, 1557), <12> the colonist Nicolas Barré<13> wrote of a plant that the natives called petun,<14> and which they sucked and smoked to endure hunger for eight or nine days.<15> In the same year another colonist, the Franciscan André Thevet, published his famous Les Singularitez de la France antarctique (Paris, 1557)<16> which was based, in part, on the author's personal observations during a ten-week period. Here South American cigar smoking was described, and the practice was, for the first time, illustrated in a woodcut (see Plate A second illustration of Indians smoking enormous 2.1a).<17> cigars was included in a later work published by Thevet in 1575 The natives were said to smoke petun not (see Plate 2.1b).<18> only to endure hunger and thirst, but (according to them) "to consume the superfluous moisture drive forth and in the head." <19> Kell believes it doubtful that Amerindians ever said anything of the sort.<20> As will become apparent, Thevet's remarks on the medical virtues of tobacco were greatly influenced by prevailing European aetiology.<21>

Of considerable relevance to the early history of European

Thevet's further statement that Christian tobacco-use is colonists in Brazil "have become very attached to this plant and perfume, although at the beginning its use is not without danger before one is accustomed to it: for this smoke causes sweating and weakness even fainting, as I have tested myself. "<22> Unlike Cartier's brief "trial" twenty years earlier, French settlers in South America apparently subjugated the initial malaise, and adopted smoking on a general scale. The claim by Fisher<23> that Thevet "could only have meant the Portuguese" (who did indeed smoke in Brazil at this time) ignores the fact that he was not merely a visitor making casual observations, but an aumonier (chaplain) actually living in the Huguenot colony. Koskowski<24> goes so far as to say that the Franciscan himself became a dedicated smoker.

Thevet met Cartier in the early 1550s and claimed to have stayed with him for five months at St. Malo. <25> He also declared that he had derived information about native religion from Donnacona, the Iroquoian chief who had been kidnapped by Cartier and carried off to France a few years earlier. <26> Although he had, in 1557, led his readers to believe that his return voyage to France the previous year had brought him merely "close to Canada," Thevet changed his story by 1575, and announced that he had landed and conversed with the natives for twenty days. In 1588 he was so bold as to claim that he had made an earlier voyage in 1550, though this was almost certainly another attempt to enhance his image as an expert on all areas of the New World. <27> Despite these alleged contacts, Thevet's review of North American explorations does not elaborate on Cartier's (1545) pipe-smoking account and merely repeats a cumbersome version of it:

There is besides a very fine little seed resembling seed of marjoram, which produces quite a large plant. This plant is highly prized and they dry it in the sun after collecting heaps of it. They wear it around their neck in little pouches of the skin of some animal in a kind of cylinder with a hole in the end in which they stick a piece of this dried plant which, having rolled it between their hands, they set fire to it and take the smoke of it into their mouth by the other end of the cylinder. And they take it in such quantities that it comes out of their eyes and nose. Thus they perfume themselves at all hours of the day. Our Americans (Brazilians) have another way of perfuming themselves, as we said above.(28)

Descriptions of both southern cigar-smoking and northern pipe-smoking were thus available to French readers by mid-century. Both Cartier and Thevet were widely read while Barré's work had a more restricted circulation.

The Calvinist Jean de Léry was another important member of the French colony in Brazil who wrote about tobacco-use. His **Histoire d'un voyage fait en la terre du Brésil** (La Rochelle, 1578),<29> which included a lengthy discussion of **petun**,<30> was, however, published a full twenty years after his Brazilian adventures of c. 1557-1558. Although the work was basically a scathing and vituperative response to Thevet's 1557 and 1575 versions of French colonial history, he agreed with the Franciscan that Amerindians employed tobacco in lieu of more substantial nourishment and to "drive out the superfluous moisture from the head."<31> De Léry himself tried the smoke of **petun**, and found that "it refreshes and keeps one from feeling hungry. "<32> His book was extremely popular and went through five French and two Latin editions by the end of the century.<33>

The colonists in South America were not the only Frenchmen to have experienced sustained contact with Amerindians during In 1564 René de Laudonnière led a Huguenot this period. expedition to the mouth of the St. John's River in Florida where he erected a fort for over three-hundred men and women.<34> The Spanish under Menéndez de Avilés were not pleased, and seeing that the settlers were "Lutherans" (i.e. Protestant heretics), it was "not needful to leave a man alive, but to inflict an exemplary punishment."<35> colonists were thus The French massacred in 1565, but not before the accomplished artist Jacques Le Moyne de Morgues escaped. His exceptional observational skills culminated in forty-two valuable sketches of Amerind (presumably Timucua) life.<36> These drawings, which were transferred to copper plates and published in part II of Theodore de Bry's celebrated Grands Voyages (1591), <37> include a depiction of a native smoking a long-stemmed pipe with a conical bcwl.<38> The text accompanying the illustration suggests that the artist had encountered a practice hitherto unknown to him:

They have a certain plant, the name of which has escaped me; the Brazilians call it Petum, the Spaniards tobacco. The leaves of this, properly dried, they put on the wider end of a tube, and, placing the narrower end in their mouth, they draw in the smoke so strongly that it comes out through their mouth and nostrils, and by the same operation it drives forth much moisture.<39>

PLATE 2.1



Earliest representation of the process of smoking: (A) From André Thevet's Les Singularitez...(Paris,1557) (B) From André Thevet's La Cosmographie...(Paris,1575)

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Neither Le Moyne nor Laudonnière (who also survived the Spanish sack) noted that the colonists actually used tobacco. Yet, in his account of Sir John Hawkins' three-day landing at this French settlement in 1565 (published in Hakluyt's **Principall** Navigations of 1589), <40> John Sparke records:

The Floridians when they travell have a kinde of herbe dried, who with a cane and an earthen cup in the end, with fire, and the dried herbs put together, doe sucke thorow the cane the smoke thereof, which smoke satisfieth their hunger, and therwith they live foure or five dayes without meat or drinke, and this all the Frenchmen used for this purpose: yet do they holde opinion withall, that it causeth water and fleame to void from their stomacks.<41>

It seems clear from this passage that the Huguenot refugees smoked, though the Spanish slaughter likely prevented the habit from spreading to France from this particular colony.<42>

### Thevet and Nicot

How tobacco and its use eventually reached France led to impassioned disputation even in the late sixteenth century. Despite the opportunity, Cartier was not apt enthusiastically to introduce into Europe a usage and associated effect which he (or at least the chronicler of his voyage) likened to that of **"pouldre de poyvre."** <43> The alleged smoking by South American Indians during the 1547 coronation made no impact on French society, and the incident has, to my knowledge, never been cited in the voluminous annals of tobacco history. Nor are there indications in the pre-1570 literature that survivors of the abortive French settlements in Brazil and Florida brought the plant home. Thevet's **Les Singularitez** (1557)<44> includes no mention of the introduction of the new herb into France, and no independent domestic evidence exists that it was being cultivated or used there in the mid to late 1550s.<45>

Thevet published his When La cosmographie universelle (Paris, 1575)<46> eighteen years later, he proudly boasted that he had been the first "to bring the seed of this plant to France, to have sowed it and likewise and called it **"l'herbe** Angoumoisine" after his birthplace, Angoulême.<47> Thevet may, as many researchers surmise, <48> have imported the seeds on his return from Brazil in 1556, although a number of factors militate against his allegations, and one is inclined to reject his traditional distinction as "introducteur du tabac en France." <49> The Franciscan had an extant reputation as a vainglorious braggadocio and even an outright liar. <50> Moreover, his claim to fame was made only long after the herb had achieved an esteemed approbation in Europe under the name nicotiane. <51> In fact, Thevet's section on tobacco in La cosmographie universelle was a vehement tirade against the inclination of contemporary writers to praise another individual who was alleged to have brought tobacco to France.

The man who had acquired considerable repute (and for whom the plant was officially named) was, of course, Jean Nicot. Dispatched by Francis II in 1559 as the ambassador to Portugal, Nicot is said to have sent home the leaf, which by then (c.1560) was available on the Iberian peninsula, and to have been the first to recognize its extraordinary medical potential.<52> The

story is often told that Nicot obtained the plant from the Lisbon keeper of "prisons" <53> or keeper of "monuments". <54> Why a Portuguese prison keeper should have been visited by an ambassador and archivist to the King of France and given him a rare and unusual plant from the New World has never been satisfactorily explained. It is more likely that as early as 1577 the French word chartres, meaning archives or royal records, was erroneously englished as "prisons" by John Frampton.<55> It has also been frequently claimed that Nicot became aware of tobacco through contact, in Lisbon, with a Flemish or Dutch merchant, <56> an individual usually identified as Damian de Goes.<57> De Goes was a great Portuguese humanist who was neither Flemish nor a merchant but was keeper of the Torre do Tombo records at Lisbon--precisely the archives to which Nicot (himself such a keeper) would have been drawn.<58>

A far more important error, which has been advanced with astonishing perpetuity by the vast majority of historians of tobacco, <59> is the idea that the tobacco Nicot introduced into France was Nicotiana rustica, recently sent to Lisbon from Florida.<60> Aside from Sarah Dickson and readers of her doctoral dissertation on excellent the sixteenth-century literature,<61> only Fournier,<62> when recalling that the Portuguese did not even have possessions in North America, <63> appears to have recognized the implausibility of a Florida origin. As early as 1575 Thevet categorically denied that tobacco grew in Florida. "I am ashamed to read such absurdities, for no man living ever saw a single plant of petun in Florida nor

in the circuit of a thousand leagues," he wrote in La cosmographie universelle.<64> In this he was only coincidentally correct since the Brazilian species indeed did not grow in North America.

What species, then, did Nicot introduce into France and from whence did it come? The Portuguese had already been cultivating tobacco in Brazil since 1534, had exported it to the home country by 1548, and were certainly planting it on the Iberian peninsula by the 1560s.<65> The claim that the herb was already domesticated in Spain and Portugal by 1518 or 1519, <66> was based on the possibility that Hernando Cortez was the importer. This remains unsubstantiated.<67> It is more likely that Louis de Goes first brought Brazilian tobacco to Portugal shortly before 1548 and that his celebrated relative Damiao de Goes gave Nicot the South American species Nicotiana tabacum imported directly from Brazil or growing in Portuguese specialty gardens in the 1560s.<68>

This sheds an entirely different light on the raging controversy between the French Royal Cosmographer Thevet and his colleague Nicot, the ambassador and keeper of the King's records. Since most historians believe that the former introduced France to N. tabacum and the latter did the same with N. rustica, <69> it has been argued that "the normal physical appearance of these two major Nicotianas would alone have caused misunderstanding and confusion." <70> The anthropologist Berthold Laufer suggests that "France owes her tobacco to Thevet and Nicot equally," and that the introduction of two different species favors "an equal share of honor for both."<71> Others reject Nicot (and the claim that the Portuguese secured N. rustica from Florida) entirely, especially since Thevet's N. tabacum became "the plant which France clung to for her great revenues. "<72> Mackenzie simply decided that "Nicotiana is a more euphonius name than Thevetiana would have been, \*<73> thus perpetuating a long historical tradition that opposes (what Laufer(74) termed) "Nicotophiles" against "Thevetophiles." Whether or not Thevet actually did import tobacco from the Huguenot colony in Brazil, it is now clear that Nicot brought the same Brazilian species from Portugal and created a great stir in France in the 1560s. That Nicot's tobacco was from Brazil, was confirmed by the distinguished botanist Charles de l'Ecluse as early as 1574.<75> Despite considerable evidence to the contrary, Thevet scholars, such as Schlesinger and Stabler, continue (as recently as 1986) to displace Nicot in favor of Thevet's belated fable.<76>

It is almost certain that the Spaniards brought N. rustica from Mexico or Florida to the European Low Countries before it reached England and before the Brazilian species became popular in France.<77> A herbal by the Dutch botanist Rembert Dodoens (Antwerp, 1553)<78> contains a woodcut of a Belgian plant with the caption Hyoscyamus luteus (Yellow Henbane).<79> It is generally recognized that this is, in fact, N. rustica and represents the the earliest record of its growth in the Old World as well as the first delineation of a tobacco plant in a printed work (see Plate 2.2a).<80> If the North American species were imported by anonymous sailors or merchants and were available to Europeans at this early date, it certainly did not make a puissant impression and French literature is silent until the Nicot "introduction" seven years hence. In 1576 the botanist Matthias de l'Obel published two illustrations of tobacco plants with the captions Herba sancta, siue Tabacum minus (now identified as Nicotiana tabacum var. fruticosa) and Sana Sancta, siue Tabacum minimum (now identified as N. rustica). <81> Although De l'Obel states that he saw the latter plant in a garden at Malines (Belgium), and scholars know it was later extensively cultivated in England, it is doubtful that N. rustica ever achieved the popularity of N. tabacum, anywhere in continental Europe.

# B) ENGLAND LEARNS TO SMOKE

#### Hawkins

As in the case of France, a precise date for the introduction of tobacco into England cannot be ascertained with certainty since numerous sixteenth-century seafaring merchants, explorers, fishermen and sailors remained anonymous participants in unrecorded voyages to the New World.<82> A number of documented clues do, however, provide a framework for the early Sparke's chronology of English tobacco history. John observations at the French colony in Florida in 1565 (which have already been cited)<83> are probably the earliest mention of tobacco by the English. Many authorities have persuasively argued that the experience of Hawkins and his men in Florida led to the first introduction of tobacco (N. rustica) into the home country.<84> The presumed Hawkins importation in 1565 has been offered to account for the independently documented presence of tobacco in England in the 1570s.<85>

# Amadas and Barlowe

A reference alluding to a second importation comes from a most unlikely source: the King of England. In his A Counterblaste to Tobacco (London, 1604)<86> James I recalled that

Withe the report of a great discovery for a Conquest, some two or three Savage men, were brought in, together with this Savage custome. But the pitie is, the poore wilde barbarous men died, but that vile barbarous custome is yet alive, yea in fresh vigor...<87>

This incident appears to relate to the return of Captains Philip Amadas and Arthur Barlowe from Raleigh's first expedition to North America in 1584.<88> After a reconnaissance voyage to Roanoke Island, the captains returned with "two savage men and other things brought from the said land discovered" -- a spectacle that apparently created a sensation in London. <89> Corti assumes that "these men, unable to give up their habit of smoking, brought supplies of tobacco with them. % While this occurrence post-dates the presumed introduction of tobacco into England by twenty years, it serves to suggest the possibility that eastern North American Indians themselves acquainted Europeans with the habit during one of a series of abductions

whereby these natives ended up in the Old World. An association of tobacco with exotic Amerindians continued into the seventeenth century when Pocahontas, the Powhatan Indian woman who married the Virginian settler John Rolfe, served as a model for a tobacco dealer sign, complete with a skirt of tobacco leaves, a feather headdress and a pipe of peace in her hand.<91>

### Hariot

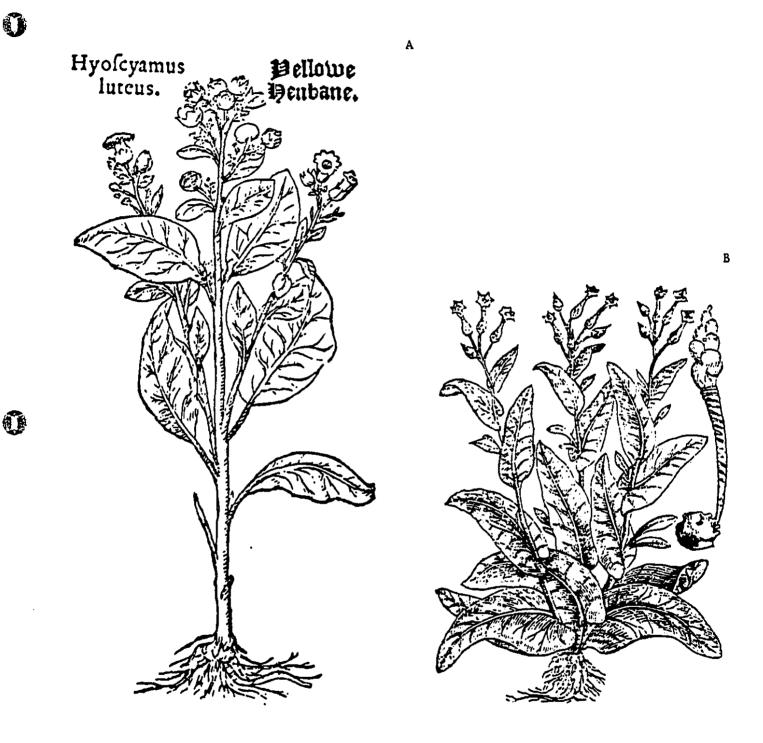
Although it is axiomatic that both of the principal species of tobacco (N. rustica and N. tabacum) were known in England well before 1586,<92> only for this year is indubitable evidence of their importation available. In his Brief and True Report of the New Found Land of Virginia (London, 1588)<93> Thomas Hariot provided the lengthiest sixteenth-century, ethnographic description of Amerindian smoking<94> and added:

We our selves, during the time we were there, used to sucke it after their maner, as also since our returne, and have found many rare and woonderfull experiments of the vertues thereof; of which the relation would require a volume by it selfe: the use of it by so many of late men and women of great calling as els, and some learned Physicians also, is sufficient witnesse.<95>

Hariot was a member of Ralph Lane's ill-fated settlement at Roanoke Island in 1585. His interests in horticulture and native life presumably led him to assemble tobacco seeds, leaves and clay pipes.<96> After his destructive raiding expeditions through the West Indies, Sir Francis Drake stopped at Roanoke, picked up Lane, Hariot and the remaining settlers and returned them to England in 1586.<97> It is this voyage that is most often cited as the first introduction of tobacco into England.<98>

It seems clear from Hariot's account that the returning colonists did much to promote smoking in England. It is also known from independent evidence that Hariot became excessively addicted to the Amerindian weed and practised the common smoking technique involving exhalation through the nasal passages. According to manuscript notes made by his physician and still extant in the British Library, Hariot had, by 1615, contracted cancer of the nose, from which he eventually suffered a slow, painful and hideous demise.<99>

Finally, a word must be said of the apocryphal tradition that credits Sir Walter Raleigh with the introduction of smoking in England.<100> Since Raleigh did not join the 1584 and 1585 English voyages to North America he cannot possibly have been directly responsible for importing tobacco. It is conceivable, however, that pipes and tobacco were presented to him by either Amadas and Barlowe in 1584 or Hariot, Lane and Drake in 1586,<101> and that his elite position in English society helped popularize and set the fashion at this time.<102> It is nonetheless important to recognize that tobacco was known in England twenty years earlier, although not before the 1560 introduction into France.<103>



Earliest representations of the tobacco plant:

- (A) Nicotiana rustica in Rembert Dodoens' Trium priorum... (Antwerp, 1553)
- (B) Nicotiana tabacum in Pena and De l'Obel's Adversaria... (London, 1571) The cut is captioned Indorum Sana Sancta (Holy healing herb) and it is noted that Indians and sailors smoke the plant in a funnel as shown.

#### C) BIRTH OF A PANACEA

### the news is spread .

What happened to tobacco in France in the years following 1560 has been a matter of some discussion. The plant was named herbe de l'ambassadeur, herba legati(104) and Nicotiane(105) in honor of Nicot. Despite efforts to popularize the latter term through its inclusion in the first Dictionaire François-Latin (compiled in 1573 by Nicot himself), <106> it later gave way to French versions of the original Tupi-Guarani petun(107) and the Spanish tabac. A majority of historians believe Nicot gave the plant to François de Lorraine (the "Grand Prior" of the knights of Malta of the province of France), who is said to have consumed three ounces of it a day. <108> For this reason tobacco also became known in France as l'herbe du Grand Prieur or herba prioris.<109> The most persistent story is that Nicot also gave the leaf to the Queen Mother, Catherine de Medici who, together with her sons Francis II and Charles IX, used it to cure headaches. <110> The plant was said to have been cultivated in the Royal gardens and then, under the Queen's patronage, apparently spread to the rest of France. <111> Catherine's alleged popularization of the herb soon led to a spate of alternate names for the new plant: Herbe de la Reine, Herba Reginae, herbe Médicée, Caterinaire and numerous other variations.<112>

Although Curtis claims that "we are at no loss for evidence

that the practice of snuffing arose within the French court circle about 1560, "<113> this is based on shoddy historical research and no one has been able to demonstrate that tobacco was employed in this fashion in sixteenth-century France. Other means of using the plant were certainly prevalent, but it is more likely that the French learned to snuff in Spain or the West Indies as late as 1620-1625.<114>

Nicot, the Grand Prior and Catherine may not have taken the substance through the nose, but nonetheless, this is the new period in which tobacco began to acquire an extraordinary reputation in France. In 1567 the French doctor, Jean Liébault, his acquaintance, Jean Nicot, decided that deserved more recognition for introducing such a valuable plant. In that year(115) Liébault re-published a work by his more famous father-in-law, Charles Estienne, called L'Agriculture et maison rustique(116) and added a chapter on tobacco which for the first time disseminated the idea that the ambassador had discovered a herb with marvelous medical powers. <117> Nicot provided Liébault with an account of his initial experiments on how best to cultivate the herb and employ it in various medical applications. In return, Liébault consecrated the name nicotiane in preference to **petum.**<118> The definitive work on the management of a country estate in the sixteenth and seventeenth centuries thus contained an extensive laudation of tobacco from which is offered the following excerpt:

Nicotiane, although it has only been in France for a short time, yet holds the first place among medicinal plants, because of its singular and almost divine

virtues...cures cancerous sores, all old wounds and cankered ulcers, injuries, ring-worms, open scabs, whetever infection is in them, by pounding the leaf of the plant in a clean mortar and putting pulp and juice on the diseased part...and if the smoke from this is taken into the mouth through a pipe, while keeping the head well-covered, such a large quantity of slimy and watery mucous comes from the mouth that the body is much reduced from it as from a long fast; for this reason some believe that incipient dropsy, not yet established, will be cured from this perfume.<119>

The book, with its account of the nicotian "perfume," became popular among French scientists and laymen, <120> and received even greater recognition when, in 1577, it was translated into English and appended to Frampton's famous version of Monardes. <121>

1571 Pierre Pena and Matthias De l'Obel published in In London their Stirpium adversaria nova(122) in which an example of the species now known as Nicotiana tabacum var. brasiliensis is illustrated for the first time, together with a man's head smoking a cigar or pipe of alarming proportions (see Plate 2.2b).<123> The botanist De l'Obel had moved to England only two years before, making it probable that his discussion of tobacco was based on personal observations in France and the Low well as Countries, Liébault's Maison rustique. <124> De as l'Obel's account of tobacco includes the following interesting passage:

...it <tobacco> should be preferred to any panacea, even the most celebrated...For you may see many sailors, all of whom have returned from there (America) carrying small tubes made of palm-leaves or straws, in the end of which they have placed rolled up leaves or crumbled pieces of this plant; this they light with fire, and, opening their mouths wide and breathing in, they suck in as much smoke as they can; in this way they say that their hunger and thirst are allayed,

their strength is restored and their spirits are refreshed; they asseverate that their brains are lulled by a joyous intoxication, and that an unbelievable amount of moisture is generally expelled... I have not made a proven experiment with that <tobacco> but the fame of this so-called holy herb is already increasing everywhere; our time has known no new thing from the New World, which is to be considered among remedies, more ready and more effective for sores, wounds, ailments of the chest and wasting of the lungs.<125>

Although De l'Obel was renowned among herbalists of the period, it is doubtful that his work (which has been rebuked for its barbarous Latin) received wide circulation, and many of the original sheets of the Adversaria were still available for reissue thirty-five years later.<126>

For fifteen centuries the last word in medical botany in Europe was a herbal written by the Greek botanist Pedanius Dioscorides in the first century A.D. The pharmacopoedias of the early sixteenth century drew upon knowledge found in this source as well as the works of Pliny and Galen, and Arabic ideas of materia medica.<127> As Talbot says, "a chink of light penetrated this abysmal darkness when Monardes of Seville published his book on the medicinal drugs imported from the New World. "<128> Nicolás Monardes was a renowned Spanish physician who founded one of the earliest natural history museums in Europe and / erimented with a variety of plants in his garden. In 1571 he issued a work entitled Segunda parte del libro, de las cosas que se traen de nuestra Indias Occidentales (129) in which an account of tobacco is given based both on his own observations and correspondents' reports from the New World. <130> The plant is said to have a "wonderful effect in checking the flow of blood" and then

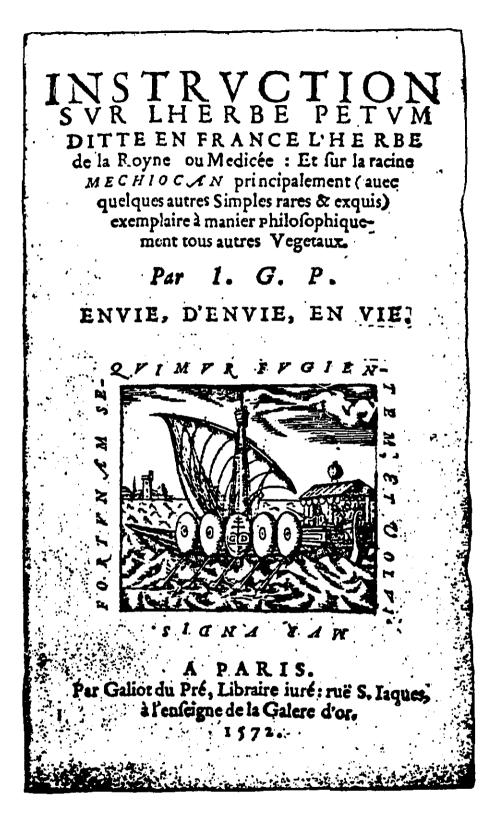
"gluing" or "knitting" together fresh wounds.<131> It cleansed and purified infected sores or poisonous carbuncles and helped the "madness and suffering" from wounds caused by poisoned arrows or animals. Warm poultices of tobacco were great remedies for chilblains, swellings, cold abscesses, pains of joints, stiff necks and stomach pain. There was nothing better for "griefs of windes" (flatulence) and toothache, and women in the Indies were said to use it to cure their children of "naughtie breathing" (halitosis). The herb killed "worms" and dissolved obstructions It cured headaches (especially those caused by of the stomach. cold or draughts) and when smoked, "cast out the matter from the chests of asthmatics." Indians of the West Indies used tobacco to take away weariness, to endure thirst and hunger and even to go several days without food and water. <132> Despite the newly acquired plants and knowledge from the Americas, Monardes could not quite escape the shackles of his classical training, and Dickson has argued that some of his discussion of tobacco is modeled after Discorides' treatment of yellow henbane -- a plant with which tobacco was often confused in the late sixteenth century.<133>

The importance of Monardes' book lies in its incredible popularity throughout sixteenth-century Europe. The work gained immediate favor, became the chief source of information on the subject, and made a profound impression as the basis of a new therapeutic code.<134> As Mackenzie observes, to Monardes "must be attached the chief responsibility for that renown of tobacco as a panacea which was to last for another hundred years."<135> PLATE 2.3



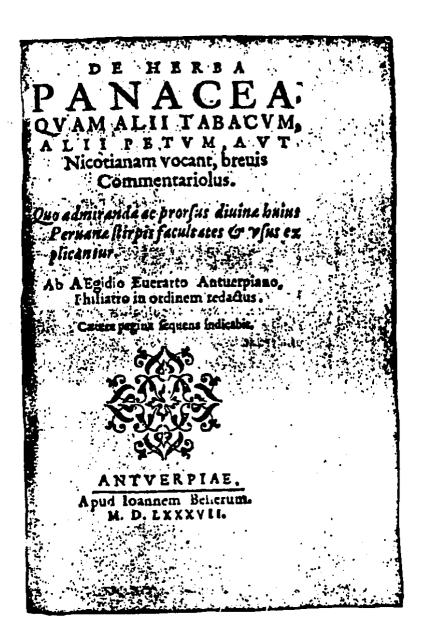
Title of tobacco chapter in Nicolas Monardes' Joyful Newes out of the Newe Founde Worlde (London, 1577). The illustration of the tobacco plant was copied from Pena and De l'Obel (cf. Plate 7.2b).

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Title of earliest treatise devoted principally to tobacco: Jacques Cohorry's Instruction sur l'herbe petum ditte en France l'herbe de la Royne ou Medicée (Paris,1572).

PLATE 2.5



Title of sixteenth-century synthesis of everything known by Europeans on tobacco as a panacea: Gilles Everaerts' *De Herba Panacea Quam Alii Tabacum* (Antwerp, 1587).

Other tomes came and went but, in Brooks' words, "it was the household according to Monardes which became a qospel creed. "<136> Charles de l'Ecluse added some notes (including references to the effectiveness of tobacco for ulcers and gout), and published a Latin translation in 1574.<137> Three years later John Frampton republished Monardes' work under the title Joyful Newes out of the Newe Founde Worlde, <138> thereby providing English readers with the first extensive description of the new panacea,<139> together with a copy of Pena and De l'Obel's woodcut of the plant (see Plate 2.3).<140> It quickly became a textbook for English physicians and herbalists, <141> and both Tanner and Laufer believe that this translation left a notable imprint on the life and literature of Elizabethan and Stuart England. <142> The Latin edition was translated into French by . Drogues Antoine Colin as part of his Histoire des (Lyon, 1602), <143> although many French savants had likely read the De l'Ecluse version.

After Monardes had published his Segunda parte del libro (but before it was translated into French), the earliest treatise devoted principally to tobacco (and containing a word for the plant in its title) came out in France. In 1572 Jacques Gohorry published his Instruction sur l'herbe petum ditte en France l'herbe de la Royne ou Medicee(144) after asking Catherine de Medici for permission to associate her name with the new plant (see Plate 2.4).(145) "Her Majesty graciously replied that she found everything good which conduced to the public welfare, and that she did not refuse to be the godmother."(146) Although the little book relies heavily on Liébault, <147> Dickson notes "we learn from Gohory that the plant was being extensively grown, and that experiments were being made with it by doctors and botanists in France." <148> Bowen, who made a study of this important source, believes that it was widely read among a public eager to learn of the discoveries in America--a popularity further evidenced by its being reprinted in 1580.<149>

With Liébault (1567), Monardes (1571) and Gohorry (1572) a trend was initiated in which, for two hundred years, tobacco occupied a prominent place in the pharmacology of Europe as the "divine herb, the panacea, the first aid of physicians." (150> Having read Monardes and Gohory, Liébault decided to make significant amendments in the 1574 and 1583 printings of the **Maison rustique.(151>** As Dickson complains "the mere enumeration of the names of the ailments cured by the miracle plant would be tedious, not to say painful."(152> The work of these three scholars, as well as a number of other herbalists, was deemed important enough that a synthesis of everything known on tobacco was attempted by the Flemish physician Gilles Everaerts, titled **De herba panacea quam alii Tabacum** (Antwerp, 1587; see Plate 2.5).(153>

### a century of tobacco cures

The reputation of tobacco in late sixteenth-century France (and elsewhere in Europe) spilled into the following century with such crescendo that, for present purposes, one is resigned merely to delineate and describe briefly the major works expressing the the period.<154> In his popular Le Theatre ideology of D'Agriculture (Paris, 1600), <155> Olivier de Serres (the so-called "father of French agriculture") gave a long list of ailments which tobacco ostensibly cured. Even Henry IV (King of France, 1589-1610) is said to have read this work for a half-hour after every dinner over a period of several months.<156> Tobacco was selected from plants grown at the royal gardens at Paris for inclusion in Paul de Reneaulme's Specimen Historiae Plantarum In his discussion the author asked, "How (Paris, 1611).<157> many women have I seen, almost lifeless from headache or toothache or catarrh in the lungs or elsewhere, restored to their former health by the use of this plant?"<158> Contrary to Van Lancker's recent, ethnocentric assertions, <159> it is likely that average man and woman who smoked or otherwise employed the tobacco in this early period, took its curative properties seriously. It is nonetheless conceivable that the doctrine of tobacco as a catholicon was, in some small measure, a cover-up to justify a pleasurable habit. As Ortiz puts it: "sensuality was able to hide behind the cloak of curative science. "<160>

By 1622 Johannes Neander of Bremen was able to publish a detailed medical dissertation in which "tobacco is lauded to the skies" <161> after an exhaustive study of the literature resulted in nearly a hundred prescriptions in which the plant was used. <162> This very popular work was entitled **Tabacologia** (Leyden, 1622; see Plate 2.6), <163> and reappeared in a French translation as **Traité du tabac ou nicotine, panacée, petun** (Lyon,

1626).<164> Meanwhile Raphael Thorius published Hymnus Tabaci (Leiden, 1625)<165> which passed through many editions in London, Paris and Utrecht.<166> An additional list of ailments cured by tobacco was given in Johann Magnen's Exercitationes de Tabaco (Pavia, 1648),<167> and this was followed by Louis Ferrant's Traicté du tabac en sternutatoire (Bourges, 1655).<168>

anti-tobacco lucubration entitled L'Anatheme du tabac An (Paris, 1660)(169) was published by Le Signerre, although, in the same year, the author recanted, offered a contre-anatheme, and heralded the virtues of tobacco. <170> Another hint of opposition to the new fad was evidenced by Simon Paulli's Commentarius de Abusu Tabaci (Strassburg, 1665)<171> which was dedicated to Jean Baptiste Moreau, the former Dean of the Faculty of Medicine in Paris, in hopes that it would be recommended to medical students. Although Paulli was against "the barbarous and filthy American medicine," he admitted that the plant was effective when correctly employed. <172> Baillard's Discours du tabac (Paris, 1668)<173> dealt primarily with snuffing and insisted that the practice improved the complexion and the body as a whole.<174> This was soon followed by Lazare Rivière's Opera medica universa (Frankfort, 1669).<175> Rivière was Dean of the Royal Medical Faculty at the University of Montpellier and did much to advocate the use of tobacco in the late seventeenth century. <176> In 1699 a thesis titled An ex Tabaci usu frequenti vitae summa brevior was sustained before the medical school of the University of Paris, although, as Singer notes, the affirmative decision "may be considered to have less weight, as

the sustainer smoked throughout the proceedings. "<177> Brunet's Le bon usage du tabac en poudre (Faris, 1700)<178> reveals, however, that the end of the century was the beginning of the age of snuff in France (see Plate 2.7).<179>

of late perusal the sixteenth and Α early seventeenth-century literature makes it apparent that tobacco entered European consciousness not for the pleasures of smoking but through its credentials as a healer of the sick. <180> Although use of the weed as a medicine was universally approved in this early period, people who smoked only for recreation were often bitterly attacked.<181> Only in England was pipe-smoking initially as much a matter of pleasure as of hygiene; <182> but even there, physicians vehemently criticised social smoking, since uncontrolled dispensation and use was affecting the need for their services. <183>

# the Amerindian connection

In Chapter One it was indicated that Amerindians did, on occasion, employ tobacco for what can (from a western viewpoint) roughly be described as "medicinal" purposes, and over the years, numerous authorities have surmised that herein lies the origin of European thinking on the matter.<184> Although Dickson has convincingly demonstrated that Europeans may have learned about some of the alleged medical efficacy of tobacco from the Aztecs and the Mayas,<185> the concomitant elaboration of the belief that the plant was a panacea seems, for the most part, to lie in European ideology rather than Amerindian medical theory. As is often the case in the early literature, sorting out white etics from native emics is an extraordinary challenge for the ethnohistorian. When confronted with an entirely foreign practice, Europeans could only describe and explain it in their own terms.

Despite Cartier's apparently negative response to the plant, even he alluded to the perceived salubrious qualities of the smoke.<186> Ironically, Cartier's "powdered pepper" was, as a placebo, soon to do more for the general health of Frenchmen than his more famous discovery (also from Amerind medical botany) that the pharmacologically more appropriate Thuja occidentalis cured scurvy. <187> As stated, both Thevet and de Léry believed the smoke was efficacious in driving forth and consuming "the superfluous moisture in the head." <188> In the North American section of La Cosmographie Universelle Thevet assured his readers "from having tried it, how good it is for purging the heart."<189> The French colonists in Florida also claimed that it "causeth water and fleame to void from their stomachs." <190> As was noted earlier, Nicot probably heard of the medical virtues of tobacco from Damiao de Goes, and through Liébault, helped spread the news in France. <191> The English were equally convinced through their experience at Roanoke, and Hariot reported in 1588 that the Indians of the region:

use to take the fume or smoake thereof, by sucking it thorow pipes made of clay, into their stomacke and head; from whence it purgeth superfluous fleame and other grosse humours, and openeth all the pores and passages of the body: by which meanes the use thereof

not onely preserveth the body from obstructions, but also (if any be, so that they have not bene of too long continuance) in short time breaketh them: whereby their bodies are notably preserved in health, and know not many grievous diseases, wherewithall we in England are often times afflicted.<192>

There is little evidence that these specific treatments and derived from explanations were in any way the American Indians.<193> Rather is was the thirst for new medicines that disease-ridden world Robert's caused (in words) ″a to pathetically "worship at the shrine of the leaf."<194> Α somewhat exaggerated point repeatedly made by Arents and Brooks is that no testimony exists in the early literature that suggests Amerindians employed tobacco as a vulnerary, antiseptic, or Thevet later admitted otherwise therapeutic agent.<195> Even that he was "not so foolish as to try to make out as some have done that the savages use the leaves of Petun as a remedy in their diseases, and especially wounds and ulcers. << 196>

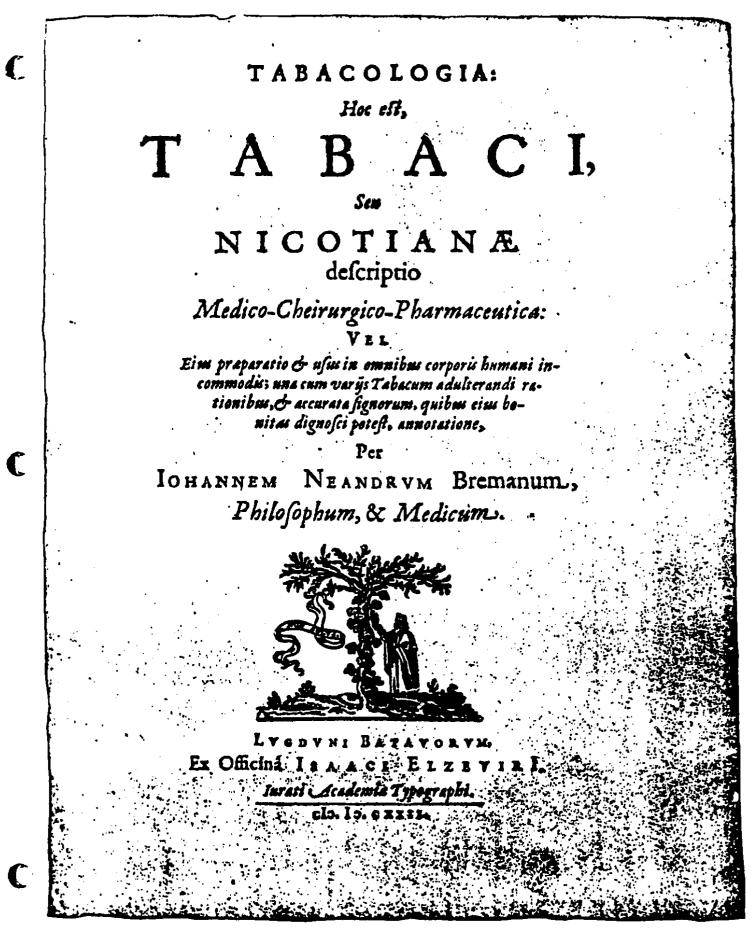
This was particularly true of the host of culture-specific ailments known to (or identified by) Europeans alone. Aside from the minor complaints, such as wounds, warts, ulcers, asthma, insomnia, falling fingernails and poor eyesight, <197> tobacco was effectively prescribed for malignant and incurable diseases. <198> It was unequalled for "sneesing, consuming and spending away grosse and slimie humors from the ventricles of the braine" and was an effective cure for "a lethargy or vertiginy, in all long griefes, paines, and aches of the head, in continuall senselessnes or benumming of the braine, and for a hicket that

proceedeth of repletion. "<199> The Marquise de Pompadour discovered an "Essence du tabac de Pompadour pour corriger la mémoire"<200> and the physician to Louis XIV of France claimed that tobacco "doth free children from the epilepsie if you put in the small end of the pipe into the child's mouth, and blow in the smoak, or if you blow it from your mouth."<201>

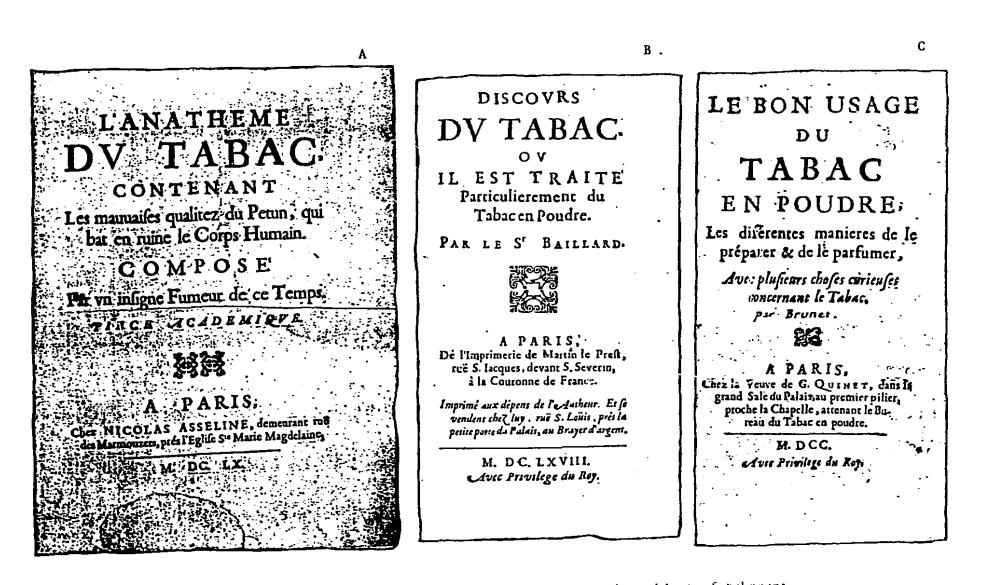
#### humors and the plague

The most persistent idea was that the disinfectant properties of tobacco granted immunity from the bubonic plague. One wonders whether this may have been a major factor in the spread of smcking.<202> The prescription first appeared in Sarasin's De peste commentarius (Geneva, 1571)<203> and was in Chute's Tabaco (London, 1595).<204> alluded to The prophylactic value of tobacco was reiterated by the famous William Barclay at the outset of the London plaque of 1614 and was verified by the Dutch physician Diemerbroeck following the Dutch epidemic of 1636.<205> By the time of the Great London Plague of 1665, the rumour had spread that owners of tobacco shops and tobacconists' households never succumbed to the epidemic.<206> The plant continued to be recommended as an infallible preventative against infection, <207> and English boys were compelled to smoke a pipeful in school every morning, lest whipped.<208> Jorevin de Rochefort, recalling a they be conversation with an English acquaintance in England in 1666, relates:

PLATE 2.6



Title of the most influential seventeenth-century medical dissertation on the "science of tobacco:" Johannes Neander's Tabacologia (Leyden, 1622).



Examples of seventeenth-century French tracts on the subject of tobacco:

- (A) Le Signerre's L'Anatheme du tabac (Paris, 1660)
- (B) Baillard's Discours du tabac (Paris, 1668)
- (C) Brunet's Le bon usage du tabac en poudre (Paris, 1700)

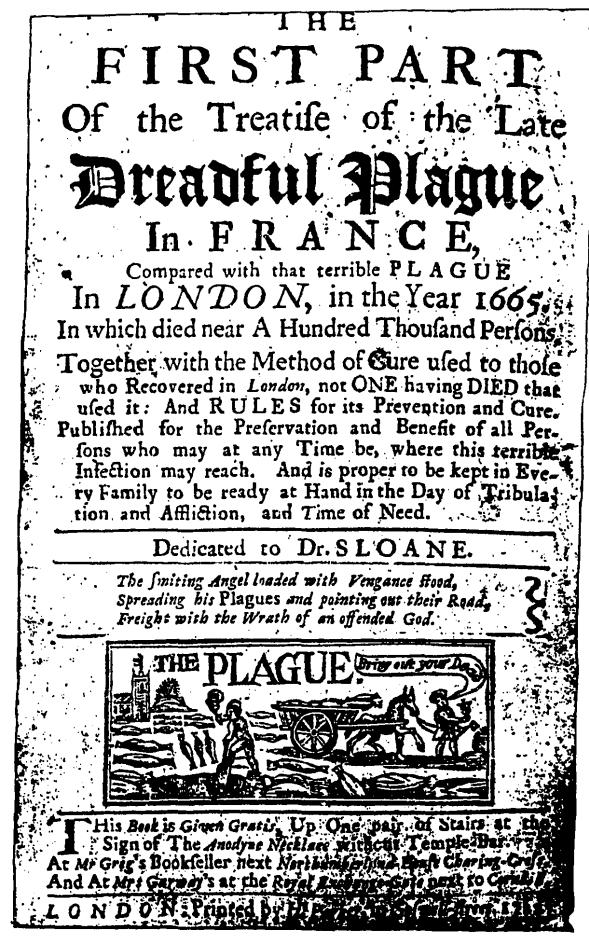
PLATE 2.7

PLATE 2.8

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Title of plague tract showing grave-digger smoking a prophylactic pipe

Whilst we were walking about the town, he asked me if it was the custom in France, as in England, that when the children went to school, they carried in their satchel, with their books, a pipe of tobacco, which their mother took care to fill early in the morning, it serving them instead of a breakfast; and that at the accustomed hour, every one laid aside his book to light his pipe, the master smoking with them, and teaching them how to hold their pipes and draw in the tobacco; them to it thus accustoming from their youths, it absolutely necessary believing for a man's health.<209>

Those who were in a particularly high-risk category (i.e. doctors and collec'ors or buriers of pestilence sufferers) smoked incessantly(210) and archaeologists have excavated numerous "plague pipes" in and around graves of presumed victims of the contagion.(211) As late as 1722 the title page of a treatise on the plague in France illustrates a grave-digger smoking a pipe (see Plate 2.8).(212) In his **Discourse Concerning the Plague** (London, 1721),(213) William Byra of Westover even claimed that the English were a healthier nation since their use of tobacco and that America had never been inflicted by the dreaded scourge because of the quantity of the plant indigenous there.(214)

From the mid-sixteenth through the seventeenth centuries the number of ailments tobacco was supposed to cure grew to literally every sickness known to man and, by 1610, there was litle to add to the section on Nicotiane in pharmacopoeial works.<215> Although tabac, petun and nicotiane remained the most popular appellations, Indorum Sana Sancta, herbe propre à tous maux, Herba sancta, Herbe saincte, Herba sacra, Herbe divine, herba panacée antarctique, Heilkmaut and Indianisch panacea, Wunderkraut were substitutions intended to highlight the unusual

medicinal properties of the plant.<216> As early as 1566 Damiao de Goes had suggested that the Brazilian **Betum** (ie.: petun)<217> was so powerful in its medical virtues that it should be called the "holy herb."<21C> William Barclay was displeased with the English penchant for the Spanish term "tabacco," and "esteeming it worthie of a more loftie name," chose to call this most profitable plant **Nepenthes**," after a famous drug alleged by the ancient Greeks to cause one to forget sorrow.<219>

An explanation for this perplexing phenomenon in European medical history has been attempted by Katherine Kell:

This blanket acceptance of tobacco as the panacea for which the medieval alchemists had long sought leads us to another important understanding we must have of the climate of intellectual opinion in the fifteenth and sixteenth centuries: the reason for the rapidity of European acceptance of tobacco as medicine was the basic medical theory itself, the theory of humours. Fundamentally this was the belief that only four elements (air, fire, earth, and water) composed all things, including the human body and its illnesses. These elements were capable of much interfunctioning, but ideally they balanced one another. They had four basic properties which occurred in combinations (moist, hot, dry, and cold...) and they corresponded to the four seasons of the year (spring, summer, fall, and They appeared in the human body, together winter). with their properties, in the forms of four bile, humours--blood, yellow black bile, anđ phlegm--and when the humours balanced, the human being was healthy...

...this was the theory with which sixteenth and seventeenth-century Europeans approached tobacco and by which they sought to explain it as the panacea long searched for. By means of this theory they concluded that tobacco, properly applied, must somehow dry up superfluous moisture, counter the cold elements in the body, and establish the all-important balance between humours...for above all the it stabilized the humours--the corrupt humours were drawn from every part of the body to the mouth and "voided and spitten out." Smoking caused the brain to contract and shrink "just like a sponge" when superfluous water is squeezed out of it, Bartolomaus Schimper wrote enthusiastically in And Vittich wrote that there could be no doubt 1660.

about tobacco's ability to "cleanse all impurities" and do away with "every gross and viscous humour."<220>

Although tobacco was at the height of its fame as a panacea around 1600, it only began its slow decline in popularity at the end of the century.<221> Throughout this period a number of attacks against immoderate use were based on morals, with the 1604 Counterblaste of James I being the most famous example.<222> However, it was only by the end of the seventeenth and beginning of the eighteenth centuries that criticism came through scientific observation.<223> Curiously, the humors theory itself initiated the opposition. As Kell points out, "debunkers said that smoking upset the humours, drying out the body or dissipating natural heat," and "old people were told not to smoke because they were naturally dried up anyway."<224>

## D) TOBACCO INFILTRATES FRENCH SOCIO-ECONOMIC LIFE

## early production

The veritable revolution created by tobacco did not only affect medical practice but had a significant impact on the daily social, economic and political lives of Europeans. The growing demand inspired a market, and soon the plant spread from the specialty gardens of herbalists, botanists and physicians to large cultivated fields in both the New World and the Old. Although Heimann<225> gives the first plantings of tobacco in

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France as 1556, this is clearly much too early.<226> After 1560 there may have been limited attempts to grow tobacco commercially in parts of France, Belgium, Germany, Holland, Italy and elsewhere, although these rural experiments were often of merely local interest. <227> Pena and De l'Obel <228> wrote in 1571 that the tobacco stalk "grows three cubits high in France, Belgium and England, and very often four or five cubits when it is sown early enough in warmer parts of Aquitaine and Languedoc. "<229> In his Thresor de la Langue Francoyse (Paris, 1606)<230> Jean Nicot wrote (under the entry for "Nicotiane") that "all the provinces" of France "have been planted and crowded with it, "<231> although no clue as to the actual extent of these crops is provided. Only in Holland may tobacco have been cultivated widely in this early period.<232> It is known that by 1588 the Dutch had learned pipe-smoking from French and English students studying at Leyden, suggesting that the French were already smoking for pleasure at this time.<233> It is doubtful, however, that social smoking made as much progress in sixteenth-century France as it did in England.<234> In the 1590s Elizabeth levied a duty on imported tobacco, but when, in 1597, a French ship sailed into Cornwall to sell L2,000 worth of tobacco, it refused to pay the tax.<235> Where the French obtained this cargo in the first place is unknown.

What little evidence is available suggests that, although all of Europe immediately embraced the medical virtues of tobacco, only the English and Dutch also employed it in their everyday lives. Not until the reign of Louis XIII (1610-1643)

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did the French adopt the habit as a general popular pastime,<236> though it is probable that many Frenchmen (particularly in maritime ports) smoked recreationally during the reign of Henry IV of France (1589-1610),<237> and perhaps even earlier.<238>

movement of peoples during the Thirty Years' The War (1618-1648) did much to disseminate pipe-smoking throughout Europe (see Plates 2.9 and 2.10).<239> By 1620 the Dutch merchants were the largest wholesalers in Europe, <240> but demand continued to increase and large cargoes were shipped from New World colonies such as Virginia and Spanish Varina. Tobacco from the latter provenance was known in France as Vérine or petum musqué.<241> Billings argues that tobacco was not cultivated commercially in France until 1626,<242> and it is around this time that one finds evidence for large plantations in Brittany, Flanders.<243> the 1620s, Gascony and In commercially significant quantities were being grown at Mondragon on the Rhone, in the Angoumois and in the middle Garonne Valley.<244>

As alluded to previously, many historians believe that Catherine de Medici took tobacco in the form of snuff, thus initiating a mode of consumption that had permeated most aristocratic circles by the time Louis XIII reached the throne. <245> The more plausible conclusion that snuffing was only introduced into France from the West Indies or Spain about 1620-1625 was also suggested.<246> Although lower classes probably continued to smoke the hot, reeking clay pipes, fashion may have dictated the spread of the new, daintier and more elegant consumption among members of the Court, the nobility and the clergy.<247>

## taxation and control

In 1629 Cardinal Richelieu, chief minister during the ascendancy of Louis XIII, decided to impose a tax on imported tobacco.<248> The tax may have been partly designed to encourage French plantations in the Antilles, since the West India Company was exempt.<249> Tobacco had begun to affect French economics, much as it had done in England a decade earlier.

In this period one also begins to see the first hints of ambiguity in public policy. As Price observes, "while a controller-general and a minister of the navy might be trying to stimulate the tobacco revenue and trade, secretaries of state charged with internal administration, lieutenants general of and parliamentary and local magistrates police, might simultaneously be striving to check the consumption of a pernicious weed. "<250> Nicotiane was spreading from its acknowledged role as a medical panacea to an abused social bane.<251> Under penalty of flogging, the parlement of Paris forbad, in 1631, the use of tobacco in prisons.<252> In 1634, as the result of an extreme fire hazard, a Port Commander forbad anyone de petuner after sunset. <253> In the same year the cultivation of the plant near Metz was perceived by local peasants as a serious danger to the food supply and a widespread series of riots ensued. Mobs were observed attacking fields of

growing tobacco and pulling up the plants.<254> The occupation of "tobacco-seller" had already been recognized in the early years of Louis XIII, but in 1635 the general police ordonnance for Paris prohibited the free sale of tobacco. Only apothecaries were permitted to sell it for medical purposes, and even then, only on the prescription of a physician.<255> By 1637, however, these restrictive laws had been repealed.<256>

By the time Louis XIV reached the throne in 1643, snuffing was continuing to increase in popularity in France--a trend that continued throughout much of the next century.<257> In the mid-seventeenth century, France even began to export domestic tobacco.<258> Price attributes this to the fact that the French consumed modest amounts compared to other nations,<259> but it is also possible that a market for the highly prized French snuffing tobacco had developed in the rest of Europe.

The King, himself, had a decided antipathy towards the habit (only nonsnuffers could serve as his valets), but he issued neither verbal denunciations nor penalties. <260> Expensive snuff boxes, resplendent with precious stones, continued to prevail in the fashionable French Court and among grandees throughout the land.(261)Strands of spun tobacco were pressed into a roll called a carrote, the end of which was processed with a rasper nose-shovel--additional snuffed with а pieces of and paraphernalia in the pockets of the aristocracy. <262> The King's physician, Dr. Fagon, was asked to lecture against tabac en poudre or tabac rapé, as snuff was often called. <263> An

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assistant read the prepared statement and, as Heward sarcastically quipped, "unhappily for the success his eloquence merited, in the warmth of his oratory he so far forgot himself as to dip his fingers into his waistcoat pocket and take copious pinches of tabac en poudre in order to refresh his fickle The Duchess Elisabeth Charlotte of brain. "<264> Orléans complained that the women of the French Court were so addicted to tobacco that "they stank like goats." <265> In addition to snuff-taking, the King's own daughters secretly learned from the palace guards to smoke pipes.<266> By 1677 the King was tolerant enough that his personal objections to the habit did not prevent the circulation (avec privilège du roi) of De Prade's Histoire du tabac<267> -- a book in absolute praise of tobacco.<268> Herment notes that "in his paternal care for his army Le Roi Soleil ordered a regular issue of tobacco to the troops, and not content with that, desired that every soldier should have his own pipe and his own flint and steel. <269>

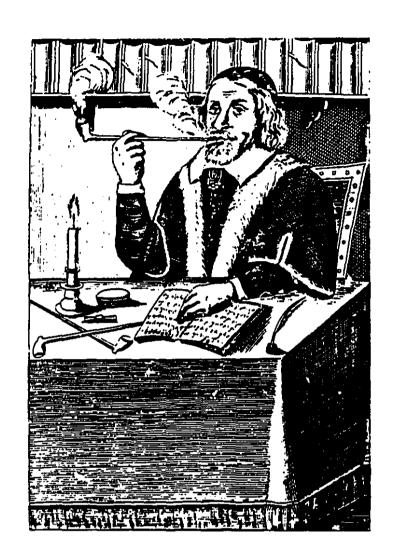
Fipe smoking continued to be primarily confined to the lower classes. During his stay in France from the years 1684 to 1691, an Englishman wrote, with apparent astonishment, that "smoaking of tobacco was so scandalous, and offensive, that none but mariners and people in the sea port towns used it, except in urgent cases for preservation of health, and that was done in secret, and with bashfullness."<270> It is probably correct to conclude that the social use of tobacco for pleasure was extremely popular in seventeenth-century France, with pipe-smoking prevalent among mariners, soldiers and students, and snuffing frequent among the upper classes.<271> Smoking for medical reasons most likely cross-cut socio-economic boundaries of every kind.

In an edict dated 1674, the King decided to reserve for himself the privilege of manufacturing and selling tobacco--a monopoly that was initially farmed out for six years to a contractor named Jean Breton and later controlled by Colbert.<272> This greatly helped revenues, and it was a fascinating irony that the plant which was spread throughout Europe partly by the Thirty Years' War now helped to pay for another. <273> René Le Pays, a popular member of the court of Louis XIV, wrote in 1688 that tobacco:

is now much discredited at court where mentioning its name will raise a stink...the King cannot stand tobacco. But banished from the court, tobacco may still be enjoyed by His subjects out of the King's presence and thus it will not provoke His displeasure.<274>

Le Pays (who at one point was offered the position of "Tobacco Farmer General") wrote a number of poems praising smoking and snuffing and distributed these to tobacco shops in hopes of increasing consumption of the plant that "puts each year five hundred thousand crowns in the state's coffers."<275> The royal monopoly was so strictly enforced that nearly a century after its initial implementation French officials were being condemned to be hanged for illegally admitting foreign tobacco into the country.<276>

A



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# A & B: Woodcuts of seventeenth-century European smokers

В

PLATE 2.10









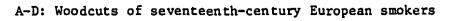




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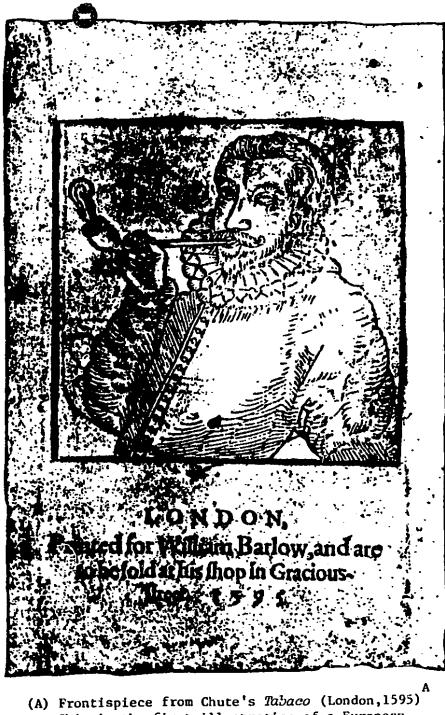
## the English literature

The French were not alone in their astonishing acceptance of tobacco in the late sixteenth and seventeenth centuries. If anything, the English were even more obsessed, especially with pipe-smoking. The first English treatise devoted solely to the plant and its use was Anthony Chute's Tabaco. The distinct and seuerall opinions of the late and best phisitions that have written of the diuers natures and qualities thereof (London, 1595).<277> Although, for the most part, this curious cento reiterates Liébault, Monardes, Gohorry and Everaerts, Chute brings his personal experience to the subject and expresses the typically English predilection for the pipe as the most effective "For my selfe," he means of benefitting from tobacco.<278> wrote, "I thinke that there is nothing that harmes a man inwardly from his girdle upward, but may be taken away with a moderate use of tabacco."<279> The Anglist Robert Kane believes this important Elizabethan work "is probably the first in any literature to give proper importance to the custom of smoking".<280> It also contains the first known picture of a European smoker (see Plate 2.11).<281>

Although it is not the intention of this work to treat exhaustively the English side of tobacco history,<282> it is appropriate to discuss a number of contemporary works to illustrate the remarkable flurry of interest in the new panacea as it stormed Anglo-Saxon Europe. Chute's Tabaco was published at a time when the English were beginning to turn a medicine into a triumphant national recreation. <283> Ben Jonson (who wrote more on tobacco than any other contemporary dramatist) even indicated that there were professors in the art of smoking who advertised their services on placards in the middle aisle of St. Paul's.<284> Centuries later, the novelist J.M. Barrie suggested that "the Elizabethan age might be better named the beginning of the smoking era," for "with the introduction of tobacco, England woke up from a long sleep," and "men who had hitherto only concerned themselves with the narrow things of home put a pipe in their mouths and became philosophers. "<285> By the seventeenth century England consumed more tobacco per capita than any other European nation. The ubiquity of the habit among both sexes, all ages, every social class and under all circumstances has few parallels in the history of western civilization. <286>

Consequently, it is not surprising that tobacco made a profound impact on the literature of the late Renaissance, <287> or that it became one of the most controversial subjects known to seventeenth-century Englishmen.<288> London presses were kept busy as the number of works devoted solely or principally to tobacco rose dramatically in the first two decades of the An anti-tobacco campaign was initiated when seventeenth century. boldly his moralistic Work for Philaretes published for Tabacconists Chimny-sweepers, or а warning (London, 1602), (289> though this was soon followed by Roger Marbecke's scholarly reply, A Defence of Tabacco (London, 1602), <290> and John Beaumont's versification, **The Metamorphosis of Tabacco** (London, 1602; see Plate 2.12).<291>

The polemic against the weed in King James I's famous A Counterblaste to Tobacco (London, 1604)<292> gave rise to a host of tortuous lucubrations, including Gardiner's response to Philaretes and James, called The Triall of Tabacco (London, 1610), (293) and Barclay's Nepenthes, or the Vertues of Tabacco (Edinburgh, 1614; see Plate 2.13).<294> The persistent advocates of the habit were not to remain unchallenged, for the fanatic John Deacon, in his Tobacco tortured (London, 1616)<295> soon thereafter complained (in an excessively pedantic Biblical prose) "industriously Indianized "with Englishmen were that the intoxicating filthie fumes of Tobacco. "<296> He was joined in the same year by Joshuah Sylvester, whose poetic attack on the nicotian plant was verbosely entitled: Tobacco Battered and the Pipes Shattered...by a Volley of Holy Shot Thundered from Mount Helicon (London, 1616).<297> Richard Brathwaite's The Smoaking Age (London, 1617)<298> was more concerned with satirizing the extravagances of tobacco-users than debating the pros and cons of the habit. The physician Tobias Venner clearly had more at stake. In his Brief and Accurate Treatise, Concerning the Taking of the Fume of Tobacco, which very many, in these dayes, doe too too licentiously use (London, 1621; see Plate 2.14)(299) he exposed his fear that recreational smoking was rendering his medical fraternity obsolete. Even after the death of James I, broadsheets containing rather coarse invective against tobacco were issued.<300>

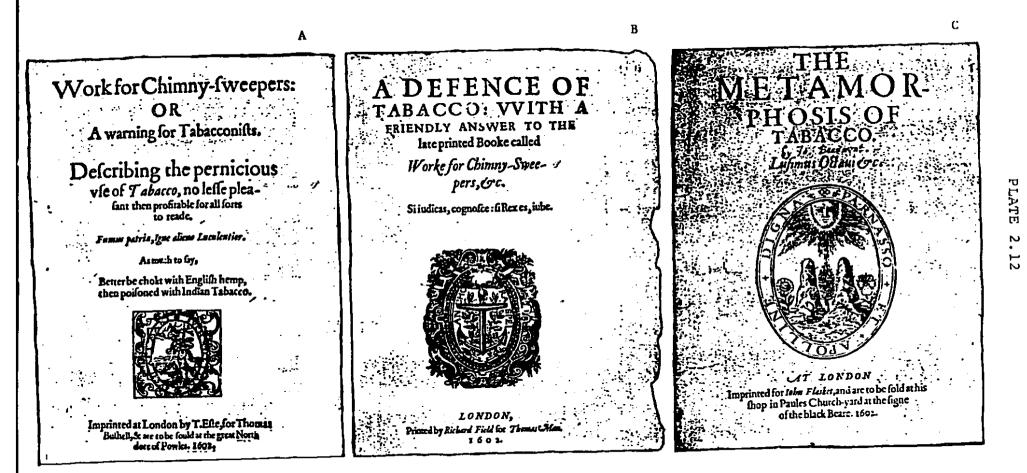


- This is the first illustration of a European smoker.
- Lobacco, komende unt verte ende vizeende Landen / het welcke ster bequaem ende nut is tegjen beel gebieken des hoofen det mage/ende andere leden bes lichaems/ dienende principalijek de Zec-barenta lieden: het welcke den Zefer in die Boerrken wert te kennen gegeben: Obergefer upt 'rEngels. Den vintle te koop tot Rotterdam/ by de Bazie by Joris Bauweils, A'uno 1623.

Eenkozte beschzif-

binge van het wonderlijcke Krupt

(B) The much improved woodcut from the Dutch translation of 1623.



Examples of English literature produced during the seventeenth-century tobacco debates:

- (A) Philaretes' Work for Chimmy-sweepers (London, 1602)
- (B) Marbecke's A Defence of Tabacco (London, 1602)
- (C) Beaumont's The Metamorphosis of Tabacco (London, 1602)

Note the epigraph in example A: "Better be chokt with English hemp, then poisoned with Indian Tabaceo."

THE EPEN THES, TRIALL O A 11.2. TABACCO THE VER TVES OF TABACCO BY Wherein, bis worth is most worthily expreffed : as, in the name, nature, and qualitie of thetaydhearb; hisfociall vie in all Phylicke, with the William Barclay Mr. of Art, and true and right vie of taking it, alivell for the Seafons, CO and times, as alto the Complexions, Dilpofiti-Doctor of Phylicke. ons, and Conflications, of tuch Bodies & Perfons asarchitteft : nudio a homit is most profitable to Like u. By E.G. Gent. and Pradicioner in-PHYSICKE. Imprinted at London by R. B. Anno 1604. EDINBY RGH, Printed by ANDRO HART, and are to be fold at his thop on the North fide of the high flrees, slitle beneath the Croffe. Anus Dom, 1614. Imprinted at London, by H. L. for Mathew Lawres, and are to befulde at his fliop in Paules Church-yard, at the figne of the Bilhops-head.

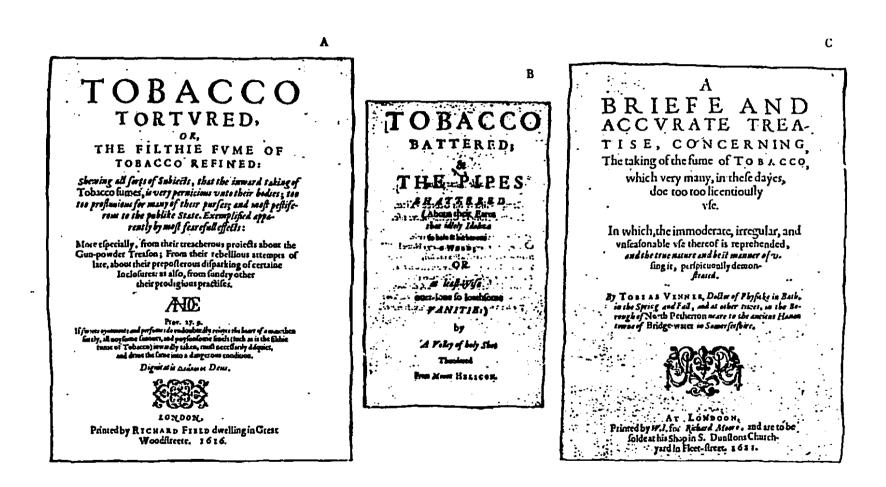
В

Examples of English literature produced duving the seventeenth-century tobacco debates:

- (A) King James I's A Counterblaste to Tobacco (London, 1604)
- (B) Gardiner's The Triall of Tabacco (London, 1610)
- (C) Barclay's Nepenthes, or the Vertues of Tabacco (Edinburgh, 1614)

PLATE 2.1

С



Examples of English literature produced during the seventeenth-century tobacco debates:

- (A) Deacon's Tobacco Tortured (London, 1616)
- (B) Sylvester's Tobacco Battered (London, 1616)
- (C) Venner's A Brief and Accurate Treatise...Tobacco (London, 1621)

PLATE 2.14

This array of ponderously trite works expresses what must have been an on-going dialectic in the collective consciousness of seventeenth-century English society. While various individuals and interest groups clashed in fervent disputation, the spread of smoking quietly continued with an almost irreversible momentum. As the Dedicatory Epistle to the English translation (1659)<301> of Everaerts De Herba Panacea(302> elegantly put it:

For were the planting and traffick of Tobacco now hindered, millions of the Nation, in all probability must perish for want of food, their whole livelihood almost depending upon it. So many Druggists, Grocers, Tobacco-shops, Taverns, Inns, Alehouses, Victuallers, Carriers, Cutters and Dryers of Tobacco, Pipe-makers, and the like, that deal in it, will prove no less. The necessity of Tobacco, and maintaining the Plantations of it, is almost as great, if we do but consider who they are that buy it only for their own drinking, and cannot abstain from it. Sea-men will be supplied with it for their long voyages: Souldiers cannot want (for) it when they keep guards al! night, or are upon other hard duties in cold and tempestuous weather, Farmers, Plough-men, Porters, and almost all labouring men plead for it, saying they find great refreshment by it, and very many would as soon part with their necessary food, as they would be totally deprived of the use of The Nobility and Gentry who find no fault Tobacco. with it, but that it is too common amongst the Vulgar, do ordinarily make it the complement of all their entertainment and oft-times all their entertaining besides is but a complement. Scholars use it much, and many grave and great men take tobacco to make them more serviceable in their callings. Tobacco is grown to be not only the Physick, but even the meat and drink of many men, women and children. In a word, it hath prevail'd so far, that there is no living without it; that notwithstanding the vast Plantations of it in the West-Indies, all our corn-fields would soon be turned to gardens of Tobacco, were not men restrain'd from it by the Civil Magistrate. It is like Elias Cloud, which was no bigger at first than a mans hand, that hath suddenly covered the face of the earth.<303>

In his Honestie of this Age, Prooving by good Circumstance that the World was never honest till now (London, 1615), Barnaby Rich noted that in London alone there were over 7,000 apothecaries, grocers, chandlers and inn-keepers that survived on selling tobacco.<304> Apperson estimates that by 1625 the English had more tobacco shops than alehouses or taverns.<305> These are clear indications of the direction in which the smoking controversy was moving during this period.

## farmers and the Crown

It is obvious that, to satisfy an enormous population of smokers, the country needed to procure considerable quantities of the leaf. Since Hawkins, Hariot and other Englishmen introduced the eastern North American species (N. rustica) to their homeland, this type of tobacco became known as "English tobacco" and remained popular in England well into the seventeenth century.<306> The species, which was also known as "petite nicotiane," "petum femelle" and "yellow henbane,"<307> was likely not grown before 1565, and was certainly propagated by farmers in Gloucestershire after 1586.<308>

Despite domestic production of N. rustica in the late sixteenth and early seventeenth centuries, a far greater proportion of the tobacco consumed in England was N. tabacum from Spanish colonial sources.<309> By 1622 the money paid by England to the Spanish colonists had resulted in a serious currency crisis; the enormous tobacco trade had caused England to have one million pounds less of silver than in 1604.(310) Recognizing the impending calamity that might ensue through a trade imbalance with a hostile nation, the still-anonymous C.T. wrote **An Advice How to plant Tobacco in England** (London, 1615)(311) in which the cultivation of **N. rustica** was promoted. For those not fully convinced of the economic and political argument, the author painted a redoubtably unsavoury picture of the Spanish product:

Now besides these harmefull mixtures, if our English which delight in Indian Tobacco, had seene how the Spanish slaues make it vp, how they dresse their sores, and pockie vlcers, with the same unwasht hands with which they slubber and annoynt the Tobacco, and call it sauce **Per los perros Luteranos,** for **Lutheran** dogges; they would not so often draw it into their heads and through their noses as they doe...<312>

By 1619, however, the fledgling Virginia tobacco industry (initiated by John Rolfe in 1612)<313> had grown to the point where the English colonial staple exceeded the Spanish product on the London market.<314> In the same year King James consulted the College of Physicians about the quality of domestic N. rustica, and was advised that it was more harmful than foreign tobacco.<315> The King forthwith issued a proclamation to restrain domestic planting, and cited a number of additional reasons: English soil was required for subsistence-related crops, colonial trade was stymied, and revenues from import duties were lost.<316>

Similar proclamations were made almost every year for the next twenty years; yet despite prohibitions, a greater area of the English countryside was under cultivation in 1638 than in

1619.<317> Still another act prohibiting tobacco planting in England was passed in 1652, but when officials were sent to put it into execution, rioting planters took up arms in defence of what was obviously a strong market for N. rustica.<318> Only in the 1680s were domestic plantations finally quashed by a seemingly endless series of parliamentary prosecutions and military intervention.<319> As MacInnes observes, "the policy of the Government amounted to nothing short of the regulation of the national taste in tobacco in the interests of the colonies."<320> The impact that this decision to promote colonial tobacco production had on the New World will be discussed in the next chapter.

## world-wide prohibitions

The picture one derives from the literature on early English tobacco use and cultivation is one of contumacious persistence in the face of wholesale official opposition. This tendency is repeated over and over in all European and Asian countries in the century following the first introduction of the plant, and one cannot fathom the degree to which tobacco became part of Old World cultures without appreciating the profound disapprobation and resistance it managed to survive.

The English and French official efforts to supress smoking were surprisingly mild when compared to the excesses of other countries. The Council of Bern (Switzerland) placed the prohibition against tobacco among the Ten Commandments, gave the

same penalty as for adultery, and initiated an Inquisition-like the Chambre tribunal known as du tabac to deal with offenders.<321> Adam Oelschlaeger, who visited Moscow in 1634, noted that Tsar Mikhail Fyodorovich Romanov (reigned 1613-1645) had tobacco-users whipped and their nostrils slit.<322> Other penalties cited in the literature include nasal amputation, the bastinado or the knout, deportation to Siberia and even death for incorrigible transgressors.<323> Nikon, who was made patriarch of Moscow by Tsar Alexis in 1652, even attempted to exile a smoker to "the dog-faced tribe (Kalmucks) in hopes that they might devour him. <324>

In Turkey (c.1611), smokers had the stems of pipes thrust through the cartilage of the nose and were seated backwards on mules as they were led through the streets, while tobacco merchants were deprived of their hands and feet and had their shops destroyed.<325> In 1633 Sultan Murad IV (considered the most bloodthirsty tyrant of the Ottoman empire)<326> imposed the death penalty for smoking,<327> on the justifications cited by Fisher:

Partly in order to discourage gatherings in which malcontents discussed the sad state of affairs under his rule, and partially on the pretext that careless had caused the great Constantinople smokers conflagration 1633, he forbade his subjects to in His crusade was given a religious backing when smoke. announced that several centuries earlier it was Mohammed had prophesied that in later days some of his followers would stray from the paths of righteousness so far as to smoke an herb which would be known as tobacco--an astonishing piece of clairovoyance, if only it could be believed. The punishment for violating the royal prohibition was death, usually in a most unpleasant form--a penalty which was inflicted upon as many as eighteen culprits in a single day.<328>

Meanwhile, Abbas I of Persia (Shah from 1587 to 1629) ordered tobacco traders to have their noses, lips and ears cut off, while at least one merchant was burned in a bonfire made from his stock of the plant.<329> Abbas' successor ordered that smokers should have molten lead poured down their throats until death intervened,<330> but even this did little to check the diffusion of the habit. Tobacco also continued to spread in India even after the Mughal Emperor Jahangir (reigned 1605-1627) decreed (c.1617) that smokers should have their lips slit.<331>

In China two imperial edicts against tobacco were issued in 1637 and 1638.<332> The latter decreed that "those who hawk clandestinely tobacco, and sell it to foreigners, shall, no matter what the quantity sold, be decapitated, and their heads exposed on a pike. "<333> A Manchu edict of 1641 also prohibited smoking and declared the practice a more heinous crime than even that of neglecting archery--a practice in which Manchuria prided itself.<334> In Japan the penalties for smoking included imprisonment and the confiscation of property, <335> although Rein observed that "of all the laws of the Tokugawa rule probably none has proved so ineffectual as the edict of 1612 against the smoking and planting of tobacco. <336>

The early seventeenth century is remarkable for the endless series of prohibitions around the Euro-Asiatic continent as nation after nation adopted anti-tobacco legislation.<337> Aside from the usual moral objections to hedonistic practices, these decrees were internally justified through the fear of fire, a concern that subsistence crops were being neglected, and the belief that smoking was prejudicial to health.<338> The spread and persistence of the habit is all the more remarkable given that few social customs faced such ubiquitous opposition: even the most extraordinary measures were ineffective in curbing the fad that gripped Europe and Asia.<339> Goodrich speaks of "an almost world-wide animus on the part of certain members of the ruling class which in a few short decades wore itself out."<340>

is within this context that the seventeenth-century It English (as also the French) experience must be envisioned. In his Counterblaste (1604) King James I wrote of the habit as a "custome lothsome to the eye, hateful to the Nose, harmefull to the braine, dangerous to the Lungs, and the blacke stinking fume thereof, neerest resembling the horrible Stigian smoke of the pit that is bottomless." <341> Within the next year His Majesty increased the duty on tobacco by 4,000 percent<342> and attended the first academic debate on tobacco at Oxford, where he occasionally rose to applaud and assist the negative side.<343> Yet, severe penalties did not accompany James' rhetoric and, as Brooks observes, "on the whole James exercised only a civilized tyranny" while other rulers decreed torture and death.<344> As has been seen, the King repressed domestic tobacco production partly to encourage colonial imports.<345> The English Crown, more than any other, was to reap enormous benefits through tobacco trade into a royal taxation and even turned the monopoly.<346> Throughout much of Europe, economic considerations

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began to supplant moral fulminations.<347> "Tobacco was vindicated," Best concludes, "not because there was a revolution in morality, but because governments discovered that it provided an economic foundation for colonialism and a new source of tax revenue."<348>

#### F) CONSPECTUS

The sixteenth-century discovery and adoption of tobacco by Europeans effected a remarkable transculturation in which an Amerindian usage infiltrated the politics, economics, social life and medicine of western civilization and ultimately the world as a whole. No other plant in history has had such a profound impact on human thinking, and no Amerindian behavior was so ubiquitously accepted by Europeans as smoking.

Although the Spaniards and the Portuguese had expressed some interest in tobacco in the early sixteenth century, it was only after the plant was introduced into France (c.1560) and England (c.1565), that Europeans began raving over its presumed salubrious virtues. Through the works of Liébault (1567), Monardes (1571), Gohorry (1572), Everaerts (1587), Chute (1595) and others, tobacco rapidly gained a reputation as a catholicon suitable for every conceivable malady known to sixteenth and seventeenth-century medicine. Here, indeed, was "joyfull newes out of the newe founde worlde;" the panacea long-sought by medieval alchemy was found at last in a strange continent and among "barbarous" tribes who, as Hariot exclaimed, "know not many grievous diseases, wherewithall we in England are often times afflicted." For well over a century, tobacco was the most oft-recommended cure for everything from flatulence to the plague.

Aside from illustrating the curious interaction of human mind set and body function (through the placebo effect), this persistent idea also suggests that the mechanics of smoking fitted in well with the contemporary humors theory. In other words, European medical thinking offered the necessary predisposition to allow the transculturation of this entirely foreign behavior. Yet, tobacco-use did not merely become a passive reflection of western ideology but soon played an active role in redefining the social, economic and political priorities of nations with colonial aspirations.

As tobacco-use evolved from a medical prescription to a baneful recreation, Europe and Asia began to experience the psychological discomfort of internal inconsistencies--what Festinger would have called "cognitive dissonance." Excessive abuse had created innumerable problems, yet officials did not wish to deny the populace access to a panacea, nor deprive the Royal treasuries of enormous taxation revenues. Besides, even the threat of capital punishment did little to impede the spread of smoking.

The ambivalence, that was manifested on the political and

economic levels in the form of contradictions in public policy, was expressed on academic and moralistic levels by a spate of lucubrations published for or against the moderate use of tobacco. As the English, French and Dutch expanded their colonial efforts in seventeenth-century North America, they brought with them, in addition to pipes and tobacco, the ideas and disputations accompanying the plant and associated habit.

In the next four chapters the effects of these ideas on the Amerindian side of the transculturation process, during the period in which tobacco criss-crossed the Atlantic and became a valued commodity in both hemispheres, will be explored. The manner in which both sides contributed to a Euro-Amerindian pipe/tobacco/smoking complex that ultimately played an important role in the semiotic organization of culture contact, will also be investigated. CHAPTER THREE SHARING TOBACCO IN THE EARLY HISTORIC PERIOD

## A) CULTURE CONTACT: THE FIRST CENTURY

The sixteenth-century Spanish and Portuguese hegemonies in Mexico, the West Indies, Central America and South America gave these colonial nations a head start in the transculturation of tobacco and smoking. As was noted in the last chapter, <1> the Portuguese had already been cultivating tobacco in Brazil since 1534; indeed, by 1548 sixteen Portuguese settlements along the Brazilian coast were exporting tobacco to Lisbon.<2> The Spaniards most likely also had plantations by 1534-35, for there is evidence that by this time they had introduced Nicotiana tabacum from the Yucatan into Santo Domingo.<3> These early efforts were primarily intended to assuage rampant addiction among their own people, <4> and the experience gained through several decades of colonial production in the West Indies, Venezuela and Brazil thus allowed the Portuguese and Spaniards to control the lucrative English, French and Dutch markets at the close of the century.<5> Despite the almost constant war with England between 1588 and 1604, Spanish exporters managed to smuggle large quantities of the leaf onto foreign ships bound for English ports<6>--a situation that evolved into an alarming trade imbalance after 1604 and eventually contributed to the English currency crisis of the early seventeenth century.<7>

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## phase one (1497~1565)

While Europe was learning to smoke and obtaining most of her tobacco from Spanish and Portuguese colonial sources, an event of significance momentous to the Amerindian side of the transculturation of tobacco was taking place: the exploration and colonization of the eastern seaboard of North America by England, France, Spain, the Netherlands and Sweden. Opportunities for culture contact had already arisen through the voyages of John Cabot (1497), Caspar Corte Real (1501), the Bristol merchants (1501 and 1503), Sebastian Cabot (c.1508-9), the Rouen merchants (1509), Juan Ponce de León (1513), John Rastell (c.1519), Estavoa Gomes (1524), Lucas Vásquez de Ayllón (1526) and Pánfilo de Narváez (1528).<8> Moreover, numerous anonymous French, Breton, Portuguese, Basque and English fishermen made annual trips to the Grand Banks and Labrador to exploit maritime resources in the early sixteenth century.<9>

Accounts of the earliest expeditions are scanty, and one finds no record of anything even remotely resembling tobacco, smoking or pipes until the Florentine mariner Giovanni da Verrazzano cruised the stretch from North Carolina to Nova Scotia in 1524. Although Berlin denies that the navigator mentions tobacco or pipes, <10> a footnote by Verrazzano himself may offer clues to the contrary:

In Arcadia we found a man who came to the shore to see who we were: he stood suspiciously and ready for flight. He watched us but would not come near...and as we coaxed him, he approached to within about two fathoms of us, and showed us a burning stick, as if to offer us fire. And we made fire with powder and flint, and he trembled all over with fear as we fired a shot. He remained as if thunderstruck, and prayed, worshiping like a monk, pointing his finger to the sky, and indicating the sea and the ship, he appeared to bless us.<11>

Morison surmises that the burning stick "must have been a lighted tobacco pipe, and the poor fellow was simply making a friendly gesture, offering the intruders a pipe of peace. They, having neither seen nor heard of tobacco, took his intentions to be hostile and fired a blank shot from a musket."<12> This interpretation must remain conjectural, as must also the reading of a second passage in Verrazzano's account; the original Italian narrative notes that natives of the Narragansett Bay region "cure themselves with fire."<13> In his English edition (published in 1600) Hakluyt added a marginal note reading: "Their curing with Tobacco and perfumes,"<14> though this was an unnecessary inferential leap since shamanic treatments employ application of heat as well as the blowing of tobacco smoke.

The extraordinary **Relación**<15> of the Spaniard Alvar Núnez Cabeza de Vaca, who claimed to have spent the years 1528-36 traversing the southern region of the North American continent, mentions that "everywhere they produce stupefaction with a smoke, and for that they will give whatever they possess."<16> "Burning sticks" and "smokes" are all one finds in the North American literature until Cartier's indisputable rendering of St. Lawrence Iroquoian pipe smoking in 1535-36.<17> Yet, even this latter account, while of great ethnographic importance, does not suggest the transculturation of tobacco, and, as has already been noted, it preceded by many years the introduction and acceptance of the plant and habit in Europe.<18>

Between the French penetration of the St. Lawrence in 1535-36 and the establishment of a Huguenot colony in Florida in 1564-65, there are few references to the use of tobacco or pipes in the chronicles relevant to North American exploration. Despite the extensive travels of Hernando de Soto from 1539 to 1542 through modern-day Florida, Alabama, Mississippi, Tennessee, Arkansas, Oklahoma and Louisiana, no mention is made of smoking or pipes.<19> Blakeslee and Dickason attribute this curious lacuna partly to a penchant for secrecy and a general disinterest ethnographic recording characteristic of the in Spanish historical literature of the period. <20> Hernando de Alarcón, who sailed up the Gulf of California and a portion of the Colorado River in 1540, did, however, observe native peoples who "carried their pipes with them to perfume themselves, like as the people of New Spaine use Tabacco. "<21> The accounts of Marcos de Niza (1539), Francisco de Ulloa (1539), Melchior Diaz (1539-40), Francisco Vázquez de Coronado (1540-42), Juan Rodriguez Cabrillo (1542-43), Luis Cáncer (1549), Tristán de Luna and Angel de Villafane (1559-1561) again offer no details.<22>

The same may be said of the accounts of voyages to northeastern North America by Robert Lefant (1537), Francisco Clemente de Odelica (1542), Jean Alfonse de Saintonge (1542), Jean-François de la Rocque de Roberval (1542), and Jehan Mallart (c.1545-47), <23> although in many cases the absence of tobacco references may also be the result of contact with non-smoking Amerindian and Inuit groups. Moreover, it must be observed that no documentation for the period 1545 to 1580 has survived which illustrates European activity along a significant stretch of the eastern seaboard: New England, the Maritimes and the mouth of the St. Lawrence River.<24> One should not, therefore, expect references to tobacco in this region, despite the presumably sustained contact of French, Spanish and other traders with pipe-smoking Amerindians.

## phase two (1565-1597)

In the south, the silence is finally shattered in 1565 with John Sparke's remarkable testimony on Amerindian and French smoking in Florida, as well as Le Moyne de Morgues' drawing of a Timucua pipe.<25> As indicated in the last chapter, it was during the 1560s and 1570s that England and France first appropriated tobacco and incorporated it into the humors paradigm of sixteenth-century medical thinking.

Despite a flurry of interest in the new panacea and the nascence of extensive smoking, especially among sailors, other narratives of voyages to, and activities in, eastern North America, including those of Jean Ribault (1562), Dominique de Gourgues (1568), Pedro Menéndez de Avilés (1565-1574), William Winter (1571), Martin Frobisher (1576-78), Francis Drake (1579),<26> Simon Fernandez (1580), John Walker (1580), Jacques Noel (1581-86), Humphrey Gilbert (1583), Stephen Bellanger (1583), John Davis (1585-87) and Richard Fisher (1593) say nothing of tobacco.<27> Important Spanish expeditions to New Mexico and up the West Coast, including those of Agustin Rodriguez and Francisco Chamuscado (1581-82), Caspar Castana de Sosa (1591), Pedro de Unamuno (1587), Sebastian Rodriguez Cermeno (1594-96) and Juan de Onate (1598), also failed to produce information on Amerindian smoking.<28>

The late sixteenth-century picture is not entirely blank, however. Antonio de Espejo made an extensive tour through Pueblo territory in 1582-83 and recalled that some Amerindians had "fields of maize, beans, gourds, and **piciete** in large quantities which they cultivate like Mexicans."<29> It is of interest that **piciete** (or **picietl**) was the Nahuatl term for **Nicotiana rustica** and became a popular Spanish designation for tobacco.<30>

The Roanoke voyages to the Carolina Outer Banks and environs in the 1580s are relatively well documented(31) and contain valuable information on tobacco and its use. The possibility that Nicotiana accompanied the Amerindians carried off to Europe by Amadas and Barlowe during the first voyage of 1584, has already been entertained.<32> On the second voyage (1585), Grenville and Lane traded the herb from the Spanish in Hispaniola<33> before proceeding to "Virginia" where Hariot recorded the most detailed eyewitness, ethnographic account of tobacco-use in sixteenth-century North America. The 350-word passage (quoted and discussed elsewhere)<34> also mentions the practice of smoking among Englishmen in both the New World and

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the Old, as they attempted to purge superfluous humors from their stomachs and heads. The fourth Roanoke expedition of 1587 saw White gathering "all the corne, Pease, Pumpions, and Tabacco, that we found ripe" in a garden abandoned by a group of Amerindians who had fled out of fear of retaliation for the slaying of a colonist.<35> Theodore De Bry added engravings of a native tobacco garden and a pipe to White's sketches.<36>

Precisely 100 years after the celebrated voyage to northeastern North America by John Cabot, the captain of a French Basque fishing vessel complained that his ship was seized by the English, despite having a valid passport. Martizan Sance de Aristega argued that he had gone to Newfoundland in April of 1597 with the innocent intention to fish, and, besides, had "gott of the Savadges in trucke for tobacco fifty buckskynnes, forty bever skinnes, twenty martins" and a quantity of fish roes.<37> If this claim is reliable, it marks the first recorded instance in which. tobacco had any role in a direct economic transaction between Europeans and the indigenous peoples of North America. Ralph Pastore is, however, suspicious of this allusion to Basque trade with the Beothuk, for "it seems highly unlikely that the Beothuk would have traded anything for tobacco," since these Amerindians are not known to have smoked or grown the plant in Newfoundland.<38> Though this line of reasoning is а non sequitur (history and anthropology have taught us that the initial absence of certain cultural traits does not preclude an often perplexing subsequent demand for such exotica), the reference does seem out of place in the literature of this early period and fits more with the spirit of the next century.<39>

B) CULTURE CONTACT: ENGLISH PRECEDENTS, 1602-1609

As indicated in Chapter Two, the first English treatise devoted solely to tobacco was issued in 1595, and by the first decade of the seventeenth century smoking had become a triumphant national recreation.<40> One recalls that this period saw the publication of numerous pro- and anti-tobacco works including those offered by Philaretes (1602), Marbecke (1602), Beaumont (1602), King James I (1604) and Gardiner (1610).<41> It is therefore not surprising that tobacco now played a much greater role in the literature of North American culture contact.

## Brereton, Archer and Pring

The first important reference is found in John Brereton's account of Bartholomew Gosnold's 1602 expedition to New England titled A Brief and true Relation of the Discoverie of the North part of Virginia (London, 1602).<42> While traveling along the coast of Martha's Vineyard (Massachusetts), the explorers encountered either Pokanokets or Narragansetts with whom they engaged in a limited exchange:

...they gave us also of their Tabacco, which they drinke greene, but dried into powder, very strong and pleasant, and much better than any I have tasted in England: the necks of their pipes are made of clay hard dried (whereof in that Island is great store both red and white) the other part, is a piece of hollow copper, very finely closed and semented together: we gave unto them certaine trifles, as knives, points, and such like, which they much esteemed.<43>

Later in the same narrative is mentioned a further, albeit passing, incident involving tobacco:

They pronounce our language with great facilitie; for one of them one day sitting by me, upon occasion I spake smiling to him these words: How now (sirha) are you so saucie with my Tabacco? which words (without any further repetition) he suddenly spake so plaine and distinctly, as if he had beene a long scholar in the language.<44>

Gabriel Archer, another member of the Gosnold expedition,<45> offers more details in his account of contact with these Southern New England Algonquians on the 18th of May, 1602:

This day there came unto the ships side divers Canoas; the Indians apparelled as aforesaid, with Tobacco and Pipes steeled with Copper, Skins, artificiall strings and other trifles to barter...<

On the 24th and 31st of May, Gosnold and his companions again received tobacco from the native inhabitants living in the vicinity of Martha's Vineyard and Buzzards Bay.<47> A short time before setting sail for England, the Captain went missing for almost three days. Despite leaving the company "in a dumpish terrour," they sustained themselves "with Alexander and Sorrell pottage, Ground-nuts, and Tobacco, which gave nature a reasonable content." <48> Neither Brereton nor Archer appear to have seen the plant growing, and there are no hints that the adventurers contemplated cultivating it. <49>

One year later, in the summer of 1603, Martin Pring spent six weeks at Cape Cod and traded with either Massachusett or Pokanoket Indians.<50> The explorer notes the presence of native tobacco pouches and gardens<51> and relates a curious incident in which the newcomers were again provided with the precious plant:

We had a youth in our company that could play upon a Gitterne, in whose homely Musicke they tooke great delight, and would give him many things, as Tobacco, Tobacco-pipes...and such like, and danced twentie in a Ring, and the Gitterne in the middest of them, using many Savage gestures, singing Jo, Ja, Jo, Ja, Ja, Jo...<

#### Rosier and Jerome

Two years passed before an expedition under George Waymouth reached the coast of Maine where the English, for the first time, encountered the Penobscot division of the Eastern Abenaki. An account of the exploration, written by James Rosier and published as A True Relation of the most prosperous voyage made this present yeer 1605, by Captaine George Waymouth in the Discovery of the land of Virginia (London, 1605), <53> contains detailed information relating to the history of tobacco:

In the evening another boat came to them on the shore, and because they had some Tabacco, which they brought for their owne use, the other came for us, making signe what they had, and offered to carry some of us in their boat, but foure or five of us went with them in our owne boat: when we came on shore they gave us the best welcome they could, spreading fallow Deeres skins for us to sit on the ground by their fire, and gave us of their Tabacco in our pipes, which was excellent, and so generally commended of us all to be as good as any we ever tooke, being the simple leafe without any composition, strong, and of sweet taste: they gave us some to carry to our Captaine, whom they called our Bashabes: neither did they require any thing for it, but we would not receive any thing from them without remuneration.<54>

On the second day of June, "about five a clocke after noone," the narrative continues,

... they came aboord us, and brought us Tabacco, which we tooke with them in their pipes, which were made of

earth, very strong, blacke, and short, containing a great quantity: some Tabacco they gave unto our Captaine, and some to me, in very civill kind maner. We requited them with blead and peaze, which they their Company on shore, seeming very After supper they returned with their caried to thankefull. Canoa to fetch us a shore to take Tabacco with them there; with whom six or seven of us went, and caried some trifles, if peradventure they had any trucke, among which I caried some few biskets, to try if they would exchange for them, seeing they so well liked to eat them. When we came at shore, they most kindly entertained us, taking us by the hands as they had observed we did to them aboord, in token of welcome, and brought us to sit doune by their fire, where sat together thirteene of them. They filled their Tabacco pipe, which was then the short claw of a Lobster, which will hold ten of our pipes full, and we dranke of their excellent Tabacco as much as we would with them; but we saw not any great quantity to trucke for; and it seemed they had not much left of old, for they spend a great quantity yeerely by their continuall drinking: and they would signe unto us, that it was growen yet but a foot above ground, and would be above a yard high, with a leafe as broad as both their hands. They often would (by pointing to one part of the maine Eastward) signe unto us, that their Bashabes (that is, their King) had great plenty of Furres, and much Tabacco. When we had sufficiently taken Tabacco with them, I shewed some of our trifles for trade... Early the next morning, being Munday the third of June, when they had brought our men aboord, they came about our ship, earnestly by signes desiring that we would go with them along to the maine, for that there they had Furres and Tabacco to traffique with us. <55>

This latter invitation was followed by a similar one a few days later,<56> though, by this time, the double lure of "Furres and Tabacco" was insufficient to effect divagation, and the explorers continued several kilometers up the St. George River. Here, Amerindians offered to bring furs and tobacco onto the ship. This, Waymouth and Rosier "perceived to be only a meere device to get possession of any of our men, to ransome all those which we had taken, which their naturall policy could not so shadow, but we did easily discover and prevent."<57> In what may be the first recorded case of such gifts, this same expedition also handed out smoking devices. Rosier recalled that "we gave such things as we perceived they liked, when we shewed them the use: bracelets, rings, peacocke feathers, which they stucke in their haire, and Tabacco pipes."<58> Later, on a trail between the St. George River and Penobscot Bay, Waymouth purposefully dropped a pipe:

Untill his returne, our Captaine left on shoare where he landed in a path (which seemed to be frequented) a pipe, a brooch and a knife, thereby to know if the Salvages had recourse that way, because they could at the time see none of them, but they were taken away before our returne thither.<59>

1605 also saw what must now be considered one of the most peculiar happenings recorded in the voluminous chronicles of this period. It appeared that Henry IV of France had sanctioned a commission to undertake a voyage to America in an English ship (originating at Plymouth) under Captain John Jerome, who was to command a joint Anglo-French crew.<60> Guillaume de la Mothe, who had received the commission, drew up a detailed list of instructions, some of which are particularly noteworthy:

You are to make your way directly to the island of La Trinidad, remembering above all not to go leeward of it, for if you go to leeward you will not be able to reach it, if this happens go to the other islards and attempt to trade above all for tobacco; whether in the said island or in any other place, you are to try to trade for as much tobacco as you can get in exchange for your merchandise and take it away. You are to try to trade for all the maize that you can get, and, this done, go directly on your way to La Florida, either to Santa Elena or some other harbor that you choose, where you will try to exchange your maize and tobacco for the things that they have...<61> Thus, European merchandise was to be exchanged for tobacco and maize in the West Indies, and these goods were then to be traded for other commodities offered by North American Indians. Underlying the proposal for such a series of transactions may have been the idea that many native peoples on the continent were willing to give more for perishable foodstuffs and smoking substances than for copious dispensations of exotic and worthless trinkets.

As fate would have it, the ship was seized by the Spanish in what is now St. Helena Sound (South Carolina), where the English vessel had been busy trading with Amerindians. The ship's captain, physician and clerk were interrogated, and all admitted that the Franco-English expedition had stopped in Trinidad to trade linens, shirts, wine and tools for five hundred pounds of tobacco. The prisoners agreed that, at the time of their capture, they had been obtaining sassafras and china root from the South Carolina natives in exchange for tools and beads.<62> There is little evidence that even part of the tobacco cargo had been employed in the trade and, when the ship was inventoried by the Spanish, it still contained "three barrels full of tobacco, amounting to sixty-five bundles. "<63> Either the West Indies leaf did not turn out to be a "hit" among North American Indians or the crew simply decided it would be more profitable to sell the nicotian panacea, together with medicinal sassafras, to a lucrative European market.

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#### Jamestown and Sagadahoc

In June of the next year (1606) James I granted a charter to the Virginia Company and by December an expedition under Christopher Newport had set out to establish a colony in North America. According to an account, presumably written by George Percy, the explorers anchored at Dominica in the Lesser Antilles in February, 1607 and received fruit and tobacco from the natives in exchange for knives, hatchets and beads.<64> Newport moved north to seek a suitable location for a settlement in the Chesapeake Bay region of Virginia. Percy recalled that in May they landed near what is now Hampton and encountered friendly Amerindians:

They would not suffer us to eat unlesse we sate down, which we did on a Mat right against them. After we were well satisfied they gave us of their Tabacco, which they tooke in a pipe made artificially of earth as ours are, but far bigger, with the bowle fashioned together with a piece of fine copper.<65>

A few days later, the Englishmen were entertained by the "Werowance of Rapahanna" who "caused his Mat to be spred on the ground, where hee sate downe with a great Majestie, taking a pipe of Tabacco: the rest of his company standing about him."<66> The expedition continued up the James River to the "Countrey of Apamatica" where the natives were more ambivalent. As Percy noted, "one of the chiefest standing before them crosse-legged, with his Arrow readie in his Bow in one hand, and taking a Pipe of Tobacco in the other, with a bold uttering of his speech, demanded of us our being there, willing us to bee gone."<67> The colonists finally decided to establish a settlement at Jamestown

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where they came in contact with Paspahegh Algonquians. While walking through the woods a short distance from the English garrison, Percy and four others were greeted by an Indian who took them to a garden of tobacco where samples of the plant were distributed to the newcomers.<68> Two minor ethnographic descriptions of the use of Nicotiana in native ritual were also included in this account.<69>

Gabriel Archer, who was also a member of the 1607 Jamestown colony, recalled a trip up the James River to Arrohattoc where he met friendly natives with whom, he said, "we satt merye banquetting...seeing their Daunces, and taking Tobacco."<70> Archer also noted the presence of native tobacco gardens<71> and understood that in a few years the plant might become a profitable commodity if the colonists learned to cultivate it.<72>

The most important source of information on the Jamestown voyages of 1606-1609 was the testimony of John Smith. While his **True Relation** (London, 1608)<73> offered only a brief allusion to the ritual use of tobacco,<74> his more detailed **Map of Virginia** (Oxford, 1612)<75> contained numerous relevant passages which were again reproduced in his **Generalle Historie of Virginia** (London, 1624).<76> Smith had been responsible for trading corn from the Indians to feed the starving colonists in the winter of 1607-8 and his extensive journeys away from the fort gave him valuable experience in White-Amerindian relations. In the summer of 1608 he explored the head of Chesapeake Bay and encountered sixty Susquehannock Iroquoians who approached the Englishmen with "skins, Bowes, Arrowes, Targets, Beads, Swords, and Tobacco pipes for presents."<77> One such pipe was described as being "3 quarters of a yard long, prettily carved with a Bird, a Beare, a Deare, or some such devise at the great end, sufficient to beat out the braines of a man."<78> Smith also observed that the tobacco pipes of the Massawomeks "much exceeded them of our parts,"<79> and added a number of interesting ethnographic comments on the use of tobacco among the Amerindians of the region.<80>

William Strachey's Historie of Travaile into Virginia Britannia (written in 1612 but published centuries later)<81> was based partly on manuscript materials relating to the 1608-10 Jamestown period. Among other inclusions, the author saw fit to repeat, or rather plagiarize, Smith's account of native pipes and tobacco rituals.<82> At the same time, he did provide valuable personal observations on the subject not recorded elsewhere.<83> Since Strachey only arrived in Virginia after May, 1610, his eye-witness descriptions relating to the transculturation of tobacco are discussed in the next chapter.<84>

Meanwhile, the Plymouth division of the Virginia Company had established the ill-fated Sagadahoc Colony at Fort St. George on the Kennebec River, Maine. A journal of the 1607-8 expedition (under George Popham and Raleigh Gilbert) was written by Davies and is extant in a presumably edited version offered by Strachey in the work just cited. In this account, it was noted that the

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Englishmen were offered tobacco by a Kennebec group of Eastern Abenaki whose ire was subsequently evoked by the rather uncourteous European rejection of their friendly overtures:

Captain Gilbert departed from them, and within half an howre after he had gotten to his boat, there came three canoas down unto them, and in them some sixteen salvages, and brought with them some tobacco and certayne small skynes, which where of no value; which Captain Gilbert perceaving, and that they had nothing ells wherewith to trade, he caused all his men to come abourd, and as he would have putt from the shore; the salvadges perceiving so much, subtiley devised how they might put out the fier in the shallop, by which meanes they sawe they should be free from the danger of our men's pieces, and to performe the same, one of the salvadges came into the shallop and taking the fier brand which one of our company held in his hand thereby to light the matches, as if he would light a pipe of tobacco, as sone as he had gotten yt into his hand he presently threw it into the water and leapt out of the shallop.<85>

#### Hudson

While the Jamestown and Sagadahoc colonies were being established in 1607-8, Henry Hudson was continuing the English interest in the exploration of the far north. Failing to appropriate sufficient funds for a third English expedition in 1609, he decided temporarily to serve the Dutch East India Company and ended up cruising the Halve Maen south, in an effort to explore the eastern seaboard north of John Smith's Virginia.<86> From the account of this voyage written by Robert Juet, an officer on Hudson's ship,<87> it is clear that the explorers landed somewhere in the vicinity of Cape Cod on August 4th. They noted that "the people have greene Tabacco, and pipes, the boles whereof are made of Earth, and the pipes of red Copper. "<88> The leaf and smoking devices must have been highly conspicuous for literally no other ethnographic information is offered in the description of this brief encounter.

After voyaging as far south as Cape Hatteras, Hudson headed north once more, stopping near Sandy Hook, N.J., where Delaware Indians greeted the explorers on September 4th:

This day the people of the Countrey came aboord of us, seeming very glad of our comming, and brought greene Tabacco, and gave us of it for Knives and Beads.(89)

The next day, similar dispensations were recorded on Staten Island:

Our men went on Land there, and saw great store of Men, Women and Children, who gave them Tabacco at their comming on Land...many of the people came aboord...They had red Copper Tabacco pipes, and other things of Copper they did weare about their neckes.<90>

On September 8th, Amerindians again boarded the ship and "brought Tabacco and Indian Wheat, to exchange for knives and Beades."<91> As the Halve Maen entered the mouth of the Hudson River, the crew received the now-customary quantities of tobacco and observed that the natives had "great Tabacco pipes of yellow Copper."<92> In his Nieuwe Wereldt (Leyden, 1625),<93> Johann de Laet added details which may have come from Hudson's own journal:

They always carry with them all their goods, such as their food and green tobacco, which is strong and good for use... The people had copper tobacco pipes, from which I inferred that copper might naturally exist there...<94>

Half-way up the river towards present-day Albany, N.Y., tobacco was "bought for trifles,"<95> and, in the vicinity of Albany itself, Hudson received still more of the smoking substance.<96> European trade goods were also exchanged for tobacco on the return trip down river.<97>

C) CULTURE CONTACT: FRENCH PRECEDENTS, 1603-1613

In the last years of the sixteenth century, French travelers and explorers continued to refer to tobacco, but its novelty had by then disappeared and specifications of its properties and the on the wane.<98> Circumlocutory mechanics of smoking were descriptions in the style of Cartier<99> were no longer necessary. Since tobacco per se was taken for granted, it was easier for Europeans to interject casually their own background \* knowledge of the weed and associated uses. To some degree this had already occurred in Brazil when the humors theory crept into the accounts of the French Huguenots in the 1550s and again in Florida in the 1560s.<100>

It was noted in Chapter Two that the first treatise devoted principally to tobacco was published by Jacques Gohorry as early as 1572 under the title, Instruction sur l'herbe petum ditte en France l'herbe de la Royne ou Medicee.<101> It was also pointed out that many Frenchmen (particularly in maritime ports) consumed tobacco recreationally, as well as medicinally, during the reign of Henry IV (1589-1610), though the habit was not adopted as a general pastime until Louis occupied the throne in the years following.<102> During much of the seventeenth century, social and habitual smoking was primarily associated with the lower classes; snuffing was confined to the aristocracy; and medicinal

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pipes were shared by both.<103>

### Champlain

About the time that tobacco was at its height as a panacea and social smoking was beginning to become more popular in Europe, the so-called "Father of New France," Samuel de Champlain, began his celebrated explorations and colonization of parts of present-day Canada and New England. Prior to these efforts, French activities in northeastern North America had been restricted to a few failed settlements and encounters of fishermen and fur traders with native peoples.<104> Archaeological evidence suggests that these contacts must have been relatively numerous, though the documentary record is exiguous. As has already been pointed out, <105> a single and controvertible source leads one to believe that French Basques may have been trading tobacco for Newfoundland peltry in the late 1590s. It is known that the French had access to West Indies and South American nicotian products during this period, <106> but whether the quantities procured were sufficient to satisfy French consumers, let alone Amerindian traders, remains unclear. For the time being, it must be assumed that tobacco was rarely found among the European goods regularly penetrating into Montagnais, Algonquin, Nipissing and Iroquoian territories in the ten or fifteen years preceding the Champlain era.<107>

Since Champlain was born a commoner in c.1580 at the French seaport of Brouage, it is inconceivable that he had not

encountered pipe-smoking among the lower classes (especially sailors) in the late-sixteenth century. <108> In any case, by the time he had become a navigator on an expedition to the West Indies in 1599-1602, he noted that tabaco was among the "best articles of merchandise" to be found in Puerto Rico. <109> Later, while in Santo Domingo, he observed sailors and others use tabac "otherwise called petun, or the queen's herb" and "take the smoke of it in imitation of the savages."<110> The term tabac<111> had, at this time, not entered popular French parlance and thus required the more popular explications petun (introduced by Barré and Thevet from South America) (112) and herbe à la Royne (after Catherine de Medici's alleged patronage). <113> It is not known whether Champlain consumed the herb at this time, though one can be sure that these prior experiences helped prepare him for the diplomatic smoking he was to encounter in northeastern North 1603 he joined Francois Gravé du Pont on an America. In expedition to the St. Lawrence. During a celebratory occasion near Tadoussac, a Montagnais headman passed his tobacco pipe to Champlain, Gravé du Pont and other participants. <114> This event, recorded in Champlain's Les Voyages (Paris, 1613), <115> may well be the first clear indication of a "passing the pipe" the chronicles of ceremony in North American culture contact.<116>

In 1604 Sieur de Monts sent Champlain on his first reconnaissance voyage down the coast of Norumbega (New England). Near Otter Creek Cove on coastal Maine, the explorer encountered Penobscot Indians to whom he gave "some biscuit, tobacco, and sundry other trifles. "<117> If the French Basque account of 1597<118> is dismissed as too equivocal, then this is the first documented example of the European dispensation of Nicotiana to native peoples of North America. That the Eastern Abenaki had their own supply of the leaf is strongly suggested when it is recalled that less than a year later, George Waymouth and his crew received the native product from the Penobscot.<119> a strange story emerges: the French were giving the Indeed, precious herb to the same native group who were supplying the English. When Champlain and Sieur de Monts returned to the area in 1605, they noted that at least two "Almouchiquois" groups cultivated the plant.<120> This time it was the French who were given "a quantity of tobacco, which they dry and then reduce to powder."<121> The emergence of a bilateral transculturation of the European and Amerindian tobacco complexes can therefore be dated, through documentary evidence, to a period no later than the first five years of the seventeenth century.

The French became increasingly aware that the act of smoking and the presentation of tobacco were, in the eyes of native peoples, part of the silent language of peaceful contact. During a third trip along the New England coast in the fall of 1605, Champlain and Sieur de Poutrincourt took advantage of this knowledge when they deceived a group of Amerindians into thinking that the French had pacifical intentions. Although the natives had brought tobacco and other goods to trade, <122> the explorers were determined to seize these people in order to:

take them to our settlement and make them grind corn at a hand-mill as a punishment for the murderous assault committed upon five or six of our men. But to do this when we were armed was very difficult, since whenever we went to them prepared to fight, they ran away, and betook themselves to the woods where we could not catch It was necessary, therefore, to resort to them. strategem, and this is what we decided...we should take the shallop well armed, and the stoutest men we had, each with a chain of beads and a fathom of match on his and should set these arm, men on shore, where, pretending to smoke with them (each with one end of his match alight, in order not to arouse suspicion, it being customary to carry light at the end of a cord for lighting the tobacco), we were to coax them with soft words in order to draw them into the shallop; and, should they be unwilling to enter, each of our men as he approached was to choose his man, and throwing the beads about his neck should at the same moment put a cord around the man to drag him on board by force; but should they raise too great a commotion, and our men be unable to master them, then, tightening the cord well, our men were to stab them... This was very well carried out, as arranged.<123>

Let not Champlain's pragmatism mask the subtle mockery: the cord intended to light a friendly pipe became a strangler's noose. In the semiotics of culture contact, the same non-verbal language was used for peace or war.

After Champlain spent his first winter in Quebec (1608-1609), he met with two chiefs--a Petite Nation Algonkin and Huron named Ochasteguin. Given а the later notoriety of Iroquoian- speaking peoples for their fondness of tobacco, <124> it is fitting that in this, the first direct contact of the Hurons with the French, Ochasteguin "remained silent, meditating and smoking for some time before finally uttering his harangue. <125> Champlain conspired with the Montagnais, Algonkin and Huron to carry out a raid against the Mohawk up the Richelieu The explorer observed that his native companions were so River.

addicted to tobacco that the extraordinary precautions taken during nocturnal ingression into enemy territory did not include quenching the lights caused by smoking pipes.<126>

Ten years after Champlain diplomatically puffed on a Montagnais-Naskapi pipe,<127> he again records that he "smoked plentifully" during a half-hour silence preceding a palaver with the Kichesipirini (Islander Algonkin) of Morrison Island on the Ottawa.<128> Although a few valuable ethnographic accounts of the role of tobacco in native myth,<129> burial rites<130> and propitiatory ceremonies<131> are given, little else that has relevance to the transculturation of Nicotiana may be gleaned from the voluminous works of the Father of New France.<132>

## Lescarbot

In 1609, 1611 and 1618, Marc Lescarbot published his **Histoire de la Nouvelle France**<133> in which portions of Champlain's narrative were reprinted. Lescarbot also included detailed observations made during his own trip to Port Royal in 1606-7 and recalled that native peoples "demanded to trucke the tobacco they had" in return for French merchandise.<134> He went on to briefy describe the Micmac use of the plant:

The savages, who have no knowledge of wine, or spices, have discovered another means to warm the stomach, and in some sort to destroy the many crudities proceeding from the fish they eat, which otherwise would extinguish their natural heat; this is the herb which the Brazilians call **petun**, the Floridians tobacco,<135> the smoke of which they inhale almost every hour, as we shall relate more at length in the chapter on the Soil, when we come to speak of that herb.<136> In a later section of his work, Lescarbot provides the promised account of tobacco:

the smoke of which they suck up with a pipe in the manner of which I shall tell, for the contentment of those that know not the use of it. After they have gathered this herb, they dry it in the shade, and have certain small leather bags, hanging about their necks, or at their girdles, wherein they always have some, with a calumet or tobacco-pipe, which is a little horn with a hole at one side, and within the hole they fit a long quill or pipe, out of which they suck the smoke of the tobacco, which is within the said horn, after lighting it with a coal which they lay upon it. They will sometimes endure hunger five or six days with the aid of that smoke ... This tobacco smoke taken in at the mouth by sucking, as does a child at the breast, they send out through the nose, and by its passage through the breathing conduits the brain is warmed and its humidities dried up. It also in some sort makes one giddy, and as it were drunk, it opens the bowels, calms the passions, induces sleep, and the leaf of this or the ashes that remain in the pan, heal herb, wounds.<137>

One gains the impression, both from these selected excerpts and from other comments in his work, that Lescarbot appears to profess an ignorance not shared by many of his countrymen. A detailed description of pipes and the mechanics of smoking would seem rather supererogatory in a period when the home country was becoming quite familiar with the habit. The Jesuit Pierre Biard, who was also at Port Royal in 1611, appeared totally acquainted with the practice and observed that Amerindians "use tobacco, and inhale the smoke **as is done in France."** (138> It is possible that, as a lawyer, Lescarbot was addressing his fellow literate middle class, who, for the most part, did not employ **petun** until snuffing became the rage.(139> On the other hand, the author almost certainly knew of the contemporary beliefs in the medical virtues of smoking since he repeats the humors theory (i.e.: "the brain is warmed and its humidities dried up")--a point not derived from Amerindian therapeutics.<140> Lescarbot gives other details on tobacco which are of ethnographic interest<141> and which have been discussed elsewhere.<142>

In addition to the nouns tabac and **petun** (which he inconsistently spells pethun, petum and petu), <143> Champlain also employs the verb **petuner** for smoking, <144> and another noun, for a pipe.<145> Lescarbot generally petunoir, follows Champlain's usage (if not his esoteric orthography), <146> though in two instances he slips in calumet for petunoir. <147> Popular French etymological dictionaries trace petuner and petunoir only back to Lescarbot, <148> but these derivatives were likely in sporadic use in the late sixteenth century.<149>

# La Tabagie

The same probably also holds true for another curious appellation employed by Champlain and Lescarbot; in their descriptions of native banquets or feasts the term **tabagie** is encountered.<150> Although some authorities say this word is derived from **tabac** and trace it to Lescarbot,<151> Champlain's modern editor, H.P. Biggar, argues that it "must have been an Indian word adopted by Champlain and after him by Lescarbot in its signification of feast or banquet."<152>

The suspicious similarity of **tabagie** with the numerous derivatives of the Spanish word for **Nicotiana** should not be

dismissed so readily, and one is prompted to re-examine Biggar's hasty conclusion that this was originally an Algonquian term. In introducing the neologism neither Champlain nor Lescarbot treat **tabagie** as a native word but merely add the explanatory phrase "**qui veut dire festin.**"<153> It is possible that this was a little-known derivative of the Spanish **tabacco** which both authors felt required an explication, in the same way it needed to be made clear that **tabac** was the familiar **petun** or **herbe a la Royne**.

Why this obscure derivative was used instead of a clearly French or Algonquian term is, perhaps, partly suggested by clues provided in Lescarbot's discussion of Micmac linguistics. While the lawyer does not include **tabagie** in his French-Micmac dictionary, <154> he deals with the word in an unexpected context:

It might also be noticed that...their words commonly end in **a**, as in souriquois, souriquoua; captain, captaina; norman, normandia; basque, basquoa; a marten, martra; a banquet, tabaguia, etc.<155>

Later, in a chapter titled La Tabagie, Lescarbot adds a footnote reading:

Le Suavage dit, **Tabaguia**, c'est à dire Festin(156) All of this indicates that, in a Micmac pidgin, **tabagie** became **tabaguia** in the same way that **basque** became **basquoa**. Indeed, Lescarbot added that "for the sake of convenience they speak to us in a language more familiar to us, with which much Basque is mixed; not that they care greatly to learn our languages...but by long frequentation they cannot but retain some few words."<157> It would appear that, during their intercourse with Basque or French speakers, the Micmac acquired a relatively obscure derivative of the Spanish tabacco which itself had originally come from America.

The question as to why a derivative of tobacco became a name for "feast" in the pidgin language of natives and newcomers remains to be answered. Most probably this had something to do with the ubiquitous presence of pipes at native banquets, councils and similar gatherings (see Plates 3.1 and 3.2).<158> Lescarbot noted that Amerindians had "no other greater delicacy in their **tabagies**"<159> than tobacco. Both his and Champlain's descriptions of such feasts are filled with references to smoking.<160> To believe that this is merely a fortuitous linguistic "fluke," stretches credulity unnecessarily.

For these reasons and the fact that one is unable to locate a word resembling **tabagie** in the languages of any of the indigenous peoples contacted by the French, it does not appear likely that it was a native word as Biggar suggests. Wiener also searched in vain for an Amerindian equivalent, finally found a similar word meaning "a great feast" in Guinea and dismissed an association with tobacco as coincidental.<161> Given the curious diffusionist thrust of Wiener's research, his peculiar conclusion that Champlain's **tabagie** "is an additional proof of the African influence upon Indian matters"<162> is not wholly unexpected.

What is more surprising is that Biggar, as well as a number of etymologists, failed to recognize that **tabagies** (also known as "tobagies" and "tabernae tabaccanae") were smoking taverns or local meetinghouses and men's clubs where pipes and tobacco were sold in late sixteenth and seventeenth-century Europe.<163> That such establishments were common in Lescarbot and Champlain's time is evidenced by a description of one by Marc Antoine Gérard de Sainte-Amant in a sonnet inspired by personal observation at Belle-Ile-en-Mer in 1617-18.<164> Pernety, an eighteenth-century observer, drew a clear comparison between the general atmosphere of European and Amerind **tabagies**:

tabagies Lorsque j'entre dans les Angloises, Flamandes, dans les Musicaux Hollandoises, ou Allemands, Danois ou Suédois, il me semble être transporté dans un Carbet de Caraibes, ou de Sauvages du Canada...Dans les tabagies de notre Continent on voit des gens assemblés pour passer des journées entieres appuyés nonchalamment sur le bout d'une table couverte, ou sétirés dans un coin le verre à la main, la pipe à la bouche... <165>

To early Basque and French explorers and traders, the Amerind banquets and councils, where pipe-smoking elders planned strategies around hearths, may have seemed appropriate analogs to the taverns in which local commoners sat around a table, puffing pipes and discussing current events (see Plate 3.3).<166> If so, this is an interesting example of how the newly acquired European tobacco complex became integrated into descriptions of North American native life. Lescarbot, himself, was prone to similar parallels:

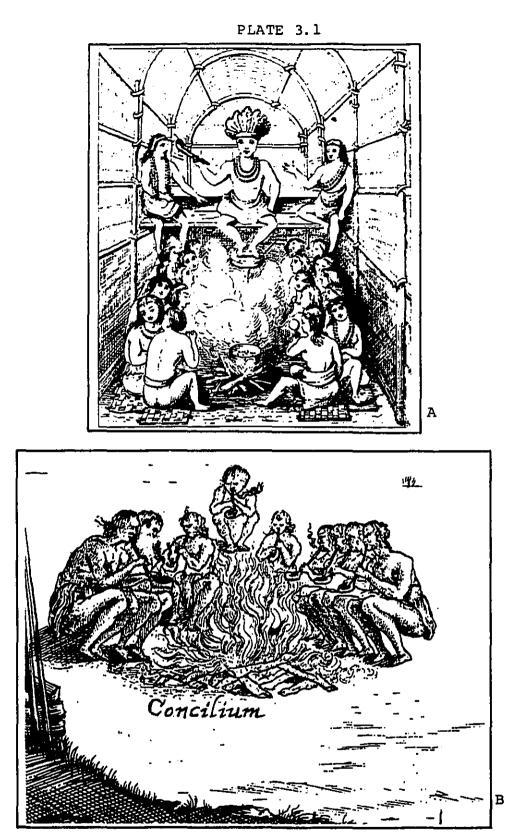
Then as in these parts one man drinks to another, lifting his glass to him to whom he has drunk, as is done in many places, and particularly in Switzerland, so the savages wishing to feast somebody, and to show him sign of amity, after having smoked, present the pipe to him whom they like best...<167> They have no other greater delicacy in their banquets <tabagies>, and can make no greater cheer to a visitor than with this <tobacco>, as in these our parts one presents his friend with some good wine; in such sort that if one refuse to take the tobacco-pipe when they present it, it is a sign that he is not adesquidés, i.e. a friend.<168>

Whatever its etymology, the **tabagie** was where both natives and newcomers found similar surroundings and a common humanity. It is, perhaps, a suitable metaphor for transculturation itself.

This metaphor was, parenthetically, later strengthened by an unusual parliamentary institution known as the **Tabakscollegium** which was initiated by Frederick William I (reigned 1713-1740). Here, the "Smoking King of Prussia" met with his ministers, generals and advisors in sessions strikingly reminiscent of Iroquoian and Algonquian councils (see Plate 3.4).<169> Carlyle was to call it "a parliament reduced to its simplest expression, and, instead of parliamentary eloquence, provided with Dutch clay pipes and tobacco."<170> Meanwhile, Joseph Lafitau, always the comparative ethnologist, could not, in his Moeurs des sauvages Ameriquains, comparées aux moeurs des premiers temps (Paris, 1724),<171> restrain the likening of Amerindian councils to European institutions:

They are a troupe of dirty men seated on their backsides, hunched up like monkeys, with their knees up to their ears, or lying in different positions, either flat on their backs or with their stomachs in the air, who, all of them, pipes in their mouths, treat affairs of state with as much coolness and gravity as the Junta of Spain or the Council of the Sages at Venice.<172>

Marryat was so impressed by the manner in which the pipe brought wisdom to native councils and "laconic delivery to their sentiments," that he suggested "it would be well introduced into our own legislative assembly."<173>

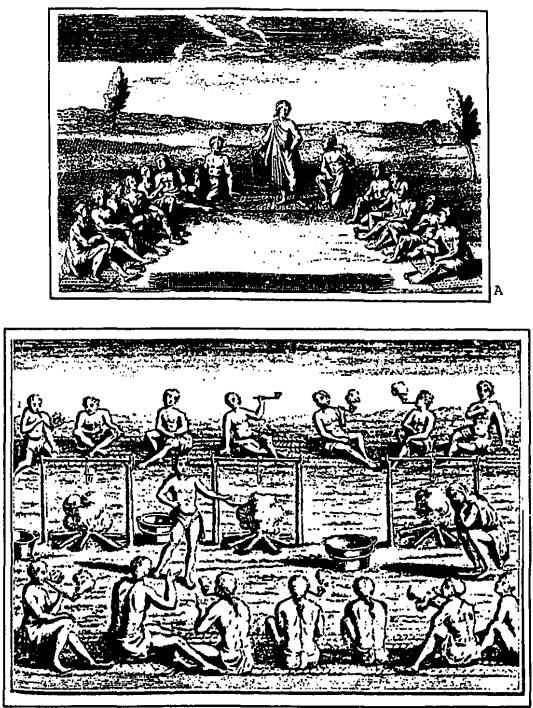


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Figure A is a detail from John Smith's *A Map of Virginia* (1612) showing the Algonquian chief Powhatan holding a pipe and presiding over a council. Figure B is a detail from *Novae Franciae Accurata Delineatia* (possibly drawn by F.J. Bressani in 1657) showing Huron council members smoking pipes. Such map illustrations corroborate seventeenth-century textual sources which emphasize the importance of tobacco at native gatherings of all kinds.

PLATE 3.2

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Two plates from Joseph Lafitau's *Moeurs des sauvages Ameriquains* (1724) illustrating the ubiquitous presence of pipes at Amerindian sociopolitical and festive functions. In Figure A three council members are using smoking devices while four more pipes are resting on the ground. In Figure B eight of the sixteen participants are shown smoking as they silently communicate with each other and the spirit world. From the beginning, Europeans were obliged to participate in this non-verbal component of culture-contact.

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Cuts of seventeenth-century European tobacco taverns or *Tabagies*. These establishments blended the Amerindian smoking complex with the European alehouse to create forums for the discussion of current events.





Painting of the *Tabakscollegium* of Frederick William I. Here the "Smoking King of Prussia" met with his ministers, generals and advisors in sessions stikingly reminiscent of Iroquoian and Algonquian councils. The transculturation of pipe smoking made Europeans and Amerindians behave a little more like one another, which greatly facilitated culture contact in the seventeenth and eighteenth centuries. D) CONSPECTUS

The surviving sixteenth-century literature on North American exploration offers a dozen individual accounts of, or allusions to, tobacco and pipe smoking. Of these references, half are of such an ambiguous, apocryphal or controversial nature as to be of little value in studies of transculturation. This leaves five accounts and several drawings attributed to Cartier (1535-36), Sparke (1565), Le Moyne de Morgues (1565), Hariot (1585), White (1587) and De Bry (1590).

Although these eyewitnesses managed a combined total of less than 700 words on the subject, one may glean valuable ethnographic information about native tobacco-use among St. Lawrence Iroquoians, North Carolina Algonquians and the Timucua of Florida. Also recorded are both negative and positive reactions to smoking, and the fact that the latter gave rise to widespread habituation among Europeans. By the mid-1580s there is direct evidence that Englishmen were collecting **Nicotiana rustica** in North America for their own use.

What is absent in these early sources is any suggestion that tobacco leaves or their consumption were prominent in the contact of Amerindian and European cultures. Pipes, tobacco and smoking were certainly common elements in both formal and informal

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interaction of prehistoric native groups. Yet, despite hundreds of contacts between these same natives and the sixteenth-century newcomers arriving in big ships, not a single indubitable record survives of the presentation of tobacco or pipes by the host to the quest. This is, of course, partly a function of the perfunctoriness of the literature, but it is also the result of two very different peoples suddenly interacting in a third, and as yet poorly defined, cultural domain. Previously, when Amerindians interacted with Amerindians, tobacco served as a silent, albeit familiar, vehicle of communication. Now, in the period of contact with Whites, the semiotic rules were poorly understood. Neither side appreciated what tobacco meant to the other. Europeans were still taking their first tentative and awkward puffs on makeshift pipes; the two sides of transculturation were unbalanced and neither side had much to offer the other. With the turn of the century this situation was to change dramatically.

Tobacco, the panacea, stormed the European collective consciousness on the eve of the first intensive English exploration and colonization of North America. The same men who, in 1600, walked the streets of London, Dartmouth, Bristol and Plymouth, puffing eagerly on their social and prophylactic pipes, were soon to stroll the sand banks of eastern North America. Here they were greeted by tobacco-wielding Amerindians who possessed a familiar and highly desirable commodity.

A number of conclusions may be drawn from this survey of the

first decade of seventeenth-century culture contact. First, it is apparent that, by this period, most sailors, officers, captains and colonists were familiar with tobacco, and that many were addicted to smoking as much as (if not more than) their countrymen back home. A few clues suggest that the explorers sufficiently acquainted with either the West Indies or were European domestic leaf to allow an assessment of the relative sun-dried ("green") Amerindian Nicotiana of palatability rustica.<174> In 1602 the native product was deemed strong, pleasant and better than the English variety. Three years later Rosier admitted that it was "excellent, and so generally commended of us all to be as good as any we ever tooke." Hudson agreed (in 1609) that it was "strong and good for use." Contrary to the inferences of Quinn and Quinn, <175> Englishmen who, after all, had themselves been cultivating Nicotiana rustica in their homeland since the 1580s, <176> did generally appreciate the North American variety during the pre-Jamestown period.

Secondly, one is immediately struck by reports of native clay pipes modified with copper found among the Eastern Algonquians in 1602 and Virginia Algonquians in 1607. To these must be added the red and yellow copper tobacco pipes observed in 1609 by Hudson's crew near Cape Cod, Staten Island and the mouth of the Hudson River. The significance of these important allusions to copper in the Amerindian pipe complex will be discussed in greater detail in Chapter Six.<177>

A third important conclusion suggested by the testimony of

the 1600-10 explorations is that Europeans were, for the first time, bringing tobacco to the New World. Champlain, for example, distributed an unspecified quantity to the Fenobscot of coastal Maine in 1604. While a Pokanoket Indian was being "saucie" with Brereton's tobacco, it seems obvious that, during the seminal decade of the seventeenth century, Englishmen had as yet little or no tobacco to offer their native hosts.<178> The plant was still somewhat of a luxury, and the few available leaves were the product of a nascent domestic cultivation, obtained through sporadic trade and piracy in the West Indies or, more commonly, purchased at considerable cost from Spanish smugglers. One must wait until well into the seventeeth century before tobacco is routinely dispensed to native smokers.<179>

Rosier and Waymouth were given local tobacco to smoke in both native and their own (English) pipes. That there must have been a significant demand for pipes among English settlers is evidenced by the presence of Robert Cotten "a Tobacco-pipe-maker" in the 1608 Jamestown colony.<180> Also known is that the English handed out tobacco pipes to the Penobscot in 1605, thereby establishing a precedent that was to have enormous ramifications in the succeeding history of Amerind tobacco-use.<101>

What is quite clear, and perhaps much more surprising, is that Amerindians were giving substantial quantities of tobacco (and even smoking devices) to the newcomers. One can be relatively certain that the twenty-five recorded occurrences of this practice between 1602 and 1609 represent only a sampling of

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the total amount of tobacco transfered to English and French pipes in this period. It is probable that, in some cases, these dispensations were an extension of the ubiquitous Amerindian proclivity to welcome strangers and friends with a friendly smoke--a kind of rudimentary calumet ceremony accompanied by an exchange of gifts. <182> It is apparent from the wording of the texts, however, that many cases involved the actual bartering of trade goods in the spirit of a European market economy. <183> The immediate and frequent offerings of furs and tobacco strike one as an almost impromptu reflex and suggest that the natives had foreknowledge of the kinds of goods valued by the strangers. <184> To the vexatious chagrin of King James, the English had become inveterate smokers and the "savages" of America now knew it. Indeed, Englishmen had already recognized that good nicotian products could be obtained directly from the inhabitants of the New World, thus circumventing Spanish and Portuguese imports. Several sixteenth-century precedents for the Amerindian practice of giving tobacco to the English are recorded in other regions of the Americas.

The first of these is said to have occurred as early as Francis Drake's arrival in present-day California in 1579. Fletcher's account of this voyage, as edited in Drake's **The world encompassed** (London, 1628),<185> speaks of a herb called **Tobah** or **Tabah** which was presented to the explorers by native peoples of the coast.<186> Two sixteenth-century accounts of the same incidents (published by Hakluyt<187> and De Bry<188>) refer to this plant as **Tabacco**. Since both botanical identification and etymology have proven problematical, the passages in question have generated considerable controversy, and it remains unclear whether the chroniclers of the voyage were referring to a **Nicotiana** species or even to a smoking substance in the first place.<189>

More certain is the evidence that Drake obtained a "great store of Tobacco" from the natives of Dominica before arriving at Roanoke in 1586.<190> Moreover, on the last voyage of Drake and Hawkins to the West Indies (1595-96), the English again encountered Amerindians in Dominica who offered tobacco and other products in exchange for knives, hatchets and saws.<191> Meanwhile, Robert Dudley, who undertook an expedition to the Spanish Main in 1594-95, traded tobacco with the natives of Trinidad.<192>

During the summer of 1603, Bartholomew Gilbert was despatched from London with instructions to purchase tobacco in the West Indies, but, while searching for lost colonists near Chesapeake Bay on the return trip, he was ambushed by natives and did not survive to recount his experiences.<193> Thomas Canner's account of this expedition<194> relates that the English traded tobacco and other produce from the indigenous inhabitants of Saint Lucia in exchange for bugles, knives and whistles. Contrary currents and scant winds forced a change of plans and Gilbert decided it was "good to let Saint Vincent alone, although in it is the best Tobacco of all the Ilands."<195>

It must also be recalled that John Jerome and his Anglo-French crew obtained tobacco from the natives of Trinidad in 1605,<196> while Henry Challons did the same in Saint Lucia in 1606, <197> and Christopher Newport procured a quantity in Dominica the following year.<198> Robert Harcourt waited anxiously for a load of tobacco while anchored off Trinidad in 1609 but was forced to leave empty-handed.<199> By 1615 the still-anonymous C.T. would write:

The naturall colour of Tobacco is a deepe yellow, or a light tawnie: and when the Indians themselves sold it us for Knives, Hatchets, Beads, Belles, and like merchandise, it had no other complexion... <it> is brought from the coast of Guiana, from Saint Vincents, from Saint Lucia, from Dominica, and other places, where we buy it of the naturall people...<200>

The English were clearly dissatisfied with a reliance on their enemy's (Spanish) colonial tobacco; <201> nor were they sated with the meager results their own domestic cultivation had to offer. Throughout the last decade of the sixteenth century the first decade of the next, English ships, whether and despatched for purposes of commerce or exploration, routinely stopped in the West Indies to trade the leaf from indigenous inhabitants. With the beginnings of intensive exploration on the eastern sezboard of North America in the 1602-1609 period, Amerindians of the region were made aware that they possessed a substance of great value to the trinket-bearing strangers. Though there are sporadic references throughout the ethnohistoric literature of the next three centuries suggesting that natives continued to provide Europeans and Eurocolonials with tobacco (see Table 3.1), this practice became increasingly rare after the establishment of the Jamestown colony.

For Amerindians the transactional value of tobacco was by no means confined to purely economic considerations. Originally, the practice of offering Nicotlana may have been imbued with the symbolism surrounding the relationship between native peoples and their hierarchical pantheon. Tobacco presents were absolutely essential to invoke the blessings of the spirit world, and a majority of Amerindians believed that this plant was a sustenance of the gods. The white-skinned strangers were not only anomalous enough to fit in the "other-world" category of native folk taxonomies, but their rampant addiction to smoking fit well with the image of tobacco-hungry deities.<202> Just as the Spanish learned that native peoples of the New World were humans rather soul-less animals, Amerindians soon recognized that the than smoking gods on large ships were mortals for whom tobacco was a human need rather than a supernatural aliment.

This realization had no effect on the Amerindian dispensation of tobacco to Europeans, since tobacco in the native symbolic system was multi-faceted; not only was the plant an appropriate gift for other-than-human beings, but it also figured prominently in exchanges between humans.<203> Trading tobacco to Europeans as humans rather than presenting it to them as gods did not require a major conceptual shift, since the two types of transactions were homologous in Amerind thinking.

Whether perceived as gods or mortals, the foreigners were

not quite so strange after all. Native peoples were initially in a position to trade what few surpluses they had to reinforce the tobacco complex of mariners, captains and explorers. Mouldy stocks, suffering from weeks of transatlantic voyage, were replenished and two cultures sat on mats, smoking in silence. If 1560 to 1600 was the period during which Europe was learning to smoke, then the following decade was the time when the lesson was over and natives and newcomers began smoking together. As must have been the case throughout much of its diuturnal prehistory, tobacco once again became a symbol of culture contact.

This precedent had important implications for, as a symbol, tobacco was a device for signification and smoking a vehicle of communication. The semiotics of culture contact was not merely a matter semantic organization--the of phrase books, the dictionaries, the interpreters--it was in large measure a set of meanings conveyed in the realm of non-verbal exchange. As Bruce White points out (in his curious essay on the Iowa Indians' response to Parisian women's dogs), the interaction of Europeans and Amerindians thrived on communication, "not simply through a language of words, but also through a language of objects. "<204>

Part of this "language of objects" involved the corpus of goods being presented or traded to either side. The metal trinkets and alcohol exchanged for beaver pelts reflected the chasmal differences separating the respective cultures of newcomers and natives. Such goods were made use of in ways often unfamiliar, and at times even perplexing, to those who had

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offered them. Worthless baubles (often called "trifles" by the English) became symbols of status and were revered in iconic worship. Metal axes were initially polished and hung around necks like pendants. What was primarily a social beverage in Europe was consumed in America with a religious fervor that eventually generated horrific social consequences. On the other side, beaver pelts were processed into unrecognizable and, from an Amerindian vantage, laughably impracticable headgear.

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If such goods acted as vehicles for signifying the discontinuities of two cultural domains, then tobacco did much to mediate the differences. Eating, urinating, sex and now smoking gave each side an assurance that there was some continuity and perhaps even a **consensus gentium**. Though the respective ideological contexts which distinguished the humors paradigm from shamanism also separated the smoking complexes on both sides of the Atlantic, overt behavior was fundamentally alike.

While Englishmen quickly acquired the language and etiquette of smoking, Quinn and Quinn observe that what they "learned slowly and imperfectly was that market forces were not the primary impulses in exchanges of goods and that ceremonial exchanges must precede value for value bargaining."<205> Indeed, Europeans needed to redraw (if not entirely dispense with) the ethnocentric demarcations separating concepts of trade, gift exchange, non-material reciprocity and political alliance. For their part, Amerindians needed to appreciate the powerful economic motivations underlying what must have been a puzzling

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European insistence that transactions always involve an exchange of material goods at rates of equal value. By 1607-8 both sides were learning the hard way: Raleigh Gilbert had his matchlocks rendered dangerously impotent by an angry group of Kennebec Abenaki after he had dismissed their tobacco and furs as having "no value."<206> Moreover, the emphasis on **ownership** of goods in western ideology sometimes clashed awkwardly with the native emphasis on the **relationship** between individuals exchanging gifts. In their **Relation or Journall of the beginning and proceedings of the English Plantation setled at Plimouth in** New-England (London, 1622),<207> Bradford and Winslow provide us with a later, but poignant, example:

Amongst others, one of the six that came with us from Packanokick, having before this on the way unkindly forsaken us, marvelled we gave him nothing, and told us what he had done for us. We also told him of some discourtesies he offered us, whereby he deserved nothing. Yet we gave him a small trifle; whereupon he offered us tobacco. But the house being full of people, we told them he stole some by the way, and if it were of that, we would not take it; for we would not receive that which was stolen, upon any terms; if we did, our God would be angry with us, and destroy us.<208>

As with any culture contact, there were other misunderstandings in the early period: English pistols were mistaken for pipes, <209> and stockings were made use of as tobacco pouches.<210> More importantly, the religious dimension of the Amerindian smoking complex was never a part of the European appropriation of tobacco,<211> and thus а transculturation involving а complete interchange and understanding of ideas was impossible. Nevertheless, on one level, smokers are smokers, and one is presented with the relatively rare scenario of two radically different cultures finding something in common and puffing contentedly on each other's pipes. Here was a commodity unrelated to subsistence or human survival, that nevertheless was enjoyed and desired by both sides. Amerindians had difficulty understanding that so much stinking peltry could be a European desideratum, but tobacco was another "ball game". With it the semiotic organization of culture contact had a firmer foundation: a non-verbal behavior both parties could at least begin to understand. The **tabaguia** was etymologically pidgin Micmac and symbolically the nexus of transculturation.

# TABLE 3.1 Selective List of Amerindian Dispensations of Tobacco to Europeans in North America

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DATE	FROM	TO	REF.
1602	Eastern Algonquians	Gosnold, Brereton and Archer	<212>
1603	Massachusett or Pokanoket Indians	One of Martin Pring's crew	<213>
1605	Penobscot Indians	Waymouth and Rosier	<214>
1605	"Almouchiquois"	S. de Champlain	<215>
1606-7	Micmac	M. Lescarbot	<216>
1607	Virginia Algonquians	Newport, Percy and Archer	<217>
1607-8	Kennebec (E. Abenaki)	Gilbert and Davies	<218>
1609	Delaware and Mahicans	Hudson and Juet	<219>
1614	Virginia Algonquians	R. Hamor	<220>
1622	New England Algonquians	Plymouth colonists	<221>
1678	"Indians"	English of New York	<222>
1753	Onondaga	Zeisberger and Frey	<223>
1755-59	"Caughnewagas"	J. Smith	<224>
1766-70	Sauk	British traders	<225>
1767	Sioux	J. Carver	<226>
1775	"Indians" (Cherokee?)	J. Adair	<b>〈227〉</b>
1806	Arikara	Thomas Jefferson via Lewis and Clark	<228>
1806	Mandan	A. Henry	<229>
1810-13	Snakes	A. Ross	<230>
1816	Cherokee	J. Norton	<b>&lt;231&gt;</b>
1819-20	Osage	J. Long	<232>
c.1850	Tuski	W. Hooper	<b>〈</b> 233〉

CHAPTER FOUR AN AMERINDIAN GIFT HELPS IN THE INVASION OF NORTH AMERICA

A) NICOTIANA IN THE ENGLISH COLONIES

# the first seeds

Through the disastrous colonial efforts at Roanoke and Sagadahoc, the English had learned that simply establishing a beachhead and erecting a fort did not guarantee a successful permanent settlement. Jamestown was different. Its economic activity was more closely tied to the needs of England, and it soon became what Quinn terms a "complementary colony." <1> The mother country desired cedar wood, barrelstaves, clapboards, tar, pitch, resin, sturgeon, iron, glass and potash, but efforts to produce and export these commodities from Virginia were only partially successful. <2> The colony struggled but survived.

It is by no means coincidental that the year 1612 marks the turning point in both the history of English settlement in North America and the transculturation of tobacco. England was becoming increasingly annoyed with the Iberian monopoly over the lucrative tobacco trade and decided to explore the possibility of obtaining her own supply from the New World. The Spanish control in the West Indies precluded an intensified barter with the natives of the region. Moreover, the 600 Englishmen in North America could trade from their Amerindian hosts scarcely enough of the smoking substance to meet their own needs, let alone a nation of addicts back home. Amerindians would eventually modify their socio-economic and trading patterns to sustain a European love-affair with felt hats, but they could not accommodate the massive agricultural investment required to fill the huge market opened by the new smoking fad. The obvious solution was for Europeans to cultivate the plant themselves. If this was possible in Gloucestershire, England, why not try it in Jamestown, Virginia, a complementary colony seeking an effective export crop and situated in the very homeland of Nicotiana.

The proposal to follow the Spanish and Portuguese leads in the production of tobacco in the New World had heretofore been entertained by surprisingly few individuals. Gabriel Archer had suggested in 1607 that, with time, such an experiment might lead to success, <3> but no opportunities arose and no action was taken for the next five years. Robert Harcourt was, perhaps, the most enthusiastic proponent of such a scheme in this early period, though he had the southern continent rather than North America in mind. In **A Relation of a Voyage to Guiana** (London, 1613), <4> which was based on his explorations of 1609, he wrote:

There is yet another profitable commodity to be reaped in Guiana, and that is by Tobacco, which albeit some dislike, yet the generality of men in this kingdome doth with great affection entertaine it. It is not only in request in this our Country of England but also Ireland, the Neatherlands, in all the Easterly in Countries, and Germany; and most of all amongst the Turks, and in Barbary. The price it holdeth is great, the benefit our Merchants gaine thereby is infinite, and the Kings rent for the custome thereof is not a little. The Tobacco that was brought into this kingdome in the yeare of our Lord 1610. was at the least worth 60. thousand pounds: and since that time the store that yeerly hath come in, was little lesse. It is planted, gathered, seasoned, and made up fit for the Merchant in short time, and with easie labour. But when we first arrived in those parts, wee altogether wanted the true skill and knowledge how to order it, which now of late wee happily have learned of the Spaniards themselves, whereby I dare presume to say, and hope to prove, within few moneths, (as others also of sound judgement, and great experience doe hold opinion) that onely this commodity Tobacco, (so much sought after, and desired) will bring as great a benefit and profit to the undertakers as ever the Spaniards gained by the best and richest Silver myne in all their Indies, considering the charge of both.<5>

While this prognostication was being penned (though before it reached the printers), the Virginian colonists were themselves looking closely at the potential profits to be reaped from this plant. The only question was whether to cultivate the indigenous Nicotiana rustica or N. tabacum imported from the south. The former had been much praised by explorers of the eastern seaboard north of Virginia, <6> and its propagation had a good track record England. <7> The latter had been profitably cultivated by in Amerindians and Spaniards in the West Indies and was prized by English smokers.<8> For which may forever reasons remain unclear, the Jamestown settlers judged the indigenous Nicotiana rustica sharp, bitter and palatable only to the natives. <9> Perhaps the Virginia type was qualitatively different from varieties sampled in New England or, alternatively, the colonists had become so accustomed to the West Indies product, that all samples of the North American species were deemed unsuitable. <10> In either case, William Strachey made his preferences clear:

There is here great store of Tobacco which the Salvages call **Apooke**, howbeyt yt is not of the best kynd, yt is but poore and weake, and of a byting tast, yt growes not fully a yard aboue grownd, bearing a little yellow flower like to henn-bane, the leaves are short and thick, somwhat rownd at the upper end: whereas the best Tobacco of Trinidado and the Oronoque, is large sharpe and growing 2. or 3. yardes from the grownd, bearing a

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flower of the breadth of our Bel-flowers in England. The Salvages here dry the leaves of this Apooke over the fier, and sometymes in the Sun, and Crumble yt into Powlder, Stalkes, leaves, and all, taking the same in Pipes of Earth which very ingeniously they can make...<

Such comparisons were inevitable for, elsewhere in his Historie, he noted that tobacco seeds obtained from Trinidad had been planted with success.<12> Since Strachey was in Virginia from 1610-11, it is probable that the Jamestown settlers were experimenting with the West Indies species before the 1612 or 1614 dates usually cited for the initial importation of Nicotiana tabacum into North America.<13>

Whoever may have been the original experimenter, the individual most often associated with the birth of the Virginia tobacco industry was an avid smoker named John Rolfe--a man who has become immortalized in the annals of American folk history for his interracial marriage to Pocahontas (the daughter of the powerful Powhatan leader), which helped to solidify a peace between the English and Amerindians living near Jamestown. In **A True Discourse of the Present Estate of Virginia** (London, 1615)<14> Ralph Hamor lauded Rolfe for his dedication to the struggling colony:

... the valuable commoditie of Tobacco of such esteeme in England (if there were nothing else) which every man may plant, and with the least part of his labour, tend and care will returne him both cloathes and other necessaries. For the goodnesse whereof, answerable to west-Indie Trinidado or Cracus (admit there hath no such bin returned) let no man doubt. Into the discourse wherof, since I am obviously entred, I may forget much not the gentleman, worthie of commendations, which first tooke the pains to make triall thereof, his name Mr John Rolfe, Anno Domini, 1612, partly for the love he hath a long time borne unto it, and partly to raise commodity to the adventurers, in whose behalfe I witnesse and vouchsafe to holde my testimony in beleefe, that during the time of his aboade there, which draweth neere upon sixe yeeres, no man hath laboured to his power, by good example there and worthy incouragement into England by his letters, then he hath done, witnes, his mariage with **Powhatans** daughter, one of rude education, manners barbarous and cursed generation, meerely for the good and honour of the Plantation...<15>

It appears that, after apparently unsuccessful attempts to cultivate Nicotiana rustica, <16> John Rolfe decided, in 1612, to try large-scale production with Nicotiana tabacum seeds imported to Virginia from Trinidad or Venezuela. <17>

Through a strange twist of fate an Amerindian plant and associated habit, known in England for less than fifty years,<18> was to become the major economic lifeline of the first permanent English settlement in North America. It might be said that the Indians inadvertently gave the Whites a means of strengthening a foothold on their land. As a poignant reminder of this legacy, one of the great seals of Colonial Virginia pictures "an Indian queen, presenting on bended knee the tobacco plant to Britannia, who majestically clasps the globe and sceptre."<19>

#### the experiment succeeds

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North American tobacco production after 1612 is a vast and complex topic best left to more qualified economic historians.<20> Since, however, the traditional anthropological emphasis on the fur trade has effected an underestimation of the importance of tobacco in colonial aspirations, it seems desirable

briefly to review the impact of this plant on the nascent European presence in North America.

The first sample of Rolfe's experimental crop reached England in 1613,<21> and, after significant advances in curing the leaf,<22> the Virginia product became an unqualified success. Hamor wrote with unrestrained enthusiasm that tobacco:

whose goodnesse mine own experience and triall induces me to be such, that no country under the Sunne, may, or doth affoord more pleasant, sweet, and strong Tobacco, then I have tasted there, even of mine owne planting, which, howsoever being then the first yeer cf our triall thereof, wee had not the knowledge to cure, and make up, yet are ther some now resident there, out of the last yeers well observed experience, which both know, and I doubt not, will make, and returne such Tobacco this yeere, that even England shall acknowledge the goodnesse thereof.<23>

Exports to Europe rose steadily from 2,300 pounds in 1615, to 60,000 in 1622, 1,500,000 in 1630, 18,295,000 in 1688, 55,000,000 in 1759, to an astonishing 86,000,000 pounds in 1783.<24> By the end of the seventeenth century tobacco had become the mainstay of both English and Dutch shipping, which gave a tremendous impetus to the European merchant marine.<25> Throughout the next century two-hundred large English ships annually freighted the precious commodity across the Atlantic (see Plate 4.1).<26> After processing the raw leaf much of the pipe tobacco and snuff were re-exported to other European countries and even back to North America.<27> England soon replaced Spain as the world's major supplier of processed tobacco, and Virginia achieved a prominent place in the global market system.<28>

Despite the economic promise of the early Jamestown years,

London had become increasingly concerned about the obsessive emphasis on tobacco in the colony.<29> John Smith complained that the settlers persisted in "rooting in the ground about Tobacco like swine" while neglecting corn and wheat.<30> In his Advertisements for the unexperienced Planters of New-England, or any where (London, 1631),<31> he prayed that "reason, or necessity, or both" would help the stubborn colonists to "learne in time better to fortifie cnemselves."<32> Yet, the alternative suggestion offered by James I also had little to do with reason and necessity. Having recognized that his Counterblaste had fallen on defiant ears, the King wrote a rhapsodical letter to the Earl of Southampton in which he promoted an inapposite scheme to set up silkworks in Virgina:

...hereby charging and requiring you to take speedy order that our people there use all possible diligence in breeding silkworms and erecting silkworks, and that they rather bestow their travail in compassing this rich and solid commodity than in tobacco, which besides much unnecessary expense brings with it many disorders and inconveniences.<33>

Others were equally perplexed, if not dismayed, at the selection of commodities on which to base the economy of a new and important colony. A century later Stith would remark that:

tobacco, a stinking, nauseous, and unpal.table weed, is certainly an odd commodity, to make the staple and riches of a country. It is neither of necessity nor ornament to human life; but the use of it depends upon Humour and Custom, and may be looked upon, as one of the most singular and extraordinary pieces of luxury, that wantonness of man hath yet invented or given into.<34>

Robert Beverley also talked of the "Disease of planting Tobacco,"<35> while Thomas Jefferson would later call it a "culture of infinite wretchedness."<36>

Rolfe had initiated an irreversible trend. Within a few years everyone in and around Jamestown, including blacksmiths, carpenters, shipwrights and even the minister, had planted tobacco.<37> By the time a new Governor arrived in 1617, he found "but five or six houses, the Church downe, the Palizado's broken, the Bridge in pieces, the Well of fresh water spoiled; the . store-house they used for the Church, the market-place, and streets, and all other spare places planted with Tobacco, " and the "Colonie dispersed all about, planting Tobacco."<38> Food products were so neglected that the settlers were brought to the verge of starvation<39> and only survived when local Amerindians were given firearms and employed to do their hunting. <40> Some native peoples were not pleased with this bustle of activity, but, even after hostilities broke out in 1622 (and again in 1644), the massacre of Whites did little to impede the steady English push into the wilderness in search of tobacco lands. <41>

The impact of Rolfe's experiment on the fledgling English presence in North America cannot be overestimated. The domination of tobacco in the Virginia economy is seen by some historians as one of the most remarkable aspects of English colonial history. <42> By 1627 tobacco had made Virginia the most successful European colony in the New World, <43> and it is not surprising that this model led to further colonial efforts. Annoyed with codfishing and the severe winters in Newfoundland, Lord Baltimore asked for a land grant in the northern Chesapeake area specifically intended for the planting of tobacco.<44> Thus, the Maryland charter of 1632 marks the first time tobacco

became the main incentive for establishing a North American colony.<45> After the British West Indies (Barbados, St. Kitt's, Nevis, Antigua and Bermuda) were colonized from 1624-34, immigrants also settled into tobacco cultivation until market conditions forced a shift to sugar production a generation hence.<46>

Throughout the first century of England's colonial ventures in America the production of Nicotiana tabacum was one of the main objectives Englishmen had for crossing the Atlantic.<47> Main has estimated that tobacco "paid the way for at least a third of all English immigrants to the New World in the seventeenth century, including those to the British West Indies prior to 1640. (48) Walker adds that in 1697 "seven-eighths by value of English colonial trade was with sugar and tobacco colonies, and of this tobacco occupied by far the larger proportion." <49> By the time of the American Revolution tobacco still represented seventy-five per cent of the total value of commodities exported from Virginia and Maryland, <50> and, in the last decade of the eighteenth century, over half of the population of the tobacco states was engaged in, or dependent upon, its cultivation .< 51> These extraordinary statistics suggest that, without tobacco, the rapid growth of England's colonies in the New World may have been severely hampered.<52>

The soil and climate of the Chesapeake colonies happened to be ideal for the cultivation of **Nicotiana** species. More significantly, as Herndon points out:

tobacco also had a greater advantage over all other staples in that it could be produced in larger quantities per acre. This was important considering the labor required to clear the trees and prepare one acre for cultivation. It was soon discovered that the amount of tobacco produced by one man's labor was worth about six times the amount of wheat that one man could grow and harvest. Moreover, tobacco could be shipped more economically than any other crop; thus the monetary return upon a cargo was greater than for any other crop that could be produced in the colony.<53>

The appeal of such a lucrative commodity did not wane for centuries. Even today, the plant continues to displace food grains. In 1984, for example, the gross income per acre of tobacco in North Carolina was 3,940 dollars compared with 131 dollars for wheat.<54>

The high profit margin of tobacco led to an early crop specialization at the expense of other staples.<55> In 1629 the four to five thousand English settlers were confined to the James River and Accomac Peninsula environs, where they cultivated approximately 2,000 acres of tobacco.<56> Prolonging the consecutive one-crop system over several years (without the benefit of proper fertilizers), however, exhausted the soil and rendered plantations sterile.<57> The planters were forced to clear land to the south, north and west which required "much labour and Toil, it being so thick grown all over with Massy Timber, (58) and thus the scattered plantation system of land tenure was developed to conquer the entire Tidewater region. <59> According to Jennings, this dispersal became an important component of the "invasion of America:"

The discovery of tobacco's profitability had altered the Virginian's attitudes toward native neighbors. So long as the colony depended heavily on trade for skins

and furs, nearby trading partners were an asset. They changed into a liability when trade became secondary. The colonists could and did raise tobacco by themselves--the Indians had taught them well--and they now coveted their neighbors' cleared lands more than their company. The lucrative weed stimulated a reorganization of Virginian society involving large "grants" of lands, accompanied by rapid growth and scattering of the English population.<60>

Immigration and the very boundaries of English North America were orchestrated by the complex economics of a new European fad. <61>

It has been observed that "in no similar instance has an agricultural product entered so deeply and so extensively into the spirit and framework of any modern community." <62> This was no economic sideshow of English colonialism; this was a state of mind in which a plant dominated the social and intellectual lives of the Chesapeake and Tidewater colonists. <63> The passion with which Europe had embraced an Amerindian weed was matched by the intensity with which her colonies produced it. Only ten years had elapsed between the time Percy picked a few precious leaves of Nicotiana rustica from an Amerindian garden, and the time the Jamestown market was crowded with Nicotiana tabacum. Fueled by a colonial engine, transculturation had shifted from neutral to overdrive, and the English themselves could scarcely control the momentum.

One way to appreciate the degree to which tobacco was more than an export crop is to recall that it became a medium of exchange and a veritable currency:

Accounts were kept in tobacco. The salaries of members of Assembly, the stipends of clergymen, were paid in tobacco; offences were punished by fines expressed in tobacco. Absence from church cost the delinquent fifty pounds; refusing to have his child baptized, two thousand pounds; entertaining a Quaker, five thousand pounds. When the stock of tobacco was unduly large, the currency was debased, and much inconvenience resulted. The Virginians corrected this evil in their monetary system by compelling every planter to burn a certain portion of his stock.<64>

The cost of transporting mail-order brides for men waiting at Jamestown in 1620 was noted at 120 to 150 pounds of tobacco per wife.<65> A consideration given by the General Assembly of Maryland in 1661 to a petition by the Susquehannock Indians for assistance and aid includes:

An acte Impowering the Governor and Councell to Rayse forces and... to ayde the Sasquehannough Indians...And for the pay of the officers and Souldiers aforesaid to be proportioned as followeth untill the Souldiers retourne To the Comander in Chief Six hundred pounds of tobacco in Caske p moneth To the Interpreter six hundred p moneth and to the Chirurgeon foure hundred p moneth to every private Souldier two hundred and fifty p moneth.<66>

If seventeenth-century Englishmen consumed more tobacco per capita than any other European nation,<67> then English colonists in the New World, who practically breathed the substance day and night, can certainly be expected to have been dedicated smokers. Indeed, a visitor in 1686 recorded that:

Large quantities of it <tobacco> are used in this country, besides what they sell. Everyone smokes while working and idling. I sometimes went to hear the sermon; their churches are in the woods and when everyone has arrived the minister and all the others smoke before going in. The preaching over, they do the same thing before parting. They have seats for that purpose. It was here I saw that everybody smokes, men, women, girls and boys from the age of seven years.<68>

Such intemperance persisted in America even after chewing replaced smoking as the dominant mode of consumption in the nineteenth century.<69>

# the fever spreads

Although the focus of colonial cobacco production remained in Virginia, Maryland, the Carolinas<70> and Kentucky,<71> the plant could also be effectively cultivated further north and, as other colonies grew, the tobacco "fever" spread. Limited cultivation was attempted in Pennsylvania in the late seventeenth century, but commercially significant quantities were only possible after 1828.<72> Some tobacco was also planted during the English colonization of New York, <73> but large amounts were grown in Onondaga County only during the nineteenth century. <74> In his Account of Two Voyages to New-England (London, 1674), <75> John Josselyn discussed the growth and processing of the plant in the region, <76> though Edward Winslow felt that fish rather than tobacco was the real Good News From New England (London, 1624).<77> The Pilgrims, who settled at Plymouth, Massachusetts after 1620, may have cultivated some for personal use but received most of their smoking substances from Virginia and the Dutch plantation at Manhattan. <78> Roger Conant is known to have grown the crop near Massachusetts Bay before the Puritans arrived in 1630.<79> Prior to 1640 Connecticut tobacco farmers produced crops chiefly for domestic consumption, <80> and cultivation continued on that basis in New England until at least 1650.<81>

As in Virginia, New England settlers were passionately fond of their pipes. Unlike the tobacco colonies, where puritanic influence was lacking, <82> Massachusetts law-makers attempted to curtail the excesses of addicted smokers through repressive legislation. At various times tobacco consumption was rigidly confined to medicinal purposes. Committees issued orders "concerning the disorderly drinking of tobacco," and fines were handed out to those caught smoking in public or even in private homes in the company of relatives and friends.<83> When religious services were interrupted "by the clinking of flints and steel and the clouds of smoke in the church," it became necessary to forbid smoking on the Sabbath within two miles of the meeting house--a condition that (given the settlement pattern of colonial New England) included virtually all private homes.<84> Other colonies issued even more complicated regulations such as those cited by Heimann:

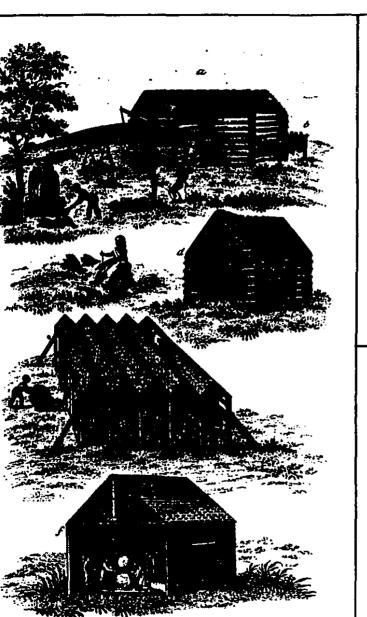
In 1647 the Connecticut General Court ordered that no one "under the age of 20 years, nor any other that hath not allready accustomed himself to the use thereof" should take tobacco without a physician's certificate that it was "useful for him," plus a license from the Court. Furthermore, tobacco could not be taken in public, or even in the open fields or woods except on journeys of 10 miles or more. A citizen might smoke at "the ordinary tyme of repast comonly called dynner." But no more than two could enjoy their after-dinner pipe in the same house at the same time... In 1655 it was ordered that "no tobacco shall be taken in the streets, yards or aboute the howses in any plantation or farme in this jurisdiction without dores, neere or aboute the towne, or in the meeting howse, or body of the trayne Souldiors, or any other place where they may doe mischief thereby, under the penalty of 84 pence a pipe or a time, wch is to goe to him that informs and prosecutes." Those lacking 84 pence would be given a sojourn in the stocks. <85>

At a town meeting in Portsmouth, NH, in 1662, it was "ordered that a cage be built, or some other means devised, at the discretion of the Selectment, to punish such as take tobacco on the Lord's day, in time of publick service."<86>

the case throughout the seventeenth-century As was 01d World, <87> these New England prohibitions were matched by widespread contumacy and did little to impede the spread of smoking. Both private and public enclosures reeked of nicotian fumes, which at times accumulated to produce the near-impenetrable fog normally found only in sailors' taverns. When Jasper Danckaerts travelled to Cambridge, Massachusetts in 1680, he visited Harvard College and was introduced to some of the seventeen students registered there:

We entered and went up stairs, when a person met us, and requested us to walk in, which we did. We found there eight or ten young fellows, sitting around, smoking tobacco, with the smoke of which the room was so full, that you could hardly see; and the whole house smelt so strong of it that when I was going up stairs I said, "It certainly must also be a tavern." <88>

from this brief summary It is apparent, of tobacco cultivation and use in the early English colonies, that this Amerindian plant was an important catalyst in the colonization of English North America and affected the lives of settlers even their countrymen in more than Europe. Placing this in perspective, annual British imports of furs from New England, New York, Pennsylvania, Virginia, Maryland and Carolina in the early eighteenth century were worth L17,340 while tobacco imports totalled L236,588.<89> A tribute to this remarkable industry can still be seen in the carved tobacco leaves adorning the capitals in the hall of columns and in the circular colonnade outside the United States Supreme Court. < 90> The leaf had permeated the ethos of a nation.



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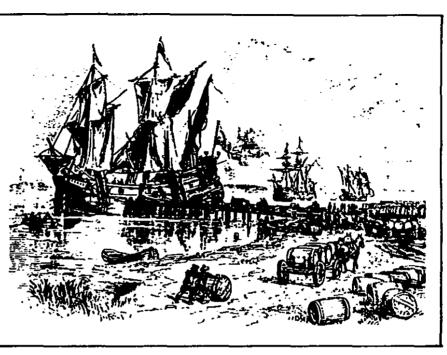


Figure A is taken from William Tatham's An Historical and Practical Essay on the Culture and Commerce of Tobacco (1800). It shows tobacco processing, curing, warehousing and inspecting activities typical of eighteenth-century Virginia. Figure B illustrates the loading of hogsheads of tobacco onto ships destined for Europe (c.1660). The technological and logistical infrastructure of colonial planters and merchants allowed the production of this Amerindian plant to proceed on a massive scale. This made the transculturation of tobacco economically feasible throughout the world. В

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#### satisfying addicted settlers

Although France, the other seventeenth-century superpower interested in North America, did not have her own version of the Virginia success story, she was no less interested in turning the Amerindian gift into a means of supporting colonization. The nascent market for nicotian products during the reign of Henry IV was bound to expand, and the French, like the English, were reluctant to form a dependency on foreign tobacco.

Precious amounts of the foreign leaf were almost certainly aboard the first French ships anchored off the coast of northeastern North America during the first decade of the seventeenth century. Marc Lescarbot noted that **Nicotiana** grown in Brazil was, as early as the settlement of Port Royal, being imported by the French to satisfy the settlers in Acadia:

And our Frenchmen who have frequented them <"savages"> the most part so bewitched with this are for drunkenness of tobacco, that they can no more be without it than without meat or drink, and upon it they spend good money; for the good tobacco which comes from Brazil costs sometimes a crown a pound, which I deem foolishness in them, because withal they spare not to eat and drink as much as other men, neither do they miss any meat or drink the less for it. But is is more excusable in the savages... But whatsoever sweetness is found therein, I could never accustom myself to it, neither do I care for the use and custom to take it in smoke.<91>

This habituation is independently verified by Biard who noted that certain Frenchmen in New France were "so bewitched with it that, to inhale its fumes, they would sell their shirts."<92> This reflects the expected pattern common to most Europeans of this era, as addiction spread as quickly as the reputation of the panacea. Reporting from far-off Moscow, for example, Guy Miège echoed the theme with similar words: "It is a commodity they love so well in those parts, that if they want money they will truck their shirts for tobacco."<93>

The historian and archivist Edouard-Zotique Massicotte has been the only scholar to publish a study of tobacco use in New He implies that the French who came to colonize France.<94> Canada in the seventeenth century were not devoted to the use of tobacco until the need for entertainment and distractions, the Amerindians initiated the habit climate, and contact with sometime after 1650.<95> Despite his credentials, Massicotte based his conclusions almost exclusively on Montreal archives and had an exceedingly limited understanding of tobacco history. It seems clear from Lescarbot, Biard and other sources<96> that Frenchmen in the New World were already smoking heavily in the early seventeenth century. It is likely that at least some of these settlers acquired the habit in their hometowns as early as the late sixteenth century, although contact with Amerindians may have provided additional stimulation. In any case, the fact that tobacco of Brazilian origin was being imported into Acadia in 1606 suggests that the settlers had already acquired a taste for the South American species popularized by Nicot in the 1560s. importation also casts doubt on the conclusion of that This indefatigable historian, Marcel Trudel, who infers that the early French settlers only adopted tobacco after they started receiving

presents of it from native peoples.<97>

# establishing tobacco colonies

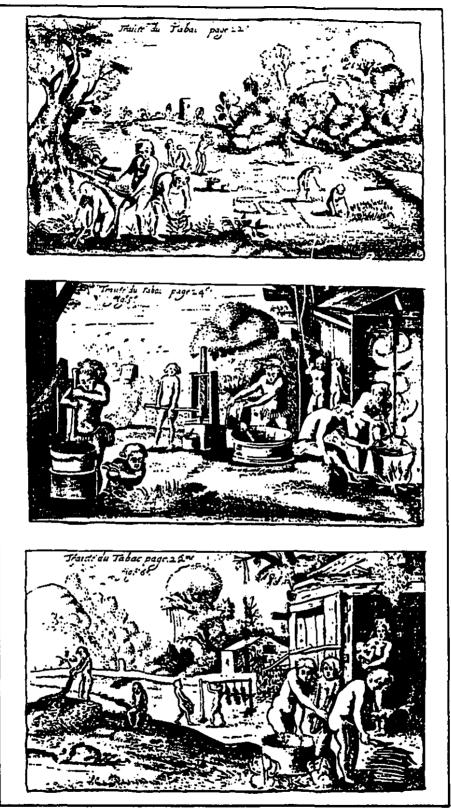
If the French in northeastern North America were importing tobacco, the question arises as to where the leaf was coming from and whether the source changed over time. There is no evidence in the early years, New France received her tobacco that. directly from South America; it is more probable that cargoes made two Atlantic voyages, with a stop-over in Europe. French domestic plantations were not commercially significant until the 1620s; <98> thus, France imported much of its tobacco from other countries. On her return to Europe from a voyage of exploration and trade to the West Indies and Brazil, the Marquerite had already carried a cargo of petun as early as 1599.<99> By 1613-15 large quantities were being imported at Marseilles from Iberian ports (where the leaf from Spanish and Portuguese colonies was being stockpiled), and these imports were soon supplemented with tobacco from England, Holland and Virginia. <100>

Neither domestic production nor foreign imports were sufficiently cheap and reliable to prevent efforts to seek alternate sources of supply. In 1626 Pierre d'Esnambuc purchased tobacco from the French settlers of St. Christopher and managed to sell his cargo for a profit in France. Much like the English and Dutch experience, the French presence in the West Indies turned into the establishment of "tobacco colonies," and France now had her own colonial supply of the plant.<101> In his

description of Martinique (settled in 1635) the Jesuit Jacques Bouton wrote that "tobacco has been up to now the only merchandise imported into France from that island and from the other islands which the French have settled. "<102> Eleven years later another missionary observed that Guadeloupe was "the true country for petun or tobacco and it is our greatest trade. "<103> In his voluminous seventeenth-century account of the French settlements in the West Indies, Jean Baptiste Du Terte makes it clear that tobacco permeated the life of these colonies in much the same way as it did in Virginia (see Plates 4.2 and 4.3).<104> Tobacco figured so prominently in Jean Baptiste Labat's eighteenth-century history of the West Indies that a portion of the original work was reissued and translated as Treatise On the...Tobacco Plant (Montego-Bay, Jamaica, 1779).<105>

As noted, Richelieu's tobacco tax of 1629 was not applicable to imports from the French West Indies--an exception that contributed to the success of the colonies.<106> In 1632, however, the King established a new **Tariffe général** that did not exempt imports from the Indies, and, although most of the colonies continued a prosperous tobacco trade through the 1640s, efforts were later redirected to other commodities such as sugar.<107> By the end of the century only St. Dominique still had a tobacco industry of any significance.<108> Between 1626 and the demise of the plantations in the West Indies, the tobacco being imported into what is now eastern Canada may not have been exclusively South American in origin but may often have come from French possessions in the New World.<109>

PLATE 4.2



Earliest published illustrations of Amerindians engaged in cultivating, gathering, pressing, drying and curing tobacco. It is clear that these were not intended to depict prehistoric conditions but were an illustration of native peoples employing the technology and techniques of the West Indies "tobacco colonies" to produce a commodity that was eventually traded to Europeans. The engravings were produced by M. van Brouck for the 1626 French edition of Neander's Tabacologia.



Manufacture of roll tobacco in a seventeenth-century colony. Black slaves retrieved the leaves from the rafters of the "Petun-house" (1), tore them apart (2), twisted them (3) and rolled them into long ropes (4). From Du Tertre's *Histoire General des* Antilles (1667).

With the advent of the eighteenth century the French explored the possibility of yet another colonial source of tobacco, not on some obscure Island, but on the North American continent itself. By 1718 John Law was granted the right to develop tobacco production in Louisiana in order to help free France from dependence on foreign products.<110> Although his **Companie d'Occident** eventually failed, a precedent was set, and, the next year, thirty skilled tobacco workers were sent from establish a factory among Clérac, France to the Natchez Indians.<111> The factory apparently succeeded well, fcr scarcely two years later more than a hundred thousand pounds of the leaf were processed. <112> The importance of tobacco to the French in Louisiana is exemplified by frequent allusions to it in the Jesuit Relations, <113> in Butel-Dumont's Memoires Historiques Sur La Louisiane (Paris, 1753)<114> and in Le Page Du Pratz's Histoire De La Louisiane (Paris, 1758).<115>

The French government continued to support tobacco production in this colony through the 1750s.<116> Mackenzie quotes a contemporary economist who observed that "tobacco was the only production of the earth which gave England an advantage over France and that Louisiana ought to be accepted as a providential means if not to compete with the English tobacco at least to be able to do without it. "<117> After France lost Louisiana in 1762-64, tobacco production suffered a decline. By the end of the century it had been almost totally replaced by sugar and cotton. <118>

Despite the fuss made over Louisiana, the colony never produced more than one or two percent of the home country's The largest proportion of tobacco nicotian requirements.<119> consumed in France throughout much of the eighteenth century came from Virginia via England -- a somewhat unexpected source, when recalling the almost constant Franco-British belligerence between 1689 and 1815. During the War of the Spanish Succession in Europe (1701-1714) and Queen Anne's War in America (1702-1713), the British colonial product was difficult to obtain. In fact the French were forced to scrape together their limited domestic and colonial supplies, purchase tobacco from the Dutch or capture and loot English vessels.<120> When the Treaty of Utrecht temporarily ended hostilities, however, conditions rapidly improved so that, after 1720, ninety percent of French purchases involved Virginia and Maryland leaves obtained in Great Britain.<121> A representative of the French monopoly routinely visited London and bought an incredible 20,000,000 pounds of tobacco annually.<122>

Although Anglo-French wars were soon to resume, tobacco had become such an important commodity to the economies of Britain and France that both sides decided to assume an extraordinary "business-as-usual" attitude. During the War of the Austrian Succession (1740-1748), as well as the Seven Years' War (1756-1763), the enemies occasionally met under a flag of truce to buy and sell the leaf.<123> As Mackenzie explains:

The British Government was afraid that if Virginia tobacco was denied to their enemies, the French might be driven in despair to develop their own American plantations. So a gentleman's agreement was reached between the two nations at war with each other by which the French Government was to be allowed to buy what tobacco it wanted in Great Britain, such tobacco to be the product and manufacture of British plantations. The ships carrying it were to proceed from a named port in Scotland or England to a named port in France carrying nothing but tobacco, and were to return from France empty.<124>

apparent from this summary that, throughout It is the colonial period (c.1608-1763), the French had access to the global tobacco market -- a market that involved nicotian products originating primarily from Spanish, Portuguese, Dutch, English and French possessions in the New World. The sheer number and variety of "tobacco colonies" ensured an uninterrupted supply which, in turn, fueled addiction and diffusion. Fernand Braudel has pointed out that the spread of tobacco was all the more remarkable as there was no original producer market behind the plant comparable to that for pepper (India), tea (China) and coffee (Islam).<125> Production had to start from scratch, and each colony became increasingly dependent on cultivation as it vied for a share of the market.

#### experiments along the St. Lawrence River

Since she obtained her supplies from the mother country, New France was, at one time or another, an indirect market for most of the tobacco producers in the seventeenth and eighteenth centuries. As the population of this colony was less than 3,000 people throughout most of the seventeenth century, it would hardly have been a significant market, even if the populace was excessively addicted. The French did, however, require large quantities of the leaf in the fur trade.

The habituation recorded by Lescarbot in the early seventeenth century was a sign of things to come. In 1644 reports that settlers in New France were selling their clothes to gratify their passion for tobacco continued to persist. <126> The imported leaf was packaged either in the form of pressed cakes or carottes (rolls 25cm long and 8cm thick, often sweetened with treacle). These forms were particularly favored by explorers, traders, soldiers and settlers since they facilitated preservation and transportation of the precious substance in the rough Canadian wilderness.<127> After a Montreal cattle farmer named Antoine Rouault ou Roos was killed by the Iroquois in 1652, seven and a half pounds of petun were found among his belongings. <128> A decade later several pounds of tobacco were also found in the estate of the colonist Lambert Closse. <129> Although Massicotte suggests that the tobacco frequently mentioned in these colonial inventories was intended primarily for trade with native peoples, it seems just as likely that it was reserved for personal consumption, either as snuff (a habit that had diffused to France from the West Indies) or as a smoking substance.

Since seventeenth-century New France has suffered from a notoriety as "a storehouse for the skins of dead beasts," colonial historians have virtually ignored tobacco amidst the flurry of interest in the economics of peltry.<130> As early as 1671, however, Talon had experimented with the cultivation of N.

tabacum in New France and had found that the crop might have economic potential.<131> The idea fell through in 1672 when Colbert wrote Talon that "his Majesty does not wish tobacco to be planted, as that would not be in any way profitable to the Country, which has much more need of whatever can direct the inhabitants to trade and navigation, to fixed fisheries and to manufactures, and as the cultivation of that plant would be prejudicial to the Islands of America. "<132> In other words, Louis XIV felt that Canadians had better things to do than to a crop that was better devote energy to suited to the Antilles.<133> The French hegemony along the St. Lawrence was not to turn into another "tobacco colony."

Although economically and politically unsuccessful, Talon's experiments prompted a limited local production that survived into the eighteenth century. <134> This suggests either that imports were not keeping up with the ever-increasing demand or that local crops provided a cheap alternative. In 1678 one encounters the expression tabac du pays (tobacco of the country) which may refer to the products of this restricted domestic effort, although imports from Virginia (or even N. rustica and other plant mixtures supplied by native peoples) may be what is meant.<135> Without citing evidence, Seymour suggests that the air-cured and was known home-grown variety was as tabac canadien. <136> Whether obtained domestically or imported, tobacco was beginning to become a social nuisance, for, in 1676, one of the first police ordinances in French Canada prohibited the sale of tobacco and its use in public streets.<137>

Meanwhile, tobacco production had virtually ceased in Martinique and Guadeloupe (but continued on St. Dominique), so that the Governor and Intendant were forced into a desperate plea for survival of the Isles du Vent. As Price notes, "they wished the islanders would resume making spun tobacco and tabac en andouilles (small rolls for chewing and smoking) in the Brazilian fashion if only to sell to Acadia and Canada (where the Indians preferred Brazil tobacco). <138> This is, perhaps, an important indication that the "Brazil" tobacco, employed by colonists and traded to native peoples of northeastern North America in the mid to late seventeenth century, may occasionally have originated in the West Indies, as well as South America (via Portugal and France). It is also clear that the northern fur trade created such a demand for certain types of tobacco that officials seriously considered re-aligning the struggling economy of the French West Indies towards the production of a specific trade qood.

While the Indies soon turned to sugar production, the colonists along the St. Lawrence expanded Talon's experiment with Nicotiana. In a letter from Quebec dated 1709, Antoine Silvy observed that Amerindians in the area "formerly used a herb called mountain tobacco but now smoke a black tobacco made here which is somewhat the same quality cultivated in France." <139> Charlevoix noted in the 1720s that tobacco cultivation on Ile d'Orléans (downstream from Québec City in the St. Lawrence River) was "far from being bad." <140> In 1721 the regions around Québec, Trois-Rivières and Montreal produced 48,038 pounds of the leaf--a figure that jumped to 166,054 pounds by 1734.<141>

Recognizing the success of these efforts, French officials, in 1735, finally adopted a policy for officially producing tobacco in Canada. <142> Samples were obtained for evaluation but were deemed unsuitable for the European palate. New samples from Ile d'Orléans, Ile du Pas and the environs of Montreal looked so promising, that instructions were sent out on how best to improve the product for export. Under the auspices of Intendant Hocquart, plantations were started at Chambly, Beauport and Québec.<143> These experiments, however, were plaqued by low market values and worms which attacked the roots of the young and delicate plants.<144>

Not only did the enterprise fail as an export crop, but the settlers themselves had a variety of taste preferences and sought products originating elsewhere. In 1736 the settlement at Quebec imported 944 pounds of **carottes** from Louisiana, 75 pounds from St. Vincent, 2,002 pounds from St. Dominique and 780 pounds from Spain.<145> Brigantines carrying West Indies tobacco, sugar and rum arrived in Louisbourg and Quebec, while schooners laded at Quebec with tobacco and other goods left for Labrador and the Gaspé.<146>

Limited domestic production continued and, after a disastrous harvest in 1742, Secretary of State Maurepas wrote to Governor Charles Beauharnois and Intendant Gilles Hocquart that: the ill success in the cultivation of tobacco proceeds rather from a defect in the preparation of it than from any defect in its real quality. Must encourage the cultivation of it, and see that the instructions given for its preparation are adopted. The southern part of the Colony should produce a better quality.<147>

Five years later references to habitants reserving sections of land for the purpose of tobacco planting can be found, though this cultivation may have been intended primarily for local or even household consumption.<148> A report, found by Barbeau in the Archives of the Seminary of Quebec for the period immediately following the British Conquest, also stated that "the inhabitants raise and manufacture tobacco."<149> Two varieties of Quebec tobacco (identified by Seymour as **petit canadien** and **Rose Quesnel**)<150> continued to be grown along the St. Lawrence River and were supplemented by the commercial cultivation initiated in Essex and Kent Counties (Ontario) in the early nineteenth century.<151> Unsubstantiated reports even talk of **Nicotiana rustica** occasionally grown by the French in Nova Scotia in modern times.<152>

#### smoking on the Canadian frontier

Although tobacco never permeated the ethos of French colonial life quite like it did in Virginia, (153) there are indications in the **Jesuit Relations** that the plant was prominent in interactions between settlers and was considered a valued commodity. (154) The voyage to the New World was itself a fumiferous affair and, most certainly, a rite of initiation for those few who had not yet smoked the panacea. In his **Relation Du**  **Voyage Du Port Royal De L'Acadie, Ou De La Nouvelle France** (Rouen, 1708),<155> which had a liberal sprinkling of barbarous versification, Sieur de Dièreville recalled his outward trip of 1699:

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...the Night Was no less friendly to our Ship, And fearing no mishap, Those who kept watch, Could smoke, and sing and laugh... Awaking, I my cabin quit, And Pipe in hand, stood on the Quarter-deck, Drawing the vapour from Nicotiane And feigning I was Chevalier Bart.

There was no Cabin-boy who could not, better than I, acquit himself in this exercise; I did it only for diversion, and to give myself the airs of an old Sea-dog. Novice that I was, I soon yielded to the reveries which are so commonly evoked by the fumes of this Indian Plant, and I lost myself in meditations upon all that took place in the World of Fish.<156>

Among the best descriptions of tobacco-use in New France are those by the Swedish botanist Pehr Kalm who was dispatched to America by Linnaeus in 1748-1750. In his **Travels into North America** (Warrington and London, 1770-1771)<157> Kalm reported that:

Every farmer plants a quantity of tobacco near his house, in proportion to the size of his family. It is likewise necessary that they should plant tobacco, because it is so universally smoaked by the common people. Boys of ten or twelve years of age, run about with the pipe in their mouths, as well as the old people. Persons above the vulgar, do not refuse to smoak a pipe now and then. In the northern parts of they generally smoak tobacco by itself; but Canada, further upwards, and about Montreal, they take the inner bark of the red Cornelian cherry (Cornus sanguinea), crush it, and mix it with the tobacco, to make it weaker. People of both sexes, and of all ranks use snuff very much. Almost all the tobacco, which is consumed here, is the produce of the country, and some people prefer it even to Virginian tobacco: but those who pretend to be connoisseurs, reckon the last kind better than the other.<158>

PLATE 4.4



Figure A illustrates a smoker in New France. Figure B (taken from Bacqueville de la Potherie's *Histoire de l'Amérique septentrionale*, 1722) shows a French Canadian soldier smoking a pipe. French colonists in North America were particularly eager to imitate the Amerindian pipe/tobacco/smoking complex.

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The custom of mixing the bark or leaves of other species with tobacco was common among the early French, English and Dutch settlers in North America and was almost certainly borrowed from Amerindian Kinnikinnik recipes.<159> The newcomers also appear to have adopted the native practice of interrupting long canoe trips at regular intervals to light pipes and smoke. So important were these intermissions that the **voyageurs** measured distances in "pipes:" **trois pipes** represented roughly twelve to twenty miles depending on currents and weather conditions.<160>

Even the pipes used by the habitants were often purchased from native peoples or modeled after Amerindian prototypes. <161> Kalm found it most curious that, whereas many nations imitated the customs of the French, in North America it was the French who, in many respects, followed the customs of Amerindians: among other things they smoked in the native pipes a tobacco prepared in the native fashion. <162> What the French appropriated was not a habit (as colonial historians have surmised) <163> but merely a few refinements suited to the conditions of the Canadian frontier (see Plate 4.4).<164> After all, by the time of the establishment of New France, tobacco-use was common throughout Europe, and it remains inconceivable that most colonists only learned to smoke in Canada.

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Life in New France (as in the Old World, with its **tabagies** and **Tabakscollegium)**, assumed a tinger of Amerindian flavor, as the transculturation of tobacco mediated the contrariety of

cultures. With direct contact and intimate interaction in the wilderness of northeastern North America, the newcomers became even more like the natives.<165> The **truchement** (interpreter) Etienne Brûlé was as Indian as a White could become. When he returned from Huronia in 1624, he carried with him a bag of native Nicotiana rustica.<166> Yet, the native smoking complex was also being influenced by the newcomers. Brûlé lost his pouch on the way to Québec, but countless packages of European petum were to survive the trials of wilderness travel as the coureur de bois returned into the interior year after year.

# C) TABAK IN NIEUW-NEDERLAND

In Chapter Two attention was called to the woodcut of Nicotiana rustica (in a herbal by the Dutch botanist Rembert Dodoens) that strongly suggested the presence of tobacco in the Low Countries by 1553.<167> The Dutch were undoubtedly smoking by the 1530s<168> and became so habituated to the new panacea that, by 1610, tobacco was one of the country's principal imports.<169> In 1615 imports were supplemented with cultivation on such a commercially significant scale (primarily in the province of Utrecht), that by 1620 the Netherlands became the largest tobacco dealer in Europe.<170> A lack of official opposition, coupled with extraordinary addiction, gave the seventeenth-century Dutch a notoriety as a nation of smokers.<171>

competition in the tobacco trade

As early as 1600 the fumiferous Dutch had joined the English and the French in freighting tobacco from the West Indies. Τt not long before Holland established her own was "tobacco colonies" in the region.<172> In 1624 the Dutch West India Company founded the North American colony known as New Netherland in present-day New York, New Jersey and Connecticut. Fort Orange was built on the west bank of the Hudson and Fort Nassau erected on the Delaware. <173> By 1626 Fort Amsterdam (or New Amsterdam) built on Manhattan, which was "purchased" from Canarsee was Amerindians for the now infamous sum of sixty guilders worth of trade goods. <174> A third European nation of smokers was ready to settle the original homeland of Nicotiana rustica.

The Dutch were not only inveterate smokers but had a formidable mercantile infrastructure to fuel the habit. With the help of an extensive and highly efficient merchant marine, Hollanders became the undisputed leaders in the global trade of unprocessed tobacco throughout much of the seventeenth century. <175> A considerable proportion of Virginia's tobacco crossed the Atlantic in Dutch vessels, to the chagrin of English officials who lost enormous revenues in import duties. <176> Given its convenient proximity to Virginia and Maryland, New Netherland soon became a warehousing and operations base for the Dutch tobacco trade. <177>

By the year New Netherland was founded (1624), the English

Parliament had recognized the alarming implications of the Dutch preeminence in shipping and warehousing and had petitioned James I "not to permit the sale of any tobacco to the Hollanders, who are now freighting ships for that trade."<178> Royal proclamations were not forthcoming, and the Dutch continued to divert Virginia colonial tobacco by offering planters higher prices for their product.<179> A superiority of vessels for the bulk trade in terms of lower operating expenses per deadweight ton<180> allowed the Dutch to win a competitive edge against England in the world tobacco trade.<181>

The English Navigation Act of 1651 was, in part, intended to circumvent this Dutch impingement by prohibiting transactions between the colonies and foreign nations except through England via English vessels.<182> Effective enforcement did not accompany the legislation, however, and the Dutch were able to sustain the maritime commerce that supplied Europe with Virginia tobacco shipped through Holland by way of the New Netherland conduit.<183>

With the restoration of Charles II to the throne in 1660, a new Navigation Act was implemented. The Governors of the plantations were instructed to enforce the law by requiring all ships to give bonds promising that their destination was England.<184> Although vigorous enforcement curtailed Dutch trade to some extent,<185> the incentives offered by New Netherland (including "strong beer, which is much sought for by the English, who do not manufacture any"<186>) encouraged the

smuggling of Virginia and, especially, Maryland tobacco in Dutch vessels.<187> In 1663 the English complained bitterly that the illicit trade with the Dutch was "defrauding His Majesty of his customs and frustrating the intent of the Act of Navigation. <188> Oliver Rink, in his recent study of the Dutch in New York (which focuses on the commercial success rather than the political failure of the colony), argues that it was partly the ability of private merchants to circumvent the English Navigation Laws which "made New Netherland a successful outpost of Dutch capitalism. "<189>

In 1664 Charles II "granted" his brother James, Duke of York and Albany, most of the land controlled by the Dutch in North America.<190> The English had had just about enough of the persistent Dutch irritation, and the Duke wasted little time in despatching a squadron to seize New Netherland and claim his prize. As MacInnes remarked, "as long as an outpost of Holland was to be found on the mainland of North America, it was obviously quite impossible to hope for a complete enforcement of the Navigation Laws."<191> Although many factors were involved in the English military action,<192> it has been suggested by several historians that it was in large part the considerable tobacco trade between Virginia, Maryland and New Netherland that induced England to seize and occupy the latter colony.<193>

A greatly reduced Dutch presence in America was certainly advantageous to other countries with interests in the global Nicotiana trade. The very year that England took New Netherland,

for example, Colbert estimated that the Dutch drew from the French West Indies one million livres worth of tobacco annually.<194> The minister was so determined to break their hold on this trade that he sent Seigneur de Tracy to restore the Islands and the trade to the French empire.<195>

Although it was ten years before New Netherland finally became New York (the Dutch even temporarily re-possessed their North American colony in 1673-74), Holland had already lost effective control over the Virginia colonial tobacco trade and was resigned to raiding English shipping. During the second Anglo-Dutch War of 1665-67, the Dutch boldly sailed up the James River (Virginia) where they either captured or (being unable to man all of them) scuttled dozens of ships loaded with tens of thousands of hogsheads of Virginia tobacco.<196> Some merchants, such as Gillis van Hoornbeeck, traded legally within the English navigation system by chartering English ships, at inflated prices, to transport furs and tobacco.<197> Although eighteenth-century Rotterdam was still "the great transit entrepôt for Virginia and Maryland tobaccos, "<198> Dutch mercantile activities never fully recovered after the loss of New Netherland.

# planting in the colony

One should not gain the impression that the success or failure of Holland's colonial aspirations in America was (as the case in Virginia) primarily dependent on nicotian products. To be sure, the relatively diversified economy of New Netherland incorporated the procurement or production of other commodities including furs, timber, salt, fish, grain and beef, to say nothing of the lucrative (albeit abominable) slave trade.<199> Yet, tobacco attained a consistent prominence throughout the forty-year Dutch presence in North America -- a salience often underrated or ignored by historians. Not only was the Virginia leaf shipped to and from New Netherland, but the plant was also produced in the Dutch colony itself. Indeed, a 1663 report of the Commissioners and Directors estimated that tobacco could bring in as much revenue as the annual harvest of 10,000 beaver skins and other peltries.<200>

As early as 1629 tobacco cultivation was introduced into New Netherland by Thomas Hall, the first of a long list of Vircinians to settle in the Dutch colony. <?01> He was soon joined by others from Virginia and New England who came to New Netherland "on account of the good opportunity to plant tobacco." <202> The Dutch settlers also cleared both sides of the Hudson River to raise cattle, grain and tobacco.<203> The burghers received considerable encouragement to cultivate Nicotiana tabacum from Augustine Herrman who, in addition to being a prominent tobacco merchant in New Amsterdam, was one of the largest landowners in New Netherland.<204> This illustrious colonist (heralded by his modern biographer as the "beginner of the Virginia tobacco trade") supplemented nis shipping enterprise with tobacco cultivation on his own bouwery.<205> By 1640 Herrman was exporting enormous quantities of the leaf from both Virginia and

New Netherland. <206>

Meanwhile Wolfert Gerritsen sailed from Amsterdam with a party of tobacco planters who were to serve under a four-year contract as advisors on the farm of the patroon Kiliaen Van Rensselaer. These planters ended up so enjoying their work that they settled in the new colony.<207> A notarial document dated 1637 confirms that the West India Company sent four experienced tobacco merchants to investigate the possibility of establishing plantations in the colony.<208> Other tobacco workers also came(209) so that, by the late 1630s, a cultivation and production infrastructure was in place and one begins finding references to tobacco plantations and tobacco houses being sold or otherwise changing hands (see Plate 4.5). <210> David Pietersz de Vries recalled that in 1643 an Amerindian attack killed many planters and incinerated large quantities of tobacco.<211> The settlers picked up the pieces, and the next year a Report of the Board of Accounts on New Netherland recommended that:

particular provision must be made for the vigorous encouragement of the population and cultivation of the soil. It will be promoting this object to afford as many facilities as possible to emigrating Colonists and freemen, who are inclined to go thither; and to cause them to settle down first on the Island of Manhattes. Allowing them as much land as they will be able to cultivate, whether in raising tobacco, whereunto that its great fertility, Island, on account of is considered well adapted; or grain ... in order to encourage population still more, we would advise that it were best to confine the trade with the Indians exclusively to the Patroons, Colonists and free people reside there, without permitting any commission who merchants (commissie vaerders) to traffic in any manner with the Indians; but to be satisfied with the exchange of their cargoes for the peltries, tobacco, wheat and other country produce of the free inhabitants... <212>



Illustration of a seventeenth-century Dutch tobacco plantation. Skilled workers from such farms were sent to New Netherland where they set up similar projects on the bouweries of Augustine Herrman, Kiliaen Van Rensselaer and other prominent colonists. The success of these ventures led new settlers to neglect subsistence crops and compelled Stuyvesant to propose legislation that would curtail a sudden scarcity of bread. To native peoples, who were accustomed to gathering the sacred plant from small garden patches, this frenzied mass production must have seemed somewhat bewildering. All this suggests that tobacco production in New Netherland was initiated long before the 1646 date quoted by many authorities.<213> After this date, further means to encourage cultivation of the plant were proposed. In 1649, for example, Adrien van der Donk, Augustine Herrman and others pleaded to have the New Netherland leaf exempt from all duties:

This would afford great encouragement to the planters who convert the forest into farms, and be better also for their laborers who could thus be supplied with all necessaries... This would be a great advantage for the beginner... If your High Mightiness were to cause to be published here, that tobacco entered and shipped in New Netherland, should not be subject to, but be exempt from all charges, and that all tobacco arriving from any other port of North America, be it from New England or Virginia, must pay as much as that received from New Netherland hath paid heretofore, that is, 3 stiv. per pound... Tobacco planting is one of the most suitable means of converting the forest into farms. As people in New Netherland endeavor to have several corn fields and bouweries, it ought therefore be encouraged, especially as tobacco now rates low. For, all skippers and traders would then be eager for the tobacco, which now they neither can nor will regard; for this reason the poor planters, who must perform the heaviest labor, remain unaccomodated and reckless. Good and profitable trade would also accrue by fetching tobacco from Virginia and elsewhere, were privileges granted for doing so, to the great benefit of the inhabitants and the revenue. <214>

In his Information Relative to the Taking up of Land in New Netherland (1650), Cornelius Van Tienhoven recommended that all those who arrived in the new colony should immediately set about planting tobacco, since only this crop paid for the expenses incurred in clearing the land; subsistence crops should wait until later.<215> After repeated requests by director-general Pieter Stuyvesant for the changes in tax legislation that would encourage colonization and cultivation of the colony, the Senate of Amsterdam consented, in 1652, to have the duty of eight

percent on tobacco from New Netherland abolished.<216> This promise gave Nicotiana cultivation such an impetus that Stuyvesant found it necessary the following year to pass an ordinance obliging colonists to devote as much land to maize and grain as they did to tobacco, in order to prevent "the apprehended scarcity of bread."<217> The lessons of Jamestown, Virginia (c. 1617) immediately come to mind.<218>

In his **Description of the New Netherlands** (Amsterdam, 1656), Adriaen Van der Donck recognized the importance of **Nicotiana tabacum** in the competition between English and Dutch colonial efforts in America:

With the other productions of the land we must include tobacco, which is also cultivated in the country, and is, as well as the maize, well adapted to prepare the land for other agricultural purposes, which also, with proper attention, grows fine, and yields more profit. Not only myself but hundreds of others, have raised tobacco, the leaves of which were three-fourths of a yard long. The tobacco raised here is of different kind, but principally of the Virginia kind, from which it differs little in flavour, although the Virginia is the best. Still it does not differ so much in quality as in price. Next to the Virginia it will be the best; esteem it better, many persons and give it a preference. It is even probable, that when the people extend the cultivation of the article, and more tobacco planted, that it will gain more reputation and is Many persons are of the opinion that the esteem. defect in flavour arises from the newness of the land, and hasty cultivation, which will gradually be removed. <219>

After the English implemented the Navigation Act, making it more difficult for the Dutch to benefit from the Virginia tobacco trade, it became even more important for Holland to promote and foster her own colonial production of the leaf.<220> Despite a shortage of laborers and storage facilities,<221> complaints

about the inferior quality of the product(222) and an on-going struggle over import/export duties,(223) tobacco production in **Nieuw-Nederland** continued into the 1660s.(224)

### smoking in the colony

Since Nicotiana in New Netherland never had the socio-economic prominence it had in Virginia, the plant was not a part of the Dutch colonial ethos to the degree it was in seventeenth-century English America. The leaf was, however, important enough to appear in the settlements of numerous lawsuits(225) and (as in the case of Virginia) often served as currency.(226)

Dutch ideology was equally influenced by the general European medical view of tobacco as catholicon.<227> Prominent seventeenth-century physicians, such as Jan van Beverwijk, argued that tobacco had "a wonderful way of ridding the head of all moisture and phlegm" and was "an excellent remedy against the plague."<228> It is, perhaps, for this reason that Van der Donck included Nicotiana rustica and N. tabacum in his list of medicinal and healing plants of New Netherland.<229>

Holland was just as fumiferous as England, and the burghers of Nieuw-Nederland enjoyed their social pipe as frequently as their colonial neighbors in Virginia and New England.<230> Whereas Durand had been impressed by the girls and boys of Virginia who smoked from the age of seven,<231> and Kalm had marvelled at the ten-year-old children with pipes in New France, <232> Jasper Danckaerts could scarcely restrain his wonder when confronted with the addiction of "the oldest European woman" in New Netherland:

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We went immediately into her house, where she lived with her children. We found her sitting by the fire, smoking tobacco incessantly, one pipe after another. We enquired after her age, which the children told us was an hundred years.<233>

The notoriety of Dutch smokers even worked its way into Washington Irving's genial and buriesque **History of New York** (New York, 1809), in which the infamous autocracy of Willem Kieft (governor-general of New Netherland, 1638-47) was illustrated through a fancifully exaggerated case of repressive legislation:

Thus we are told that once upon a time, in one of his fits of mental bustle which he termed deliberation, he framed an unlucky law to prohibit the universal practice of smoking. This he proved by mathematical demonstration to be not merely a heavy tax on the public pocket but an incredible consumer of time, a great encourager of idleness, and, of course, a deadly bane to the prosperity and morals of the people...

The populace were in as violent a turmoil as the constitutional gravity of their deportment would permit -- a mob of factious citizens had even the hardihood to assemble before the governor's house, where, setting themselves resolutely down like a besieging army before a fortress, they one and all fell to smoking with a determined preserverence that seemed as though it were their intention to smoke him into terms. The testy William issued out of his mansion like unto a wrathful spider and demanded to know the cause of this seditious assemblage and this lawless fumigation, to which these sturdy rioters made no other reply than to loll back phleqmatically in their seats and puff away with redoubled fury; whereby they raised such a murky cloud that the governor was fain to take refuge in the interior of his castle.

The governor immediately perceived the object of this unusual tumult, and that it would be impossible to suppress a practice which by long indulgence had become a second nature. And here I would observe, partly to explain why I have so often made mention of this practice in my history, that it was inseparably connected with all the affairs both public and private of our revered ancestors. The pipe, in fact, was never from the mouth of the true born Nederlander. It was his companion in solitude, the relaxation of his gayer hours, his counsellor, his consoler, his joy, his pride; in a word, he seemed to think and breathe through his pipe.

When William the Testy bethought himself of all these matters, which he certainly did, although a little too late, he came to a compromise with the besieging multitude. The result was that though he continued to permit the custom of smoking, yet did he abolish the fair long pipes which were used in the days of Wouter Van Twiller  $\langle governor-general, 1633-1637 \rangle$ , denoting ease, tranquility and sobriety of deportment; and in place thereof did introduce little, captious, short pipes, two inches in length; which, he observed, could be stuck in one corner of the mouth, or twisted in the hat band, and would not be in the way of By this the multitude seemed somewhat business. appeased and dispersed to their habitations. Thus ended this alarming insurrection which was long known by the name of the pipe plot, and which, it has been somewhat quaintly observed, did end, like most other plots, seditions and conspiracies, in mere smoke.

But mark, Oh reader, the deplorable consequences that did afterwards result. The smoke of these villainous little pipes, continually ascending in a cloud about the nose, penetrated into and befogged the cerebellum, dried up all the kindly moisture of the brain, and rendered the people that used them as vaporish and testy as their renowned little governor --nay, what is more, from a goodly, burly race of folk, they became, like our worthy Dutch farmers who smoke short pipes, a lantern-jawed, smoke-dried, and leather-hided race of men.<234>

Although Kieft's documented imposition of severe penalties for "adulterous intercourse with heathens, blacks, or other persons," well for "slanderous as as language and other irregularities" <235> may have earned him the sobriquet "William the Testy," it remains questionable how much of this particular story is based on actual incidents.<236> Holmes As quips, however, "we don't need to depend on that learned historian Knickerbocker (Irving's pseudonym), for tales of the Dutchmen's devotion to their pipes. "<237>

#### D) THE SWEDISH EXPERIENCE

Little is known of the introduction and early use of Nicotiana species in Sweden. Tobacco was likely available in that country in the late sixteenth century<238> and certainly became commercially important by the 1630s.<239> Like all other Europeans, Swedes overcame anti-smoking legislation<240> and increased tobacco consumption throughout the seventeenth century.

#### trading activities

The Swedes also founded a rival trading colony in North America which was primarily concerned with the traffic in furs and tobacco.<241> Established in 1638, New Sweden was essentially not much more than a small outpost on the Delaware (near Wilmington) known as Fort Christina and a number of even smaller settlements in the surrounding countryside.<242> Because of its rather limited and short-lived presence in the Northeast, ethnohistorians have generally ignored New Sweden. Although the colony did not contribute substantially to the much-discussed "invasion" of America, <243> it did play a modest role in the global transculturation of Nicotiana.

An ordinance issued by Queen Christina of Sweden in 1641 recognized the fatuity of anti-smoking legislation and granted the New Sweden Company (also known as the Swedish West India Company(244) and the South Company(245)) the sole right to import tobacco into Sweden and its dependencies:

... if We as a careful Government were to forbid altogether the importation into our Kingdom of the said tobacco and thereby in time prevent, that the means of Our faithful subjects further go out of the Kingdom for such an unnecessary commodity to their final considerable injury and loss of property, yet, because this general habit and great abuse are practised by almost everybody and because at present We consider it injudicious to prohibit and abolish it entirely; Therefore We have been moved, to restrict it somewhat and adapt it to the circumstances of the times and the humor of the people and have consequently, after due consideration of the matter, resolved to place this trade into the hands of the South Company, established by Us, and privilege the same in regard to tobacco in so far, that the said South Company may hereafter and until We shall at some future time give them other orders, import and furnish us much tobacco as shall be needed and satisfy the demand of those, who prefer to have and use it and they shall likewise assist in preventing the abuse and enforce obedience to Our ordinances.<246>

A significant proportion of the Company's subsequent mercantile ventures was bound to the trade in tobacco with English and Dutch planters and merchants in both Europe and the New World.<247>

### cultivating the leaf in New Sweden

By far the greatest part of the New Sweden Company's tobacco supply came from foreign sources.<248> Yet, as only the tobacco and peltries from New Sweden were free of duty, cultivation of the plant in the North American colony was stimulated.<249> By 1643, and throughout the following decade, the governor of New Sweden, Johan Printz, encouraged the settlers of his inchoate colony to bring crops of **Nicotiana tabacum** to maturity.<250> In 1644 Printz noted that "maize can be bought cheaply from the savages here in the river," so that "the nourishment of the people shall not be so expensive." Therefore, he "appointed the people to plant tobacco on all places" and "engaged a special master or tobacco planter."<251> Printz's report included a list of people employed by the New Sweden Company, including eleven tobacco planters and two tobacco cask-makers at Christina, eight tobacco planters at the nearby Skyllerkill Plantation and seven at the Upland Plantation.<252> As was the case among their Dutch and English neighbors in America, the prospect of a lucrative tobacco harvest was a sufficient incentive to replace or postpone the growing of subsistence crops.

Though considerable efforts were made by the Company to encourage tobacco cultivation along the Delaware in the 1640s and 1650s, Jacob Price estimates that only a minute part of Sweden's was ever supplied from the North American consumption colony.(253) In 1644 New Sweden sent home a cargo of over 2,100 beaver pelts and 20,467 pounds of tobacco shipped in 77 Of the latter commodity, 15,476 pounds were hogsheads.<254> obtained through trade with Virginia, while only 4,991 pounds were actually from New Sweden plantations. <255> The English colonial product had been purchased for six to seven stivers a pound<256> while the Company had paid the Swedish freemen eight stivers a pound. Printz observed that:

the reasons for giving our own more than the strangers are, first, that one would make them in the beginning more industrious; secondly, in order that people, both of our own nation and strangers, may in larger numbers come here and settle under her Royal Majesty. When the land, with the help of God, has thus been populated, then one could easily regain the damage which is not very large.<257>

Once again a European power had employed Nicotiana to help colonize the North American continent.

By 1647 New Sweden's domestic contribution was still not much more than one quarter of her total exports: of the 24,177 pounds of tobacco sent home, only 6,920 were grown in the colony.<258> Although this limited production was no threat to the interests of New Netherland, the Dutch became increasingly annoyed at the irritating re-direction of Virginia tobacco to Fort Christina instead of New Amsterdam, as well as the siphoning of furs from the Dutch-controlled hinterlands. <259> When Johan Classon Rising, the new Governor of New Sweden arrived in 1654, he continued the policy of encouraging three commercial fronts: the fur trade with Amerindians, the tobacco trade with Virginia and tobacco cultivation in the colony itself. <260> The perceived encroachments on Dutch territories and trading activities finally prompted Peter Stuyvesant to seize New Sweden in 1655.<261> The terms upon which the hapless settlers were permitted to stay were not unreasonable, for "the land, upon which Fort Christina stands, with a certain amount of garden-land for the cultivation of tobacco shall be left to the people. "<262> Peter Lindestrom, who was visiting the colony at the time it was taken, later wrote about this cultivation in his Geographia Americae (1691).<263>

New Sweden was not destined to become a rival "tobacco colony" and had never teen a serious challenge to the established colonial trade in nicotian products. Kerkkonen believes that tobacco did not grow as well in New Sweden as it did in other areas and "when it proved not to be the source of rapid enrichment that it, among other things, had been expected to be, interest at home began to wane and the colony was left more or less to its own devices. <264> The leaf was, however, a prominent complement to the fur trade in the commercial success of the ill-fated settlement. <265> Despite the loss of its North American possessions, the New Sweden Company (which was reconstituted as the American Company) continued the tobacco trade with foreign powers to such a degree that, in 1658, it was pretentiously re-named the American Tobacco Company. <266>

E) CONSPECTUS

Between the 1560s, when England and France began learning to smoke, and the first decade of the seventeenth century, Europeans obtained tobacco from Amerindians, Iberian colonies in the New World and a limited domestic production. None of these sources were sufficiently reliable or cheap, and European merchants, unable to satisfy the staggering demands of addicted countrymen, were compelled to seek new ways of obtaining nicotian products.

After 1612 tobacco assumed extraordinary importance in the English colonization of North America. A fateful turn of events made an Amerindian plant and its associated habit, adopted by Englishmen less then fifty years before, the economic **sine qua non** of the first permanent English settlement on the continent. By 1619 King James and his College of Physicians were artificially regulating national taste by officially discouraging the English domestic cultivation of Nicotiana rustica, while unofficially promoting colonial production of Nicotiana tabacum.<267> The benefits of cultivating the latter were to lure a third of all seventeenth-century English immigrants to the New World, and virtually no aspect of early colonial life remained unaffected by the leaf. The European love-affair with the new panacea orchestrated the immigration, settlement patterns and boundaries of several colonial ventures. With startling irony, the very product offered to newcomers in the spirit of hospitality and trade often became the pathos of culture contact, as native peoples were displaced from traditional homelands.

Britannia had simply followed the Iberian precedent and established her own "tobacco colonies" in Virginia, Maryland and the West Indies. As increased demand became the inevitable corollary of rampant addiction, the French responded with similar colonies on at least four islands in the Lesser Antilles and, later, in Louisiana. Not to be outdone, the Dutch West India Company began producing tobacco in Brazil and in the Netherlands Antilles, in addition to freighting a considerable portion of the English product across the Atlantic. The success of these ventures prompted the administrators of the northern colonies to jump on the nicotian band wagon. The Dutch along the Hudson, the Swedes along the Delaware and, finally, the French along the St. Lawrence, all had tobacco plantations. As a result, there were few colonial settlements on the Atlantic side of the New World (from Brazil to Quebec) that did not at one time or another

experiment with the cultivation of Nicotiana.

With such a seemingly endless supply of nicotian resources entering the global marketplace throughout much of the seventeenth century, the indigenous product offered by native peoples of North America no longer had the power to attract European traders as it had in the days of Henry Hudson. This did not mean that tobacco ceased to play a prominent role in the contact of natives and newcomers. Indeed, as will be seen in the next chapter, the role was expanded as the newcomers began bringing the leaf into the continental reticulation of trade relationships.

Aside from its impact on economic growth, widespread tobacco cultivation ensured that smoking would continue to have a prominent place in frontier and colonial life. Early explorers of the New World had marveled at the ubiquity and importance of the habit among the indigenous peoples they encountered. On occasion the astonishment even turned to disgust as they entered smoke-filled dwellings and viewed the inhaling of a burning weed as the epitomy of barbarism. Yet, now, the offspring of these very observers were, as John Smith complained, "rooting in the ground about tobacco like swine" and smoking at least as much as the people whose lands they were cultivating.

The combined effect of this was to weaken the cultural barrier between Amerindian "savagery" and European "civilization," much like smoking bridged native ethnic boundaries in prehistoric times. While ever present in the areas of English, Dutch and Swedish colonial ventures, this phenomenon was particularly true in New France where, not only the behavior but its material manifestations (i.e., smoking substances, pipes, tobacco pouches, etc.) were shared by natives and newcomers. As noted in Chapter Eight, the consequence of this transculturation was to create a veritable intellectual crisis in nineteenth-century Europe and North America.

### CHAPTER FIVE EUROCOLONIALS RETURN THE AMERINDIAN GIFT

## A) ENGLISH DISPENSATIONS OF TOBACCO TO AMERINDIANS

#### background

It seems clear that during the first decade of the seventeenth century, Amerindians on the eastern seaboard of North America provided English explorers with considerable quantities of tobacco.<1> After the English had learned to cultivate the plant and produce a cheap alternative to the expensive Spanish and Portuguese colonial imports, surpluses became available for distribution to other European countries and to Amerindians in the New World. Physical addiction, the transactional role of tobacco in native socio-political relations, the importance of smoking and invocations in shamanic-based relgious systems, the pervasion of the plant in the colonial ethos and the economics governing the exchange of goods and services between natives and newcomers, all contributed to the widespread distribution of processed Nicotiana to Amerindians of North America. Although Euro-Americans continued to receive token amounts of tobacco from native peoples as late as the nineteenth century (see Table 3.1), the trend had already been reversed two-hundred years earlier, as Amerindians became increasingly dependent on the European supply. Indeed, the tobacco given to Whites in the later periods had often been received from them in the first place.<2>

To more fully appreciate the scope of English/American dispensations of tobacco, a sample of references from several hundred ethnohistoric accounts (covering three centuries of culture contact) has been selected and summarized chronologically in Table 5.1. It appears obvious, even from this condensed list, that Amerindians throughout the continent were, on a regular basis, receiving significant quantities of the precious smoking substance from explorers, traders and colonists.

As early as 1598 a handbook for seamen, titled The cures of the Diseased in remote regions, Preventing Mortalitie Indicent in English Nation, <3> advised the Forraine Attempts of the application of tobacco juice for erysipelas.<4> Subsequent English colonists and fur traders also found tobacco smoke a comfort in their privations and hardships.<5> In his account of two voyages made to New England in 1638 and 1663, John Josselyn, for example, reiterated the Monardesian gospel extolling the virtues of the weed. <6> The European idea that the herb was a panacea was easily transplanted to the New World where it was nourished by the infrastructural preoccupation of colonial Tobacco was not only the livelihood of many a settler planters. but it was thought literally to sustain the life and well-being of explorers. Jonathan Carver, who was later to publish his enthusiastic Treatise on The Culture of the Tobacco Plant (London, 1779), <7> recalled a close call during his travels among the Fox:

Not long before my arrival among them, the fever and ague at first, afterwards accompanyd by a multiplicity of other disorders which provd mortal like the plague

carryd off in a little time near an hundred warriours besides women and children... For some time, the whole town which was very compact stunk in such a manner that I was under great fear for myself and the party with me on account of the contagion, but by applying our silves to smoaking and chewing tobacco it provided a sufficient antidote and we were so lucky as to pass through this country safe, on that account.<8>

Since Europeans, anxious to maintain health and hopelessly addicted, never traveled without it, tobacco was a standard component of the physical and ideological baggage of North American exploration.

### gratuities and bribes to the natives

As Englishmen came to understand the transactional value of tobacco in culture contact, its dispensation began to serve a variety of European interests. Even before contact was made, the plant was useful as bait, as Hooper learned when he attempted to lure aloof groups of Tuski and Inuit by dropping scraps of tobacco on neutral ground and retreating a distance to observe native reactions. <9> Once native peoples recognized that the newcomers were carrying large quantities of the valued substance, White explorers throughout the continent were overwhelmed with an unremitting barrage of requests for samples.<10> An eighteenth-century trader at Severn noted the typical Amerindian verbal greeting: "I am hungry for tobacco." "This is their general cry," he added, "so that those who are acquainted with their> manners can tell what they are to say before they open their lips. <11> In 1847 the practice of begging for tobacco came close to precipitating a war when a Cheyenne Chief was shot by a nervous frontiersman as he advanced asking for the herb.<12> Other natives found it easier to simply steal, and we find indications in the literature that Europeans were thereby occasionally deprived of their stocks.<13>

Transporting tobacco to the remote interior of North America was likely easier than carrying iron axes, copper trinkets and kegs of rum. Yet, as the experience of Alexander Ross suggests, the sheer quantity required to satisfy both White and Native smokers was a burden for any traveler:

... I took hold of a roll of tobacco, and after adjusting it on my shoulder, and holding it fast with one hand, I moved on to ascend the first bank; at the top of which, however, I stood breathless, and could proceed no farther. In this awkward plight, I met an Indian, and made signs to him to convey the tobacco across, and that I would give him all the buttons on my coat; but he shook his head, and refused. Thinking the fellow did not understand me, I threw the tobacco down, and pointing to the buttons one by one, at last he consented, and off he set at a full trot, and I after him; but just as we had reached his camp at the other end, he pitched it down a precipice of two hundred feet in height, and left me to recover it the best way I could. Off I started after my tobacco; and if I was out of breath after getting up the first bank, I was During my scrambling among the ten times more so now. rocks to recover my tobacco, not only the wag that played me the trick, but fifty others, indulged in a hearty laugh at my expense...<14>

The use of a canoe was not necessarily easier, as Alexander Henry found out in 1800 when he lost three bales of tobacco and other goods in a rapid stretch of the Winnipeg River.<15>

Ironically, the very load that occasionally impeded progress, more often facilitated travel.<16> Lewis and Clark's trail through Amerindian territory was blazed with the help of tobacco (see Plate 5.2), <17> and, when John Wyeth was outnumbered by an army of Blackfoot, his stock came in handy:

They rode up and completely surrounded us; and then all was silent. Captain Sublet rode up to the chief, and expressed his hope that all was peace. The savage replied that there should be peace on their part, on condition that Sublet should give them **twenty-five pounds of tobacco**, which was soon complied with, when the Indian army remounted their horses, and rode off at full speed as they came on: and we pushed off with like speed, lest they should repent their bargain and return upon us to mend it.<18>

To ensure safe passage during a trip in 1775, Alexander Henry (the elder) was also obliged to give two bales of tobacco and other presents; after these were "bestowed, or rather yielded up," he "hastened away from the plunderers."<19> Heimann goes so far as to call tobacco the "white man's passport in opening the West" and a "necessity to travel along with the beads, mirrors and other trading goods used to purchase food and life insurance."<20>

Tobacco helped purchase a broad range of services. Farnham used it to encourage natives to paddle his canoe, <21> agents for Maryland offered it to elicit military intelligence from the Iroquois<22> and William Wood gave his "naked host" a piece to help guide him "through the strange labyrinth of unbeaten bushy wayes in the woody wildernesse" that was New England.<23> Karl Bodmer, the extraordinary artist on Prince Maximilian's expedition up the Missouri River, pacified hyperactive chiefs by constantly filling their pipes during the long hours required for watercolor portraiture.<24> Then there is the case of Mary Rowlandson, the wife of a New England minister who, while in native captivity in 1676, was allowed to ask her husband to send three pounds of tobacco which were given to her captors to ensure her well-being.<25> Others found tobacco a useful incentive for Amerindians to hunt geese and whales,<26> sell their dogs,<27> and trade their horses.<28> English travelers in Carolina commonly helped themselves to provisions left in native dwellings, whose owners would later return to find a gratuity of tobacco.<29> In one extraordinary case "a young Eskemoe boy," who had been captured by Amerindians of James Bay, was bought in 1736 for a pound of tobacco and other goods so he could serve Albany Fort.<30>

One of the most popular reasons for tobacco dispensations by the English was to encourage Amerindians to change allegiance or religion. In 1691 Governor Henry Sloughter of New York told the Iroquois that he was "very pleased that the understanding in religion is so farr advanced that you cannot only distinguish between the Christian Religion and Paganizm but also between the Reformed Religion and that of the Romans." "I hope," he added, "your Minister will take care further to instruct you in the Religion of our great protestant King," whereupon he gave the Iroquois (among other things) three rolls of tobacco.<31> The Governor later distributed 579 pounds of tobacco to the Five Nations, in part to discourage them from listening to the French Jesuits.<32> Over the next few years Sloughter's interim successor, Richard Ingoldsby, and Governor Benjamin Fletcher distributed hundreds of pounds of tobacco to the Five Nations as a mark of the English "Majesty's esteem," to continue a "steady

adherence to the Interest" and to keep the "Covenant Chain from all rust."<33> The latter phrase was a typical figure of speech (borrowed from Iroquois political rhetoric) which referred to the symbolic link between the English colonies and the Six Nations established after 1677.<34> Enormous sums of money were spent by the English annually on tobacco and other presents in order to "brighten," "grease," or "polish" the Covenant Chain.<35> At times ingenious methods were devised to help defray the expenditures for such gifts. In Virginia, during the year 1752, for example, a tax of two shillings per hogshead of exported tobacco was levied specifically for this purpose.<36>

Throughout the voluminous Documents Relating to the Colonial History of New York we find numerous references to the practice of dispensing generous gifts of tobacco to native peoples.<37> By 1700 Governor Richard Coote, Earl of Bellomont made the English position quite clear to the River Indians at Albany:

...if you intend to convince mee of your affection and duty to the King, you must resolve to renounce all sort of correspondence with Canada and neither be instructed by the Jesuits or other Popish Missionaries in their religion, nor cary on any trade with the French of Canada or their Indians...To conclude the King our great Master does mee make you a present equall with the rest of his subjects of each of the five Nations viz. (among other items) 20 lbs. Tobacco...<38>

Two years later Lord Cornbury handed out half a cask of tobacco to assure the same natives "of ye Queen's motherly care and Protection."<39> The large quantity of tobacco and other goods given to the Six Nations in the name of Queen Anne and King George I, were justified by a statement made in 1739 that removes all doubt of an underlying causal relation between "presents" and

#### allegiance:

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The method used to keep them steady to the British interest has always been the making of presents to them which tho it be some Expence to the Crown not only secures them in our interest in opposition to the French but is also a great inducement to enure them to the war and use of our Manufactures rather than the French manufactures...<40>

While some Englishmen were giving tobacco to native peoples "to enure them to the war," others were handing out nicotian products to help Amerindians redirect their efforts from hostilities to hunting. In 1728, for example, Thomas McCliesh offered forty fathoms of tobacco and other goods "to carry as presents to make peace with the Poits, but they with scorn and anger refused the said presents and told me I was like the French to have them destroyed by their enemies."<41>

In many instances the English distributed tobacco for the same reasons Amerindian groups gave it to one another: to reciprocate a friendly visit, to regale, as proof of pacific a token of sincerity intentions, or as at treaties and conferences.<42> If European powers wished to have any diplomatic relations with North American Indians, "all conferences had," as Jacobs observes, "to follow adherence to custom with painstaking regularity, especially with regard to the delivering of presents. "<43> Indeed, that Eurocolonials were behooved to adopt native rituals is one of the most striking (yet woefully under-researched) themes in the literature on culture contact. Fenton believes that, "toward the close of the seventeenth century colonial agents had learned the essential lessons in forest diplomacy:

The host was expected to provide tobacco for the councillors' pipes, for it was said that "from smoking comes good thoughts," and he was also expected to provide "something to wash away the tobacco taste," be it berry water, wine, rum, or brandy. And fulfilling this demand led to abuse...Small wonder the colonials complained bitterly over the increasing costs of food, liquor, and presents to Indians during the eighteenth century, but they tolerated the expense at treaty councils so long as the crown subsidized it.<44>

This was particularly true at the great councils of Albany (N.Y.), where government officials sat across from a full panoply of Iroquois sachems, speakers and warriors, each expecting the traditional gifts.<45> But it was also the case at Hudson Bay posts, where presents of tobacco "to keep them firm" to the fur trade company's interest, always preceded barter exchange.<46> These preliminary gifts were part of an elaborate ceremony which sometimes lasted for several days. The event invariably included a pipe-smoking ritual, and almost certainly paralleled similar occasions in both historic and prehistoric, interband forced contexts.<47> Competition not only companies to incorporate such ceremonies into their market economy, but compelled them to send gifts of the leaf inland to re-win the affection of native peoples who had begun bartering with rival concerns. <48>

As explorers, trappers and fur traders moved into the interior with fixed resolve, tobacco became the standard diplomatic gambit in relations with Amerindians.<49> Ross's adventures in the Northwest fur trade included an encounter with five hundred well-armed natives, each of whom received a tobacco leaf "which took considerable quantity and some time to distribute."<50> Recalling his expedition from Pittsburgh to the Rocky Mountains, Long noted that he was unable to satisfy the demands for tobacco by the Pawnee, "as we expected soon to meet with Indians, whose good will it would be more important for us to purchase. "<51> After distributing tobacco to the Comanches in the 1830s, Gregg remarked that "they very soon settled down into a state of placidness and contentment." "Indeed," he added, "with wild Indians, presents are always the corner-stone of friendship."<52> At about the same time Maximilian of Wied observed that the Amerindians at Fort Clarke "require to be always regaled, which is generally done, and it was estimated that in one year they smoked two-hundred pounds of tobacco at the expense of the Company. (53) When the Fond du Lac Department suddenly cut off the traditional gifts of the leaf and ammunition to Amerindian traders, the result was anger and unrest among the Ojibwa. <54> The importance of tobacco as a pacifier is epitomized by its prominence in government rations to the Indians (issued under the motto "cheaper to feed than to fight"), after surviving tribes were confined to reservations in the late nineteenth century.<55>

### tobacco in intersocietal commerce

Although the use of gratis **Nicotiana** as a passport, as "life insurance," as a pacifier and as a lever in the European contest for Amerind allegiances, led to widespread dispensation throughout the North American continent, even greater quantities changed hands within the complex barter economy of post-Columbian trading networks (see Plates 5.1 and 5.2).<56> These networks are usually subsumed under the inapposite rubric "fur trade"--a Eurocolonial label that merely describes the predominant goods flowing in one direction. From equally-ethnocentric, an Amerindian perspective the transactions might be described as the "ammunition/cloth/metal trade," or the "brandy/tobacco trade." Since many types of goods changed hands, it is probably best to "class them all abstractly," as Jennings does, <57> and view the exchange in the broader realm of intersocietal commerce, while simultaneously retaining the traditional, short-hand label "fur trade."

In the early years of culture contact, Europeans used tobacco to help 'purchase' land from native peoples, <58> but this later shifted to a trade for surplus food and, more commonly, the Initially, colonial tobacco wastes, all-important furs.<59> unfit for the discerning English palate, appear to have been dumped into the fur trade where addicted Amerindians were more willing to barter for inferior nicotian products than for clothes and blankets.<60> The importance of tobacco in seventeenth-century commerce is, perhaps, best illustrated by an excerpt from Governor Thomas Dongan's report to the Lords of Trade on the condition of New York Province in 1687:

And indeed it were in my opinion very necessary for the advantage of this Place and increase of his Matys Revenues that it were soe ordered that the Tobacco of these Countrys may bee imported hither without paying there the duty of one Peny pr pound, and then wee should not bee at such streights for returns...Besides wee find the contrary to bee very inconvenient in this that whereas formerly the damnified Tobacco which came from thence not fit for England wee made up in Rolls & sent ye same up the River to the Indians who in exchange gave in Beaver and Peltry, for want whereof his Majesty's revenue here is much impaired inas moch as the Indians are therefore forc't either to plant the Tobacco themselves or to goe where they can be furnished with it, and there carry their Beavor and Peltry (they being of that temper that they had rather want (i.e.,lack) clothes than tobacco) by which means his Majesty's Revenue sustains a double loss, one in the ten per cent such tobacco pays custom up the river, and the other in the Custom of such Beaver and peltry as the same, would produce.(61)

Tobacco became the trade good par excellence since it was often desired by native populations as much as any other commodity, and since Europeans could obtain almost unbelievable amounts of food and furs for relatively modest quantities of the In the eighteenth century traders received, for a mere leaf. pound (or less) of tobacco, one prime beaver, while others claimed to have purchased as many as seven pelts per pound.<62> Alexander Henry (the elder) reported that "tobacco, when sold, fetched one beaver-skin per foot of Spencer's twist." <63> By 1806 Lewis and Clark were able to obtain roots, dogs, sturgeon, dried salmon and seal meat from Amerindians who refused to accept anything but tobacco in exchange. This situation resulted in such shortages among the addicted explorers, that nicotine withdrawal made much of the return trip almost unbearable. <64> A few years later Bradbury traded two dollars worth of tobacco (or approximately one pound) to the Ponca for more than one-thousand pounds of jerked buffalo meat. <65> At about the same time Ross observed, with some astonishment, that natives at Fort Kamloops were so anxious to trade and so fond of tobacco, that "one

morning before breakfast I obtained one hundred and ten beavers for leaf-tobacco, at the rate of five leaves per skin. <66> Maximilian of Wied acquired numerous wolves at two rolls of tobacco apiece, <67> while Townsend calmed the incessant cry "pi-pi, pi-pi" ("tobacco, tobacco") by trading his stock of the desirable article for living birds and fish, as well as wolf, fox, mink and other pelts. <68> While at Point Barrow in 1837, Thomas Simpson was amazed at how "beads, rings, buttons, fire steels, everything we had, were regarded as inferior to tobacco, a single inch of which was an acceptable equivalent for the most valuable article they possessed. "<69> Two years later Farnham remarked, with a typical frontier ethnocentricity, that on the ÷÷ Great Western Plains many natives:

ran after us for tobacco, and to drive a bargain for horses. All the Indians have a mania for barter. They will trade for good or evil to themselves, at every opportunity. Here they beset us on every side. And if at any moment we began to felicitate ourselves on having at last escaped from their annoying petitions for "shmoke" and "hos," the next moment the air would resound with whips and hoofs, and "shmoke, shmoke," "hos," from half a dozen new applicants, more troublesome than their predecessors. No Jew, with old clothes and a pinch-beck watch to sell, ever pressed customers with more assiduity than did these savages.<70>

It was predominantly **not** the case that addicted natives, through acts of final desperation, were willing to give anything they had to fill their pipes. In fact, many Amerindians believed **they** were getting the better deal when one of the most precious substances on earth (and, indeed, food of the gods) could be procured for a few fetid pelts.<71> The relative worth, in native minds, of beavers and tobacco is best illustrated in the rather rare cases when **both** commodities were sold **by** Amerindians. Ross observed that the Snakes, who grew their own tobacco,

would often bring it to our people for sale; but generally in small parcels, sometimes an ounce or two, sometimes a quart, and sometimes as much as a gallon. In their bartering propensities, however, they would often make our friends smile to see them with a beaver skin in one hand and a small bag containing perhaps a pint of the native tobacco in the other: the former they would offer for a paper looking glass worth two pence; while for the latter they would often demand an axe worth four or five shillings. $\langle 72 \rangle$ 

It is clear that, throughout the nearly three centuries of culture contact prior to the reservation period, tobacco figured prominently in the barter economy of natives and newcomers. Yet, although most Amerindians desired tobacco and other European goods, not all Europeans made the long voyage to the New World in search of furs. Nor is the history of the fur trade the same The old idea of the trade as throughout North America. a "monolithic enterprise" has more recently been replaced by regional studies such as the one by Francis and Morantz. <73> An understanding of the role of Nicotiana in intersocietal commerce necessarily depend on recognition of patterns and must regularities emerging from a diversity of interactions among many cultures and interest groups within a wide spatio-temporal context.

The advent of tobacco production in Virginia and Maryland rendered the fur trade secondary in these areas and thus, Amerindians often became a liability rather than an asset.<74> Unlike New Netherland and New France, which had significant

interests in the commercial exploitation of peltry, some English colonies of the mid-seventeenth century concentrated their efforts on colonization rather than Amerindian trade. England envisioned a populated "land of the golden leaf" rather than "a storehouse for the skins of dead beasts."<75>

In the period between the founding of Plymouth (1620) and King Philip's War (1676), the fur trade did assume some importance in the economy of New England. <76> Though the Plymouth colony was a fur-trading post from the beginning, and was able to export 13,000 pounds of beaver and otter in the 1630s, this trade soon fell off and the colonists turned to the raising of cattle.<77> Limited trading also occurred along the coast of Maine, in the Narragansett country and in the Merrimac Valley.<78> The most significant commerce was along the Connecticut River, where William Pynchon and his son virtually monopolized the traffic in peltry.<79> The prominence of smoking in the everyday life of New England (80> undoubtedly spilled over into the interactions with native peoples and tobacco likely had a valued place in the barter. Though quantities of Nicotiana tabacum were almost certainly traded to Amerindians by the English in the sixty years between the founding of Virginia and the establishment of New York, few records of such transactions survive.

The New England trade in beaver only lasted a few decades, and soon agriculture, fishing and lumbering became preeminently important.<81> Quinn points out that furs were scarcely enough in

themselves to lead people to leave England for America. <82> It has already been noted that the English in colonial America, as a whole, received more revenues from tobacco than from furs. <83> It is perhaps for this reason that, in 1700, the Board of Trade gave only guarded approval to trading operations in the south, provided they posed no threat to tobacco production. <84> An Enalish commerce in peltries did, however, floresce in particularly with significant areas, the seizure of New Netherland in 1664 and the founding of the Hudson's Bay Company six years later.

When the Dutch Fort Orange became the English settlement of Albany, Amerindians continued to bring furs to this location and to exchange these for the same or similar trade goods.<85> The expulsion of the Dutch led to an Anglo-French rivalry along the New York frontier which, at least initially, was confined to a commercial competition for native furs and allegiance.<86> The English consistently outbid the French, since Albany apparently paid two to four times as many trade goods for beaver as did Montreal. <87> It is possible that the type and quality as well as the quantity of European tobacco offerings played a part in luring native clients, just as specific styles, textures and in Amerindian preferences colors were important criteria for certain woollen garments.<88> We do know that nicotian products were involved in these exchanges since, by 1678, the Albany magistrates, in an effort to discourage monopolies and ensure fair access to the trade among all inhabitants, ordered that those who offered Indians tobacco, tobacco pipes, tobacco boxes

and other small commodities may not also sell larger wares such as duffles, strouds and blankets.<89> Given the desirability of tobacco and its associated paraphernalia among native peoples as well as the presence of intra-colonial competition, it is possible that qualitative differences in these products may have contributed to native preferences for either French or English of non-commercially traders. The complexities motivated, European-Amerindian alliances in seventeenth-century northeastern North America preclude further conjecture. More certain is the probability that tobacco should be included in the list of essential goods (gunpowder, woollen articles, rum, etc.<90>) traded by the English to the Iroquois.

#### Nicotiana for Castor, 1670-1763

Undoubtedly the most important vehicle for the English dispensation of tobacco to Amerindians was the Hudson's Bay Company (HBC), with its elaborate network of trading forts and a sphere of influence that eventually encompassed most of present-day Canada. During preparations for launching the Company's first trading venture in the late 1660s, the organizers recognized that the Indians of Hudson Bay would likely desire French trade goods to which they had become accustomed. <91> Nevertheless, the first ships, the Eaglet and the Nonsuch (despatched two years before the royal charter was proclaimed in carried a roll of tobacco bought 1670), from a London tradesman.<92> By 1671 the French Jesuits had observed some of this English tobacco in the hands of native peoples on the

Saguenay, and had attempted to discourage the latter from further contact with the Europeans of the "North sea."<93> Yet the competitors were there to stay, and in 1674, the Company sent nearly 1,000 pounds of Bermuda or Virginian tobacco to the Bay.<94> The Minutes of the HBC give particulars on the amounts of tobacco purchased for outward cargoes during the period from 1679-84, and are a good indication of the massive quantities shipped to North America by the 1680s.<95>

Given no other choice, the English colonial product was acceptable to most native peoples. Yet, in its struggle with the French for control of the fur trade of southern Rupert's Land, the Company was at a decided disadvantage: the trade tobacco obtained by the French from the West Indies or, more commonly, from Brazil via Portugal, was such an overwhelming favorite among Amerindians that it was responsible for luring many native traders away from the HBC.<96> This was all the more irritating to English traders, since it went far to neutralize the cost advantage gained by shipping goods directly from England to the Bay posts, rather than from France to Quebec and then hundreds of miles by canoe into the interior.<97>

By 1685 the HBC was forced to change the quality of one of its principal trade goods when it was realized that obtaining foreign tobacco, even at three times the Virginia price, was better than losing furs to French competition. In May of that year an HBC official wrote:



An engraved cartouche from William Faden's Map of the Inhabited Part of Canada, from the French surveys (1777) showing a trading transaction in which both natives and newcomers are smoking their respective pipes. The fact that both sides were accustomed to smoking facilitated intersocietal commerce.

PLATE 5.2



Figure A is a scene showing Lewis and Clark engaged in diplomatic discourse with Amerindians. Tobacco gambits were essential to ensure safe passage and the explorers gave so much away that they had none for the return journey. Figure B is a nineteenth-century painting by Coke Smyth illustrating a bargaining session. Pipe smoking was a necessary prelude and was considered a sign of good faith in the barter.

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We are sorry the Tobacco, we last sent you, proves so bad, we have made many yeares tryall of Engelish Tobacco be severall persons, and whiles we have traded, we have had yearly complaints thereof. We have made search, what Tobacco the French vends to the Indians, which you doe so much extoll, and have this yeare bought the like (vizt.) Brazeele Tobacco, of which we have sent for each Factorey, a good Quantety, that if approved of we are resolved in the future to suppley you with the like, as you have occation: But be carefull to sell them, not halfe the Quantety of this, for it costs us treble the price.<98>

Stable relations with Portugal gave the Company ready access, and as Rich observed, it "was henceforth firmly wedded to the Brazilian product."<99> Having received "the best Brazeele, that which the Indians are so much bewitched with,"<100> conditions were dramatically improved, and an initial standard of trade at half a pound of tobacco for a winter beaver was established.<101>

Throughout the next two centuries (c.1690-1890) the success of the northern fur trade was in large part dependent on the availability and condition of high-quality "Brazil" tobacco, which in the early years was bought in Oporto and transported in Portuguese ships to avoid capture by the French.<102> So important was this commodity in the competition for furs, that HBC officials scrambled to make special shipping arrangements when Portuguese vessels failed to arrive in London on time.<103> As the Copy Booke of Letters Comissions Instructions Outward (1688-1696) indicates, a related problem was the condition of old stocks:

...use your utmost care and skill in Buying of 20 Roles of Brazeile tobacco which they Compute to bee about 3600 pound weight in the whole, which quantity they have ocasion for, Pray take care that it bee of the Last and freshest Importation, haveing found that part of what they have Lately received to be unsound, and

Consequently of noe use and they hope the price will bee verry Reasonable by reason they understand greate quantityes are arrived with you, when these goods are Provided, they desire may bee shipped in the first Portuguise Shipp that comes for London, haveing Received great disapointment by the late Comeing of the Last Parcell.<104>

Despite the tardiness of Iberian merchants and annoying proportions of mouldy leaves (which prompted the occasional substitution of the English or Virginia product),<105> the Company did manage to send a steady supply of "Brazil" to Hudson Bay during the last decade of the seventeenth century.<106>

By 1700 the Company noticed an alarming decline in the number of beaver pelts traded, despite an investment of two-thousand pounds of "Brazil." Excuses ranged from "an excessively hard winter" to unspecified "strategems of the French," though part of the falling-off was almost certainly the result of an economy-conscious shipment of Virginia tobacco "spun up" to imitate the Portuguese product.<107> Amerindians were neither fooled nor pleased.

In 1705 Governor Fullertine of Albany Factory requisitioned two hogsheads of Virginia leaf (though he received English roll) tobacco for resale to Company servants at one shilling per pound. It was expressly forbidden to trade this roll to the Indians; moreover, only the damaged "Brazil" tobacco "that ye Indians wont buy" was sold to employees at a rate of five shillings per pound.<108> In 1713 the HBC Committee reminded Governor Beale that he should "not deliver our Servants any Brazeill tobacco, but Reserve that comodity for the Indians onely Except such as the Indians Refuse. "<109> Before the increasingly competitive fur trade gave Amerindians a choice of Nicotiana types, the English traded the "damnified" Virginia stocks not fit for European consumption. Now Englishmen were smoking one-shilling tobacco and trading away an expensive five-shilling product. The image of little or no Amerindian control over the lucrative northern fur trade must be rethought, and we are compelled to agree with the recent conclusions of several historians and anthropologists who suggest that natives had an active and creative role in the barter.<110> At considerable cost to the Europeans, native peoples received precisely what they most desired and enjoyed a seller's market.<111>

Even after the Treaty of Utrecht (1713), when France acknowledged Britain's claim to Hudson Bay, "Brazil" tobacco was required to at least neutralize, if not overcome, an on-going French competition for furs. The French began building trading houses at the headwaters of rivers leading to the Bay, thus saving native peoples the long journey to HBC posts. This would have hurt the Company's interests much more had not a highly organized shipping conduit assured a relatively constant supply of fresh Portuguese colonial tobacco at English posts, <112> which was traded at an official standard of one pound per beaver. <113> Writing from Albany Fort in 1716, Thomas McCliesh pleaded that his requisitions of "Brazil" be in no way diminished. <114> He had good reason for worry, since droughts in South America made the precious leaf scarce between 1715 and 1718, despite emergency purchases of surplus stocks in Holland.<115> There was a

constant threat of Amerindian clients deserting to the French or wandering fatuously from post to post in search of the elusive weed.<116>

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The HBC Committee appreciated the vital role of "Brazil" tobacco in the competitive fur trade and continued to invest considerable effort in its acquisition. Rich argues that:

the expedients to which the Committee were put to to get this tobacco are at once a proof of the importance which they attached to it and of the knowledge of European trade which, in their private capacities, the members of the Committee could put at the disposal of the Company. The 'Choice Brazeil Tobacco of the Sweetest Smell and of a Small Role about the size of a man's little finger' (the smallest it could be made, since the tobacco was traded by length, not by weight) was sought in Lisbon, in Hamburg, in Amsterdam and in London. Price did not matter; 'Note that wee desier the Best Tobacco therefore doe not Limit you in the Price' they wrote Colonel Pery, who had talked with tobacco importers and had brought the information that the best small twist came from Pernambuco but that the Company had only bought Bahia twist which would not stand the delays necessitated by shipping... The Committee were even prepared to buy twice their needs, in case one supply should be held up in delivery by the war, and their willingness to pay any price was not only due to their insistence on quality but also to the sheer necessity to get supplies. In 1708, for example, they bought an extra fifteen hundredweight at Dunkirk in case the Lisbon order might be delayed, and then a further thousand pounds 'Lett it cost what it will' so long as it could be got to London in time for shipment.<117>

Yet, despite a policy of "letting it cost what it will," complaints of shortages persisted into the 1720s. According to McCliesh, York Fort had traded all of its tobacco allotment before the year was half over and was obliged to borrow from another post. He assured London that none of the employees had smoked leaves that were fit to be traded, but admitted they were "forced to throw to the dunghill at least 134 lbs. of Brazil tobacco" that had been sent only the year before (1723), but was now "wholly rotten and crumbled like dust." <118> Similar problems were reported from Albany Fort, where efforts to salvage deteriorating "Brazil" roll by adding molasses made things even worse, so that both Cree and English "would not smoke it could they have it gratis." <119> In the late 1720s the quality of "Brazil" increased once again, <120> and officials were encouraged to apply a standard of as little as 1/4 pound for one beaver skin. <121>

As it turned out, the next decade of trading was no less plagued by tobacco shortages and concomitant disillusionment of Amerindians. Advising the Company from York Fort in 1730, McCliesh wrote that:

...as to your being disappointed in getting Brazil tobacco, we are heartily sorry for the same, it is a bewitching weed amongst all the natives, and as for the English roll, they do not care for it. I understand there is at Churchill two years' trade of Brazil, therefore design to order two tribes of the Port Nelson Indians to go down to Churchill next summer, likewise some Seni-Poits, by reason we have little more than half a year's trade, having traded this summer upwards of 3200 weight, for if possible I do design to keep a sufficient of what is sent this year for those Indians that borders near the French settlement, having traded with the said Indians at least 4500 martens this summer.<122>

Twelve months later he predicted that the trade would again suffer a decline if an inadequate supply of "Brazil" persisted:

...it is my opinion that our next ensuing year's trade will fall much short of this year's, which must be in a great measure attributed in our being short of that cursed bewitching weed (Brazil tobacco); at same time there was not one Indian that went from hence this summer but had an equal share of Brazil tobacco, and 30 lbs. left when our trade was over, but provided had there been such a quantity last year as here is at present, we had traded at least 4000 lbs. and it is to be hoped that none of your factories for the future will be unprovided of that commodity fresh and good, as this sent this year appears to be.<123>

The loss of the ship **Hudson's Bay** in 1736 created havoc in the Company's carefully planned distribution system, as rumors of tobacco shortages caused native peoples to desert York and head for Churchill.<124> Fortunately the latter post had sufficient supplies and trade was in no immediate danger of being lost to the French. The problem of natives deserting one post for another became so common, however, that adjustments to the trade value of tobacco were made. Albany and Moose offered for one beaver a length of "Brazil" weighing as much as a pound, while York and Churchill gave only three-quarters as much.<125> By the 1740s the so-called "standard" was said to vary anywhere from one to seven beavers for a fathom of tobacco.<126>

As the French continued their overland penetration into the interior regions, the cost of transportation became such a liability that they occasionally sent faithful native allies to HBC posts to secure heavy trade goods for redistribution to other trading partners. In the mid-eighteenth century the chief factor at the French settlement on Nelson River boldly asked the British at York Fort whether the latter might consider trading heavy goods such as tobacco, guns and kettles directly to the **French.<127>** Whether obtained from the British, the French or even from the British via the French, Amerindians were guaranteed a supply of the Portuguese colonial product.<128> Native phrases contained in James Isham's Observations and Notes (1743-1749), such as "This tobacco has a bad taste, I will not trade itt," <129> suggest a continuing Amerindian prerogative in the specification of quality trade goods during this period. It is also evident from other phrases, however, that the French were, for reasons likely related to transportation costs, occasionally incapable of providing sufficient incentives for the barter. During a trading dialogue with the British, a Cree chief exclaimed:

...we come a Long way to See you, the french sends for us but we will not here, we Love the English, give us good (brazl. tobacco) black tobacco, moist and hard twisted, Let us see itt before op'n'd...Let the young men have a Roll tobacco cheap...<130>

It is clear from other sources that the British trade was sometimes made possible only if, and when, the competition was lacking the precious "Brazil" variety. During his trip from York Factory to the Blackfeet Country (1754-1755), Anthony Henday was forced to pass the French who were trading with Assiniboines at Basquia and La Corne. He complained that:

The French talk several languages to perfection: they have the advantage of us in every shape; and if they had Brazile tobacco, which they have not, would entirely cut off our trade. They have white tobacco made up in Roles of 12 lb wt. each.<131>

### Nicotiana for Castor, 1763-1890

By 1758 the war with England had begun seriously to affect the French supply lines to Canada. When Joseph Smith travelled inland the same year, he found that the French were stocked with "sum backer," which was "veary bad" and appeared to pose little competitive threat to the "Brazil" obtainable at HBC posts.<132> After the Conquest of 1763 the organized French effort was almost entirely replaced by numerous individuals, partnerships and small companies who vied with one another for the lucrative fur trade. These traders (called "Pedlars" by the HBC) "peddled" their goods directly to native encampments on rivers that flowed through the areas from which the Company drew much of its trade. In 1767 William Tomison was sent inland from the Bay to investigate the new threat and to encourage Amerindians to travel to the HBC posts. He reported with obvious concern that only the native "Brazil" desire for tobacco prevented the Pedlars from monopolizing the barter.<133> Two years later even this advantage was in serious jeopardy. An Englishman from Montreal named James Finlay not only questioned the Company's claims on trading territory, but announced his determination to obtain his cherished Brazilian product.<134> supply of the own Soon thereafter Cocking reported, with considerable alarm, that, despite high inland transportation costs, the Pedlars managed to trade "Brazil" tobacco at the same rates as those offered at Bay-side posts.<135> The Company toyed with the idea of creating inland houses, but Andrew Graham warned that the Indians "would never come down to the Forts (at the coast) when supplied with Brazil tobacco so nigh hand. <136> The best strategy to lure customers away from rival concerns was simply to offer more tobacco; figures for the York Factory hinterland of 1769-70 show that three-quarters of a pound of HBC "Brazil" cost Amerindian traders one beaver, while the same quantity of Pedlar tobacco cost three pelts.<137>

By the late 1770s and early 1780s the Montreal-based Northwest Company (NWCo) began absorbing most of its small business competitors. Since the new Company had consistent access to good quality "Brazil," tobacco continued its role as a primary drawing card in the rivalry with the HBC over Indian furs. Ships were despatched from Gravesend carrying carefully-selected trade goods, including the valued South American smoking substance, which was considered "one of the principal things necessary for the support of an Indian and his family."<138> Cargoes of tobacco from Lisbon were insured and then transported by the NWCo to Quebec and Montreal. <139> Between 1773 and 1775 we see the beginning of large-scale trade by the NWCo, as licenses were issued, to Blondeau, McGill, Frobisher, Ermatinger and others, for the shipping of large quantities of tobacco and other goods into the interior.<140> Competition with the HBC was so intense that the NWCo was obliged to present each native headman with three fathoms of tobacco--a gratuity intended to sway the allegiance of the leaders' constituencies. <141> HBC posts naturally responded with even more lavish gifts of tobacco and alcohol.<142>

Amerindians were delighted with the copious dispensations from both sides, and were in a position to reject even mildly faulty merchandise. In 1786 Manchester House was resigned to burning sixty pounds of water-damaged tobacco that simply could not be traded.<143> Once again the HBC tried to conceal the irregular constitution of damp leaves by mixing them with oil and molasses, but they remained unsuitable in the trade with native peoples who accepted nothing less than quintessence. <144>

Summarizing the comments of a late eighteenth-century observer, Marius Barbeau and Clifford Wilson have suggested that the well-being of the Hudson's Bay Company rested, in part, on the persistent native preference for an exotic and perishable trade good that had to travel an incredible distance of over 20,000 kilometers:

Considering the long and devious channels of trade through which the tobacco had to go before reaching its destination -- from Brazil in sailing ships to Lisbon, then to a London warehouse, to York Factory by way of the Orkneys, and finally by canoe or York boat half way across the continent -- it is not surprising that some of it arrived a little the worse for wear. William Tomison, the founder of Edmonton House, wrote from York Fort on August 31, 1790, that the Brazil just received proved so bad that it had quite discouraged him. By the time he arrived at the "upper Settlements," he was afraid it would be good for nothing. The capricious disposition of the natives was such, he said, that he would become the butt of ridicule to them and the Canadians (Nor'westers). And he added that the London board could not expect an increase of trade when the principal article of which the natives were fond was of so poor a quality. For it was out of the power of the most faithful servant to do anything with the Indians when he had only bad tobacco to offer.

The Brazil tobacco available to Tomison and the posts under his management was "mouldy and rotten inside the rolls," whereas, he alleged, the Canadians' Brazil of the same year at the disposal of the rival concerns was of the best quality. A second failure in that important commodity, he pointed out, might wholly ruin the Company's interests.<145>

The rivalry over quality tobacco continued into the nineteenth century.<146> An entry for January 30, 1805 in the Fort George Journals repeated the now hackneyed theme:

Traded about 80 MBr. in furrs, a few deer skins and some venison from the Minequogan Indians and the two homeguards, brought some venison like wise but left their furrs till they come again in the spring, their principle errand here, is for a supply of tobacco, and we unfortunately have not a pound in the house, but what is quite rotten, this report will, I fear, spread amongst the farr off Indians, and be very injurious to our spring trade. Acquainted as they all are of the superior quallity of our opponents tobacco. (Brazils) 'twil prbably induce them to lay by many of their most valuable furrs and trade with the Canadians an article of which they are great consumers, and 'tis not in our power at present to supply them with.(147)

Thirteen years later native tobacco preferences were identified, not only by quality of type, but by methods of processing or packaging. In the Edmonton House Journal, Francis Heron noted the competitive edge enjoyed by those who offered Amerindians carrot rather than roll tobacco:

Employed during the day trading with the Muddies (Missouri River Indians), who are a set of saucy fellows, and are really ill to satisfy owing to the NWCo offering them very high prices for the Beaver ... They have not as Yet got any skins from our Indians except a few for Carrot tobacco, an Article which we to our great loss have not got, and which often procures them (the NWCo) some Beaver skins... To show how partial the Slave Indians are for Carrot tobacco... I offered an Indian... 1 1/2 lb. of tobacco for each skin, but he refused it, saying that no offer I would make him would satisfy him, for a Carrot of NW Tobacco he must have. He went there and gave 5 Beaver skins for a Carrot weighing only 3 pounds. This will show the advantage the NWCo have over us with the Slave tribes by having this article, and will also show how much cheaper we could purchase Beaver Skins with Carrot tobacco, than with Roll tobacco. We make a kind of Carrot of the Roll tobacco, but the Indians despise it.<148>

After the NWCo merged with the HBC in 1821, it was thought desirable, "without giving offence or disgust to the natives," to abandon the "irregular and indiscriminate manner" in which presents were given. Under the new system, each native trader was supplied with a pint of rum and six inches of tobacco for

every five made beavers.<149>

The new coalition also decided to hire a tobacco specialist who could serve as advisor on a moderate salary. The only qualified candidatc was a notorious alcoholic named MacTavish who landed the job after it was argued that, in the remote outpost of York Factory, "he would have no opportunity of indulging in that unfortunate habit. "<150> In due course other advisors came and went and new tobacco types became fashionable among natives and the end of Euro-Canadians. By the century a Montrealmanufactured product called "Imperial Mixture" assumed prominence in the fur trade. <151> Cylindrical carrots made by the Imperial Tobacco Company were produced by wrapping up to fifteen pounds of tobacco in natural-colored cotton, tying both ends with white string and tightly winding binder twine around the entire piece for easy transport into the wilderness.<152>

# B) FRENCH DISPENSATIONS OF TOBACCO TO AMERINDIANS

## background

For over two centuries tobacco criss-crossed the Atlantic,<153> being produced in one area of the New World to be shipped to Europe, often to be shipped back to another part of the Americas, where addicted colonists could barely do without. The French settlers, whose passion for the weed left many shirtless, indirectly helped in the economic success of New

France (including the West Indies and Louisiana), and even Spanish, Portuguese, English, and Dutch colonial possessions in the Americas.

Although the **habitants**, **coureurs de bois** and **voyageurs** comprised a sub-set of the vast French nicotian market (into which a significant proportion of the world's tobacco production was funnelled), the small European population of New France, as a whole, did not consume as much leaf as did the tens of thousands of Amerindians who employed enormous quantities of tobacco in a variety of ways, aside from the usual recreational smoking.<154> It must be understood that, despite the decimation of native populations in the Proto-historic and Historic periods, the importance of New France as a market for colonial tobacco hinged on the trade with Amerindians more than on the addiction of Europeans.

In 1627 only 107 Europeans lived in New France. Even if we added the 2,000 in Virginia, 310 in New England, 100 in Newfoundland and 200 in New Netherland, <155> the combined total is greatly exceeded by the number of tobacco-consuming native peoples contacted by the newcomers in eastern North America. <156> The 3,035 Frenchmen in 1663 were still outnumbered by Amerindian smokers, while the highly addicted English and Dutch (who by now numbered 90,000) were themselves beginning to constitute a modest market for **Nicotiana** products.<157> By 1700 Virginia and Maryland alone had 100,000 people, <158> the vast majority of whom smoked incessantly. By contrast, New France had only 15,000 inhabitants.<159> Yet, while the tobacco colonies engaged in very little trade with their immediate Amerindian neighbors, the French were now in contact with native tobacco-users in the Great Lakes basin, river routes west to Lake Winnipeg, and the Mississippi Valley to the Gulf of Mexico.<160> The loss of smokers to epidemics, warfare and changes in allegiance, was offset by the opening of new markets stimulated by the expansion of French trading influence. The potential Amerindian market for tobacco was still, and would be for some time to come, greater than the French Canadian demand. Small wonder that officials in Martinique and Guadeloupe had seriously considered re-aligning the economy of the Islands to produce the tobacco valued by Amerindians of North America.<161>

As was noted in Chapter Three, the French explorers and colonists, like their English neighbours to the south,<162> initially received token quantities of tobacco from native peoples.<163> Europeans were already carrying their own tobacco (for personal and medical use) into the wilderness in the early seventeenth century, and Nicotiana species may often have been involved in the relatively informal reciprocity that was characteristic of initial culture contact throughout the colonial era. De La Vérendrye's first encounter with the Mandan in 1738, might be a suitable analog for the earlier period; in this instance a chief presented the explorer with:

some Indian corn in the ear and with a roll of their tobacco, which is not good as they do not know how to prepare it as we do. It is a good deal like ours, with this difference, that they do not plant it, and that they cut it green, using the stalks and leaves together. I gave him some of mine which he found very good.<164>

While native peoples throughout the continent were impressed with the quality (and quantity) of the European product,<165> the French immediately recognized the transactional value of the plant in the lucrative fur trade.<166> The success of a tobacco-for-peltry barter may have prompted similar transactions in the Old World. In a work published by Pierre Martin de la Martinière (Voyage des Pais Septentrionaux, Paris, 1671),<167> we learn that Frenchmen were even exchanging their tobacco for furs with Laplanders.<168> Nicotian products had earned an esteemed place in the commercial contact of peoples all over the world.

### "Brazil" tobacco

In our discussion of the English dispensation of tobacco, we adverted to the Amerindian interest in a particular leaf grown by the Portuguese in South America.<169> The ethnohistoric literature of New France parallels that of the English in its emphasis on the native obsession with "Brazil" tobacco.<170> Why this type, as opposed to any other, should have been such an extraordinary success in the fur trade, has never been adequately explained, though we have tried to account for the general native acceptance of foreign tobaccos offered by the newcomers.<171>

Cross-cultural research suggests that it had little to do with some peculiarity of the Amerindian palate; the type appears to have been preferred by non-Europeans in many parts of the world. In his 1721 description of the coast of Guinea, Bosman for example, noted that, despite the availability of a home-grown variety:

those who live amongst us, and daily converse with the Europeans, have Portuguese, or rather Brasil Tobacco; which, tho' a little better, yet stinks to a great degree. Both Male and Female of the Negroes, are so very fond of this Tobacco, that they will part with the very last Penny which should buy them Bread, and suffer Hunger rather than be without it; which so enhances the Price, that for a Portugueze Fathom, which is much less than one Pound of this Trash, they will give five Shillings or a Gold Quarter of a Jacobus.  $\langle 172 \rangle$ 

The Ashanti of Ghana also had a choice of various European and domestic tobaccos but, as reported by Bowdich in 1819, opted for the type grown in the valley of the Amazon:

A serious disadvantage opposed to the English trade, is that the Ashantees will purchase no tobacco but the Portuguese, and that eagerly even at 2 oz. of gold the roll. Of this (the Portuguese and Spanish slave ships regularly calling at Elmina), the Dutch Governor -General is enabled to obtain frequent supplies, in exchange for canoes, two of which, though they cost him comparatively nothing, fetch 32 rolls of tobacco; and the General has sometime received 80 oz. of gold a day from the Ashantees for tobacco only. If they cannot have this tobacco, they will content themselves with that grown in the interior, of which I have brought a sample.  $\langle 173 \rangle$ 

It is of course, quite conceivable that the "Brazil" type was a variety of Nicotiana tabacum with an unusually high alkaloid content.<174> Brazilian species are still employed by South American Indians for the production and enhancement of altered states of consciousness,<175> and it is possible that Amerindians of North America, as well as some African peoples, valued these types for similar reasons. It must be stressed, however, that chemical constituents merely set the physiological stage for cultural suggestibility. Of prime importance is the native belief that the plant or smoke contains an inherent spiritual power.<176>

Another factor contributing to the Amerindian preference for "Brazil" tobacco, may have been the precedent set by the French. While the English never adopted the Portuguese colonial product, and only introduced it in 1685 to help nullify a French advantage in the fur trade, <177> the French had begun purchasing "Brazil" tobacco for their own use at least eighty years earlier (see Plate 5.3).<178> It must be recalled the the French were, by 1606, already importing at considerable cost the South American type into Acadia.<179> By the 1620s vessels routinely arrived at Tadoussac loaded with cargoes of tobacco and other trade goods destined for the Montagnais and natives of the Maritimes. <180> Both Trigger and Wiener assume (with good reason) that this tobacco must have originated in Brazil, <181> although we cannot rule out the possibility of a French domestic, Spanish, English, Dutch or (after 1626) West Indies source. <182>

The revolt of Portugal against Spanish suzerainty in 1640 helped Brazilian tobacco gain popularity in France--a country then at war with Spain and not interested in the latter's colonial offerings.<183> The mid-seventeenth century was a period when many native peoples of North America were exposed to direct and sustained European contact for the first time. It is possible that native tobacco preferences were orchestrated by the product the French happened to have at the time. Once established, a taste inclination is often exceedingly difficult to modify. By the 1660s the ports of Northern France received virtually all the varieties of tobacco known in world trade, <184> yet Amerindians continued to insist on the Portuguese colonial product.

## Nicotiana for Castor

> The native predilection for "Brazil" tobacco reduced French profits as much as it cost the English. Just as it would have been cheaper for the HBC to purchase and distribute the Virginia leaf, the French would have been much happier distributing their own colonial product from the West Indies or even Canada. After all, Colbert's tarif général of 1664 imposed a duty on the Brazilian import that was more than three times higher than the duty on tobacco coming directly from the French West Indies. <185> Moreover, while ships bound from France to Canada generally paid no custom for their cargo, the office of the Farmers-General demanded, by way of entry, a duty on "Brazil" tobacco of five sols a pound, or 100 livres per roll of 400 pound weight. <186> This was not all: the leaf still had to make it from the wholesale to the retail level. The late seventeenth-century observer, Baron Lahontan, complained that:

There's no difference between the Pyrates that scower the Seas, and the **Canada** Merchants... 'Tis an unquestion'd truth, that they get fifty **per Cent** upon all the Goods they deal in, whether they buy 'em up upon the arrival of the ships at **Quebec**, or have 'em from **France** by way of Commission; but over and above that, there are some little gaudy Trinkets, such as... Tobacco-Boxes... upon which they get a hundred and fifty **per Cent**, all Costs clear... **Brazil** tobacco is worth 40 Sous a pound by way of Retail, and 35 by Wholesale.<187>

A pound of domestic "méchant tabac du pays" was meanwhile valued at five sols.<188> In the early seventeenth century Lescarbot had noted, with some astonishment, that South American tobacco "costs sometimes a crown a pound" by the time it reached Acadia.<189> This turned out to have been a reasonable price when compared to the "Brazil" tobacco traded in 1723 by André Pénicaut to the Sioux, which sold at the rate of 100 crowns for eight pounds.<190>

The search for a cheaper trade good may have been at the heart of efforts to re-align production in the French West Indies towards processing the leaf "in the Brazilian fashion."<191> Even if this scheme had been a major success at source, it is doubtful that Amerindians would have unequivocally accepted the imposture, just as they were not fooled by English (HBC) attempts to repackage rolls and pass them off as carrot tobacco.<192>

Despite the inflated cost, "Brazil" continued to be exchanged for furs at rates deemed profitable by the French.<193> During the journey of Dollier and Galinée in 1669-1670, it was observed that, among the Ojibways near Sault Sainte Marie, the:

fish is so cheap that they give ten or twelve of them for four fingers of tobacco ...one gets a beaver robe for a fathom of tobacco ...this is the reason why the French go there, notwithstanding the frightful difficulties that are encountered.<194> In Marquette's journal of 1675 the missionary commented on the value of European Nicotiana in the cheap procurement of furs:

I do not think that I have ever seen any savage more eager for French tobacco than they. They came and threw beaver skins at our feet, to get some pieces of it... They traded us three fine robes of ox-skins for a cubit of tobacco...<

In a 1684 "Memoir touching the expenses incurred by Sieur de La Salle at Fort Frontenac," it was carefully calculated that an investment of 400 pounds of tobacco would, when traded to Amerindians, lead to a profit of over 2,000 livres.<196> Obviously, the initial cost of tobacco was easily recovered in transactions with natives.

More importantly perhaps, the French were obliged to offer Amerindians a steady supply of South American tobacco in order to compete with the English who, after 1685, began flooding the fur trade with the "Brazil" variety. Prior to this date the French had effectively circumvented the liability of transporting goods on an overland route by carrying the prized South American tobacco to native clients.<197> Attention has already been called to the central role of "Brazil" tobacco in the colonial struggle for control of furs in southern Rupert's Land. <198> Since native peoples were in a position to reject any inferior nicotian substitutes, the French had no alternative but to continue the scramble to procure an exotic trade good originating 20,000 kilometers away. <199> The French had responded to the HBC threat, both by establishing their own Compagnie de la Baie du by efforts to create an overland route from Nord, and Montreal. (200> An on-going Anglo-French rivalry was in the best

interest of Amerindians, who were thus assured of a continuing supply of a cherished commodity. As the fur trade became inextricably bound to the world tobacco market, native peoples of North America indirectly contributed to the prosperity of Portuguese possessions in the New World, the Atlantic mercantile fleet and wholesalers in Lisbon, London, northern France and Quebec. Unlike other commodities used in the fur trade,<201> tobacco did not stimulate the economic life of manufacturers in France or England.

#### gratuities and bribes to the natives

A review of the English ethnohistoric literature made it apparent that tobacco was not only distributed to Amerindians during barter for furs. The French also recognized that the transactional value of tobacco in native symbolism went well beyond the mere exchange of material culture. Although Nicotiana products figured prominently in trade, <202> their dispensation also functioned as demonstrations of politeness <203> and thus, large quantities were given away as gifts to native peoples. <204> In his Description Geographique... (Paris, 1672) <205> Nicolas Denys reported on the practice in Acadia where:

there is given the Indians every time they come to the establishments a drink of brandy, a bit of bread and of tobacco as they enter, however many they may be, both men and women. As for the children they are given only bread. They are again given as much when they go away. $\langle 206 \rangle$ 

Throughout the seventeenth century great explorers, such as

Radisson (who served both French and English), La Salle (who claimed Louisiana for France) and the Franciscan Louis Hennepin, made presents of tobacco wherever they travelled.<207> The latter noted (in his A New Discovery of a Vast Country in America, London, 1698)<208> that, on numerous occasions during his 1679-80 travels, he and La Salle distributed "Martinico" tobacco to Amerindians of the Great Lakes and upper Mississippi drainage.<209> This suggests that, in the absence of English competition (and Amerind expectations), the French were able to realize their goals with the cheaper West Indies product. Hostile natives were thus pacified with "armfuls" of the leaf, over which they "almost killed themselves."<210>

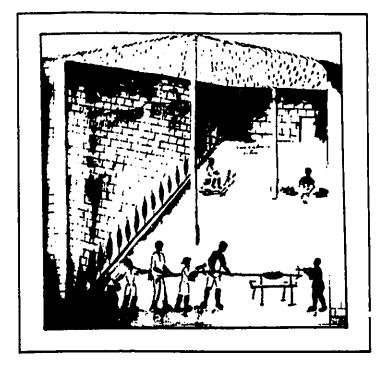
The French Court supplied Commandants in North America with funds necessary to purchase large quantities of "presents" for Le bon sauvage. Father Etienne de Carheil noted in 1702 that (at Michilimackinac) "the gifts are reduced almost entirely to the single expenditure of tobacco--which is the most usual present, because the savages are passionately fond of it, and cannot refrain from continually smoking, so greatly accustomed are they to it from their youth."<211> Also not to be forgotten is the myriad of minor services (such as carrying baggage, transporting canoes, erecting shelters, obtaining water, tutoring language or performing dances), which were paid for by using tobacco as a kind of informal currency.<212>

As was the case with the English, the French presence in the Northeast was characterized by ideologically-motivated tobacco

dispensations. Efforts to encourage Christian piety,<213> or to win (or maintain) allegiance to the Crown<214> through gifts of the leaf and other goods, were common. To encourage adherence to French interests, tobacco was often slipped in with the supplies of guns, powder and lead handed over to faithful native allies. Take, for example, La Vérendrye's actions among the Cree in the year 1733:

The Monsoni... asked me for powder, ball and tobacco that they might go against the Mascoutens Pouanes... I got all the chiefs together and gave them a collar in the name of our Father who forbade them to make war on his children the Saulteurs; and I said to them that, if they were obedient to his word, I would give them everything they asked ... I was... obliged to give them bullets, guns, butcher's all they asked, powder, daggers, gunflints, awls, tobacco etc., of knives, which I have kept a list ... I gave them some tobacco, and expressed the joy I felt that they had not fired on the 100 men... A Monsoni, having discovered... twenty Saulteur and Sioux who were seeking to make an attack, came and notified me, complaining that these two tribes were always seeking to kill them, and that I was holding them (the Monsoni) back; whereupon I sent word to all the neighbouring savages to be on the watch and gave them a supply of powder, ball and tobacco.<215>

Six years later the French sent an expedition from Montreal and Michilimackinac Mississippi against down the Valley the Stone and Chaput note that "the all-prevading French Chickasaw. paternalism even cared for those not going on the expedition. For example, the French provided corn, tobacco, and powder and ball to Nipissing families whose men were away with the war party."<216> In the 1750s Jean-Bernard Bossu attempted to convince an Alabama chief not to shed the blood of Spanish allies and presented him a roll of tobacco "to strengthen the effect of my words. <217>



Watercolor illustration of Casa Da Fabrica Da Tabaco (1792). These Brazilian tobacco factories prepared the famous "Brazil" product valued by North American Indians throughout the Historic Period. New France imported this leaf as early as 1606; the Hudson's Bay Company was forced to do the same in 1685 when is was recognized that native peoples preferred to trade only with those Europeans who offered stocks of this specific commodity. Although the English and the French had their own nicotian resources in colonial North America, they were obliged to obtain this perishable trade good which often traveled distances of more than 20,000 kilometers.

exchanged for goods, services, Whether tobacco was friendship or allegiance, it is without doubt that the combined . Amerindian total distributions had an impact on the To promote an awareness of the pipe/tobacco/smoking complex. scope of French dispensations, a sample of references from several hundred ethnohistoric accounts (covering the 150 years of colonial New France) has again been selected and summarized chronologically in Table 5.2. When recognizing that this summary, even when combined with the English version (Table 5.1), likely represents only a fraction of the total quantity of foreign tobacco entering the Amerindian socio-cultural milieu, one is left with the distinct impression that the ubiquitous human use of Nicotiana species could not possibly have waned in post-contact, native North America.

## C) DUTCH DISPENSATIONS OF TOBACCO TO AMERINDIANS

### Nicotiana for Castor

In discussing the precedents set by the English in the early seventeenth-century transculturation of tobacco, it was noted that Henry Hudson received significant quantities of Nicotiana rustica during his frequent contacts with Amerindians along the river that bears his name.<218> When the Halve Maen sailed in 1609, it bore the flag of the Dutch East India Company and thus, Hudson's third voyage was to establish Holland's claim on New Netherland. <219> In the period between Hudson's celebrated voyage and the founding of the new colony (i.e., 1609-24) Dutch vessels frequently traveled up the Hudson Valley to trade with the Delaware, Mahicans and possibly Mohawks. <220> Since these fifteen years coincide with the emergence of Holland as the largest tobacco dealer in Europe, <221> it is fair to assume that this period saw a shift from the Dutch bartering tobacco from Amerindians, to the newcomers trading tobacco to native peoples. It is unlikely that the memorable occasion, when the two tobacco complexes formed the nexus of transculturation, will ever be dated. Given the high interest in, and demand for, the leaf on both sides, it is possible that, on at least one occasion, there was a direct reciprocal exchange of native and European tobaccos -- a theoretical possibility inconceivable with any other seventeenth-century commodity.<222>

Once New Netherlands was established, the Dutch had even greater access to nicotian resources because of their involvement in the trans-Atlantic traffic in Virginia tobacco. The role of the Dutch colony as an entrepôt for English colonial products was important, to be sure; yet the Dutch were also preoccupied with the fur trade -- some say to an excess that helped undermine the strength and stability of the colony.<223> The complementarity of furs and tobacco characterized much of the Dutch and English presence in seventeenth-century North America. Both commodities had lured traders in the first decade and both continued to make up much of the cargoes returning from New Netherland in mid-century.<224> While peltry continued to come from Amerindians, tobacco now came from European plantations. Some a hand in both. Kiliaen van Rensselaer was not only the had patroon of Rensselaerswyck, but was also a private merchant dealing in furs and tobacco.<225> Profits poured in, for, in New Netherland, a good-quality beaver pelt was worth roughly 8 florins and a hogshead of Virginia tobacco was worth as much as florins -- more than enough to pay for shipping and 114 handling.<226> The Dutch often spoke of tobacco and furs in the same breath, and one might expect that the availability of the former may have entered into the trade for the latter. After all, New Amsterdam had large stockpiles of a trade good which, although destined for European markets, was also much desired by Amerindian fur traders.

By 1628 the Mohawks had expelled the Mahicans who, up to that point, had controlled the area surrounding Fort Orange. Thus commenced the long-standing Dutch-Iroquois trading alliance that served as a counterpoint to the French association with the Hurons, Algonkins and Montagnais.<227> The Dutch equivalent of the **coureur de bois** was the **bosloper**, but unlike his French Canadian competitor (who often lived and traded with native peoples in their own territories), he seldom ventured further than Schenectady and usually lived at Fort Orange.<228> His trade goods are often assumed to have been shell beads,<229> liquor,<230> cloth, copper kettles, iron hatchets<231> and (after 1639) guns and ammunition.<232> Rarely do anthropologists or ethnohistorians mention tobacco or pipes, although these most certainly must have been common items in the standard inventory

of trade goods.

Because of their extraordinary preoccupation with tobacco, the seventeenth-century Dutch are well known in the annals of world colonial history for their notorious use of the leaf in achieving imperialist goals. Not only did they join the Portuguese in spreading the smoking habit around the globe, but they then succeeded in exploiting the physical addiction of aboriginal peoples by employing **Nicotiana** as a lever in trading relationships. For example, by the time Jan van Riebeck founded Cape Town, South Africa in 1652, native men, women and children had become so enthused with the new plant that he exclaimed:

If we had no tobacco there would hardly be any trade, as a whole cow would often be withheld for a finger's length of tobacco or a pipe. We should therefore be provided with 1,000 lbs. annually, which should moreover be of good quality, for if there is the least rot in the tobacco, they can taste it immediately and will not look at it, calling it stinking tobacco.<233>

In addition to obtaining cattle, land, prostitutes and even slaves,<234> tobacco was used to purchase cheap labor. "A Hottentot, who is in want of tobacco, and has no other means to procure it," wrote Peter Kolb, "will perform a hard day's work for half an ounce."<235>

It is simply inconceivable that the easy access to the plant by Dutch traders, coupled with a native demand for the leaf, did not lead to the use of tobacco as a trade good in Dutch-Iroquois interactions in New Netherland, while simultaneously purchasing aboriginal goods and services in far-off South Africa. Indeed, we do find allusions to such a trade in the ethnohistoric literature of New Netherland. The price of a Dutch "purchase" of nearly 300 square miles of Amerindian land in 1639, for example, included (among other goods) rolls of tobacco, dozens of pipes and a considerable number of tobacco boxes.<236> We also find references to the use of tobacco in the fur trade at Fort Orange,<237> and even to an exchange of tobacco for fish during the second Esopus War.<238>

It remains unclear whether the type or quality of tobacco offered native peoples played a role in the competition between New Netherland and her European neighbors, as it certainly did between the French and the HBC a few decades later.<239> An Anglo/Dutch rivalry did erupt on the New England frontier when the English began skimming off the furs in the Connecticut Valley which normally would have been traded at Fort Orange.<240> Since the Dutch colonial tobacco was much like the English product, and most of the stock came from Virginia in the first place, it is doubtful that, in this case, tobacco made much of a difference in Amerindian trade preferences.

Until Stuyvesant seized New Sweden in 1655 the Dutch felt threatened by the persistent irritant on the Delaware. In 1639, for example, Dutch losses from Swedish competition were calculated at 30,000 guilders.<241> The Swedes traded with the Susquehannocks who benefited from a triadic competition between New Sweden, New Netherlands and New England.<242> Since the New Sweden Company shipped at least as much tobacco as peltries<243> it is probable that traders from this colony joined the English and Dutch in redirecting some tobacco into the fur trade. It is unlikely that the **type** of tobacco offered by the Swedes made much difference in the barter with native peoples, since the nicotian products offered by all the Eurocolonial interests in Susquehannock territory (during this period) were virtually indistinguishable.

The Dutch had to contend with a third frontier as well. Despite almost constant belligerence with the French, some Iroquois groups (who were a major source of furs in the Fort Orange trade) threatened to send peltries north where, they alleged, the French were offering higher prices.<244> It is possible that these Iroquois sought alternative trading partners not only so they could secure the same quantity of goods they needed with less effort (as Trigger suggests<245>), but because they sought particular types or qualities of trade commodities. It must be observed, however, that Iroquois behavior was also controlled by a complexity of socio-political alliances in which trade was not a primary concern.

Whether a qualitative difference in Dutch and French tobaccos played a part here can only be conjectured, although it is known that the French had access to the highly prized South American variety.<246> There is an intriguing possibility that the Dutch could have countered such a threat with their own supply of South American Nicotiana. A 1644 report recommended that patroons and colonists resident in New Netherland be allowed to import tobacco and other produce from Brazil,<247> suggesting

the existence of a market among themselves, their countrymen in Holland or, plausibly, Amerindian traders. It is not known what became of this scheme, although the opportunity would have been greatly reduced after the staggering loss of New Holland (Brazil) to the Portuguese in 1654.<248>

Rumors of a possible French threat to the Dutch trade were taken seriously in New Netherland, and in December of 1634, a delegation that included Harmen Meyndersten van den Bogaert and Jeronimus dela Croix was dispatched into the heart of Mohawk and Oneida country to investigate the matter and promote the advantages of continued interaction with the Dutch. <249> A journal presumably written by van den Bogaert, records that his companion dela Croix wrote a letter on December 14 asking for salt and "tobacco for the savages. <250> Α paper, recently-discovered note alleged to have been the one written by dela Croix makes reference to this request and adds that "the Indians like our tobacco and ask for it constantly."<251> Although Gehring and Starna have demonstrated that this document is a forgery, <252> the original journal acknowledges that dela Croix's communication reached colonial officials, and "tobacco for the savages" was included in the reply package received five days later.<253> Van den Bogaert and his countrymen may have been led to this belated requisition after their original samples were rapidly depleted by copious dispensations to the Iroquois, who undoubtedly would have taken advantage of Dutch efforts to emphasize the superiority of trade with New Netherland.

What is almost certain in this case, is that the Iroquois were more interested in some subjective quality of European colonial tobacco, rather than the prospect of securing their minimum nicotian requirement with the least effort. The day before the Dutch delegation received the relief package containing colonial tobacco for the Iroquois, three Oneida women tried to sell "a good quantity" of surplus, native "green tobacco."<254> There was no tobacco-famine in Iroquoia, late in 1634.

#### gratuities to the natives

Finally, it should be noted that the Dutch also followed the English and French practice of distributing tobacco in contexts not directly linked to the reciprocity of the fur trade. Like other colonial powers, the Dutch used token presents to sway allegiance or elicit military intelligence.<255> The frequent councils at Albany after 1664 did have precedents in Stuyvesant's Fort Orange.<256> The symbolic role of tobacco on such occasions is illustrated in the message of a Seneca chief to Dutc. officials at the Fort in 1660:

It is now some years past since they were at Manhattans and brought presents there, without having received any return for it, not even a pipeful of tobacco... We have requested that the Dutch would not beat us any more... This you must now forbid the Dutch, in order that we may smoke tobacco in peace. If you now buy two beavers' worth of tobacco, you can smoke and think over everything...<257>

The Dutch response is equally revealing:

First, it is true that our brothers two or three years ago were at Manhattan and made a treaty of friendship

with us, which we shall always maintain, as we have done so far and always will, and as the tobacco was forgotten at that time, we give them now a roll of tobacco, in order that when they return to their country they may remember their friendship and keep it as firmly as if it were bound with a chain.<258>

#### D) CONSPECTUS

The surpluses of nicotian products generated by numerous tobacco colonies, not only fueled a European addiction, but provided a convenient trade good desired by tobacco-esurient Amerindians. The weed was not only in the pipes but also the back-packs of many Eurocolonials who penetrated into the interior of the continent. Convinced by both the best European physicians and Amerindian shamans that Nicotiana was an essential sustenance, the irrevocably habituated explorers and traders carried personal stocks of the cheap and readily-available Virginia leaf as, among other things, a prophylactic against diseases encountered in crowded native villages. It was a logical step to transfer some of the precious commodity from the personal pouch to the bale of trade goods. At first, the natives had been the providers, and occasionally they still were. Yet, for nearly three centuries it was the newcomers who, with their prodigious infrastructural support, distributed enormous amounts of tobacco to Amerindian peoples, in return for safe passage, to pay for a variety of minor services or as barter for land, food and furs.

Ironically (and with a measure of poetic justice, some might assert), the plant on which the success of English colonization had originally depended was eventually rejected by most Amerindians and deemed unsuitable in any, but the most desperate, transactions. By the end of the seventeenth century, competition in the fur trade had rendered the cheap Virginia leaf totally impotent in dealings with native peoples, and the English were forced to obtain foreign tobacco at three to five times the cost. The Hudson's Bay Company was sent scurrying on a 20,000 kilometer voyage to procure a South American product or the fur deal was off. It has become apparent that native peoples had a definite prerogative in control over the type or quality of at least this What is even more impressive trade good. is that this prerogative was a pivotal factor in intersocietal commerce, not for a period of decades, but for centuries. Again and again we read of the great lengths traders went to in obtaining a relatively perishable commodity, and of the profound fear that spoilages or shortages might prove ruinous to HBC interests. The French (and possibly the Dutch) were also forced to import into the regions of their North American possessions an expensive foreign trade good originating at the beginning of a remarkably circuitous shipping route--and this despite the existence of a cheap and readily-available tobacco growing in their own colonial back-yards.

Remarkably, the English, French, Dutch and Swedish traders distributed tobacco to native peoples who themselves often had surpluses of their own indigenous product (which, on occasion,

they even offered the Europeans). Clearly, we must account for considerations beyond the myopic economic superstructural reductionism that views this intersocietal commerce solely as a function of market forces prompting individuals to secure either a maximum number of goods or a minimum requirement with the least Unless we recognize that there must have been an effort. emically-generated taxonomy that distinguished the respective tobaccos of natives and newcomers, we are left with the same initial quandary that prompted John C. Ewers to remark that White traders furnishing tobacco to Indians, who had been smokers from prehistoric times, "might seem like carrying coals to Newcastle. "<259>

Originally, the acceptance of European tobacco may have had something to do with its place in the native folk taxonomy. It is possible that the foreign product was desirable not merely because it was particularly "good" or palatable but precisely Since the ingestion of because it came from the strangers. tobacco was believed to bring spiritual power to the smoker, procuring exotic nicotian products may initially have been perceived as tantamount to acquiring an emically-defined potency possessed by the intruders. As a sub-group, the Brazil variety may have been classed as the most "powerful" of the "foreign" taxon--a symbolic interpretation that might be etically expressed by either a quantitative or qualitative difference in alkaloid content. An analogous case of such a taxonomy comes from the Samburu area of Kenya where, despite the availability of a cheap local tobacco, a product brought in by Whites (grown in the highlands) is perceived as "tougher" and is more highly valued by indigenous smokers.<260>

In some cases (particularly in the far north) Europeans introduced smoking substances to native peoples who had never smoked. In other cases Amerindians had previously received tobacco through trade with their native neighbors. Then there were those, such as most Iroquoians and some Algonquians, who had propagated the leaf for centuries. In all instances the role of tobacco in interactions with Europeans must be seen as more than that of merely a trade good.

Axtell writes of the "voice-and-ear world" of Amerindian life which, in the absence of alphabetic writing and print, "revolved around the spoken word." <261> Yet we are struck more by the lengthy silence that invariably preceded orations, where gifts were presented and pipes were smoked.<262> Ray and Freeman observe that the subject of native speeches in the eighteenth-century subarctic trade "centered on the rates of exchange and the quality of goods."<263> But, from a native perspective, was this the only form of communication? In his study Wilderness Politics and Indian Gifts, Wilbur Jacobs alluded to the importance of other messages:

Among the Iroquois, Algonquian, Muskhogean, and other linguistic families living along the Eastern seaboard, presents connoted "words." In the metaphorical language of the forest, each gift might signify a wish or a greeting. Several gifts might denote a special emphasis of one kind or another. For example, one gift might offer a prayer that the price of trading goods be reduced. Another might figuratively "light" a warm council fire; still a third might signify that all could speak freely. The Jesuit fathers observed that presents spoke more clearly than the lips. From these illustrations, it is evident that the ambassador of the forest had to be well-stocked with suitable presents before he could make his wishes known in a public meeting.<264>

Ritual smoking and passing of the pipe were in a semiotic domain somewhere between oral speech and mnemonic devices such as wampum belts, condolence caues and medicine sticks. This domain undoubtedly incorporated tobacco, particularly when it was distributed not for furs but as an incentive to change or maintain allegiance, as proof of pacific intentions or as a symbol in forest diplomacy. Clearly, tobacco was more than fuel for a habit, a trade good or a gratis gambit for an inevitable economic gain. It was part of the complex significations cluster that made up the non-verbal component in the semiotics of culture contact.

To what extent may this conclusion be applied to intersocietal commerce? Dispensation of massive quantities of Nicotiana products to Amerindians over a period of several hundred years, involved а continental reticulation of transactional arrangements that locked virtually every native group into the global tobacco marketplace. The competitive market forces of the northern fur trade brought to the fore those aspects of Amerindian bartering propensities which most closely resembled European capitalist economies. Yet, the fact that Europeans were often obliged to follow traditional native trading practices in which an exchange of goods was contingent on the preliminary calumet ceremony and presentation of nicotian gifts, suggests that the trade should not be reduced to simple economic variables governing supply and demand. More importantly, European trade goods were often given meaning relative to native symbolism rather than European pragmatism. This has recently been illustrated by George Hammell, who suggests that European glass beads were sought by native peoples because they resembled symbolically-charged the quartz crystals valued in prehistory.<265>

Gilman writes that the fur trade has been traditionally described as a model for later extractive industries, as a mechanism of acculturation or as an example of intercultural economics.<266> Though it was all of these, she argues that the trade was also about communication, and that "trade goods were the alphabet letters of the language that broke the barriers between Europe and America."<267> We must recall Montesquieu's oft-quoted adage: "the history of commerce is the history of the intercommunication of peoples."<268>

There were many alphabet letters in the unspoken language of objects used in culture contact, but tobacco differed from these in several important respects, and it would be unwise to lump it (as some researchers do(269)) together with brandy and other so-called "luxury" trade goods. First, it had already played a prominent role in the semiotic domain of prehistoric interactions as between humans between various groups, as well and preternatural potencies. Its integration into new

Euro-Amerindian trading complexes did not, therefore, result in quite the same acculturative upheavals documented for other trade goods. As in the case of glass beads, there had already been a prehistoric symbolic context.

Secondly, tobacco and smoking were part of a semiotic domain that lay outside of (or perhaps over and above) the contexts directly linked to the reciprocity of the fur trade in the historic period. The newcomers of every colonial nationality took advantage of the deeply-rooted set of meanings that made **Nicotiana** a potent force in the non-verbal transmission of messages.

Thirdly, tobacco had, by the late-sixteenth century, undergone a remarkable transculturation as its use conquered Europe, and from there circumnavigated the globe. Once in the New World, settlers of all ages and social classes participated in a syncretic (Euro-Amerindian) smoking complex modified to suit the conditions of the frontier. Thus, when native and newcomer came together they were, on one level, able to share a common language and humanity. Few trade goods had the power to cross cultural boundaries and express so much without words.

The picture that emerges cannot be slipped neatly into either of the models espoused by traditional foes in economic theory--the formalists and the substantivists. It will be recalled that the former advocate a kind of uniformitarianism in which nomothetic market forces seen in contemporary capitalist economies are applicable to exchanges among all peoples at all times, while the latter pay lip service to a more relativist position in which precapitalist economic activity is embedded in specific political and social structures having little to do with individual motives.<270> On the one hand, the transactional role of tobacco in culture contact would appear to have been related to market forces and a sense of economic gain shared by both natives and newcomers. This was particularly true in cases where Amerindians traded with whoever was able to supply a desired product, regardless of their relationship to them. At other times transactions involving tobacco were clearly part of the socio-political efforts to reaffirm treaties, alliances and In many cases the most apt description for an friendships. interaction is "trade"--a term that often conjures up the image of an impersonal "economic" exchange of utilitarian objects. In other instances the nomenclature shifts from the business-like "trade" to the friendly "present." After Marcel Mauss published his remarkable essay on **The Gift,<271>** it was clear to many anthropologists that gift-giving in non-western societies was not merely the transfer of ownership of objects but was a symbol of the relationship between giver and receiver. As Evans-Pritchard later observed, it became important to recognize the distinction between "a rational economic system" and "a system in which exchange of goods was not a mechanical but a moral transaction, bringing about and maintaining human, personal, relationships between individuals and groups. "<272>

In the examples given, the two sets of motivations were to

some extent a function of regional differences in the rasion d'être of culture contact: in the north, trade with Cree and Assiniboine middlemen was not so much contingent on political alliances, while on the New York frontier tobacco was given and received primarily as an affirmation of allegiance. This issue may not, however, be dispensed with merely through contrasting the contexts of extreme examples, for there are far too many cases in which peace and trade, or relationship and economy, were one and the same. Moreover, the presence of bartering activities in the absence of lasting socio-political alliances does not warrant the conclusion that such transactions were solely of an impersonal "economic" nature. In point of fact, token gifts of tobacco were often distributed prior to trade as ad hoc assurances of immediate good-will. One must concur with Trigger that the "current distinction between a formalist and a substantivist approach obfuscates rather than clarifies an understanding of native behaviour; "<273> or, as Braudel said in a sudden flash of lucidity, "it is too easy to call one form of exchange economic and another social "when, in reality, "all types are both economic and social. "<274>

The same reasons that made tobacco different from other alphabet letters in the language of culture contact made it coevally a commodity subject to market forces and a powerful symbol of transculturation. It must be recognized that Nicotiana was in most cases inherently both, no matter what the motivations of distributors, middlemen or consumers. This was appreciated by those experienced in Euro-Amerindian intercourse and employed to good advantage by brilliant tacticians on all sides.

The simultaneous roles played by Nicotiana in culture contact remind one of Victor Turner's notion of multivocality in which a dominant symbol is said to have several sets of significations at the same time. <275> Native peoples believed that tobacco satisfied both the guardian spirit and the human body in which it resided. "Feeding the spirit's pipe" was necessary to maintain good relations with the supernatural potencies and, since this was an exceedingly important goal in daily life, tobacco became a symbol in Amerindian master ideology. The multivocality of this dominant symbol was further expressed in the act of feeding someone else's body and soul, which carried with it non-verbal messages about the relationship between individuals. European traders were obliged to share in this ideology everytime they smoked the ceremonial pipe and gave or received presents of tobacco. In doing so they became a little less European and a little more Amerindian.

One cannot even estimate the total quantity of tobacco changing hands in North America, <276> but must assume that it was as much as most other goods since it invariably had a prominent place among the quantities of brandy, metal, arms, blankets and cloth used in the fur trade. <277> Throughout much of the eighteenth century, for example, tobacco was second only to arms in its value in made beaver traded at York Factory. <278> The annual HBC and NWCo requisitions of "Brazil" are best measured by the ton--formidable amounts, exceeding the total annual Virginia production in the first three or four years of cultivation.<279> Even if all of Ermatinger's canoe load of 5,500 pounds<280> ultimately did not reach native tobacco pouches, one can be relatively certain there was a haze of smoke over many Amerindian settlements in the winter of 1775. It is inconceivable that the influx of foreign tobacco had no effect, either in continuing or modifying, the pipe/tobacco/smoking complex of native groups in the Northeast and, indeed, Amerindian peoples throughout much of the continent. The modifications that did occur made native peoples a little less Amerindian and a little more European.

The novelist J.M. Barrie quipped, that when the Elizabethan commoner put a pipe in his mouth, he became a philosopher.<281> Later, in the time of James I and his successors, explorers, traders and natives of North America put pipes in their mouths and became forest diplomats. Transculturation created a third cultural domain and within it Euro-Amerindian а new pipe/tobacco/smoking complex was born. This complex may have retained enough of its prehistoric native heritage to form a continuity into the ethnographic present of the twentieth century. Indeed, if the history of tobacco in North American culture contact appears repetitive, it is precisely because the role of this smoking substance was so remarkably consistent through time and space. The consistency of its multivocal symbolism made it a powerful component of intersocietal exchange which, as Jennings observes, was itself "the everlasting refutation of the myth that 'savagery' and 'civilization' could not be reconciled. "<282>

# TABLE 5.1 Selective List of English/American Dispensations of Tobacco to Amerindians

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DATE	FROM	<u>TO</u>	QUANTITY REF.
1629-33	William Wood	New England Algonquians	unspec. <283>
167 <u></u> 0	Nicolas Carteret	Carolina Algonquians	unspec. <284>
1671-1900	НВС	many groups via Cree, Ojibwa, Assiniboine	several 〈285〉 tons annually
1675	Albany authorities	Mahicans	unspec. <286>
1675	Capt. Lake	"Ammoscogging"	unspec. <287>
1676	Mary Rowlandson	Indians	3 pounds <288>
1679	Colonel Kendall	Oneidas	3 rolls <289>
1682	H. Coursey and P. Lloyd	Mahican, Esopus and Munsee	3 rolls <290>
1682	H. Coursey and P. Lloyd	Mohawks, Onondagas, Oneidas, Cayugas	3 rolls <291>
1682	William Penn	Delaware	100 <292> "hands"
1682	William Penn	Indians	ffower <293> anchers
1684	Lord Howard	Mohawks, Oneidas, Onondagas, Cayugas	l roll to<294> each Nation
1685	Albany officials	Indians	4 rolls <295>
1685	William Byrd	Oneidas, Onondagas, Cayugas, Senecas	60 twists<296> to each Nation
1690-91	Henry Kelsey	Stone Indians	20 lbs. <297>
1691	Gov. H. Sloughter	Mohawks	3 rolls <298>
1691	Gov. H. Sloughter	Mohawks, Oneidas, Onondagas, Cayugas, Senecas	579 lbs. <299>

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1692	Richard Ingoldsby	Five Nations	100 lbs.	<300>
1693	Gov. B. Fletcher	Iroquois	30 rolls	<301>
1696	Gov. B. Fletcher	Five Nations	54 1/2 1bs.	<b>&lt;</b> 302>
1698	Albany Magistrates	Onondagas, Oneidas, Cayugas, Senecas	l roll to each Nation	o<303>
1700	Queen Anne	Six Nations	unspec.	<304>
1700	Gov. R.C. Earl of Bellomont	Mohawks, Oneidas, Onondagas, Cayugas, Senecas	unspec.	<305>
1700	Gov. R.C. Earl of Bellomont	"River Indians"	20 lbs.	<306>
1702	Lord Cornbury	"Far Indians"	unspec.	<307>
1702	Lord Cornbury	Mohawk	6"Faddom	<308>
1702	Lord Cornbury	"River Indians"	1/2 cask	<309>
1702	Lord Cornbury	Five Nations	l cask	<310>
1710	Queen Anne	Six Nations	unspec.	<311>
1711	Robert Hunter	Skaahkook Indians	1 lb.	<312>
1711	Robert Hunter	Five Nations	unspec.	<313>
1711	Queen Anne	Five Nations	l case to each Nation	o <b>&lt;3</b> 14>
1714	Robert Hunter	Five Nations	3 casks	<b>&lt;315&gt;</b>
1714	Robert Hunter	Mahikanders and Skaahkook Indians	unspec.	<316>
1719	King George I	Six Nations	unspec.	<317>
1729	?	Conestogas	unspec.	<318>
1732	?	Delaware	100 lbs.	<319>
1732 1742	?	Delaware Six Nations	100 lbs. 200 lbs.	

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1756William Johnson"River Indians"unspec.(331)1756William JohnsonYroquoisunspec.(332)1756William JohnsonDelawareunspec.(333)1756William JohnsonTuscaroras, Senecasunspec.(334)1756William JohnsonOneidasunspec.(335)1756William JohnsonOneidasunspec.(336)1756William JohnsonMunsey, Delawareunspec.(336)1757William JohnsonShawanese, Nantikokesunspec.(337)1757William JohnsonSenecas, Onondagasunspec.(338)1757William JohnsonCherokeesunspec.(336)1757William JohnsonCherokeesunspec.(340)1758-59Isaac StillIndiansunspec.(341)1764A. Henry (elder)Algonquiansunspec.(342)1768William JohnsonSix Nationsunspec.(344)1768William JohnsonSix Nationsunspec.(344)1770William JohnsonSix Nationsunspec.(344)1770William JohnsonSix Nationsunspec.(345)1773William JohnsonSix Nationsunspec.(346)1773William JohnsonSix Nationsunspec.(346)1773William JohnsonSix Nationsunspec.(346)1773William JohnsonSix Nationsunspec.(346)17					
1752John PottsNaskapiunspec.(325)1754-55Anthony HendayIndians2 "feet" (326)1754-55Anthony Henday"Mekesue"1/2 ft.(327)1754Anthony Henday"Archithinue"1 "foot" (328)1755-58Titus KingIndians1 twist (329)1756William JohnsonMohawksunspec.(330)1756William Johnson"River Indians"unspec.(331)1756William JohnsonYroquoisunspec.(332)1756William JohnsonDelawareunspec.(333)1756William JohnsonDuscaroras, Senecasunspec.(334)1756William JohnsonOneidasunspec.(336)1756William JohnsonMunsey, Delawareunspec.(336)1756William JohnsonShawanese, Nantikokesunspec.(337)1757William JohnsonSenecas, Onondagasunspec.(338)1757William JohnsonCherokeesunspec.(338)1757William JohnsonCherokeesunspec.(340)1764A. Henry (elder)Algonquiansunspec.(341)1768William JohnsonSix Nationsunspec.(344)1768William JohnsonSix Nationsunspec.(344)1768William JohnsonSix Nationsunspec.(344)1770William JohnsonSix Nationsunspec.(344)1770William Johnson <t< td=""><td>1749</td><td>James Hamilton</td><td>Ohio Indians</td><td>unspec.</td><td><b>&lt;</b>323&gt;</td></t<>	1749	James Hamilton	Ohio Indians	unspec.	<b>&lt;</b> 323>
1754-55Anthony HendayIndians2 "feet" (326)1754-55Anthony Henday"Mekesue"1/2 ft. (327)1754Anthony Henday"Archithinue"1 "foot" (328)1755-58Titus KingIndians1 twist (329)1756William JohnsonMohawksunspec. (330)1756William Johnson"River Indians"unspec. (331)1756William JohnsonYroquoisunspec. (332)1756William JohnsonPelawareunspec. (334)1756William JohnsonTuscaroras, Senecasunspec. (334)1756William JohnsonOneidasunspec. (336)1756William JohnsonMunsey, Delawareunspec. (336)1756William JohnsonShawanese, Nantikokesunspec. (337)1757William JohnsonSenecas, Onondagasunspec. (338)1757William JohnsonCherokeesunspec. (336)1757William JohnsonCherokeesunspec. (334)1758-59Isaac StillIndiansunspec. (340)1766William JohnsonSix Nationsunspec. (341)1766William JohnsonSix Nationsunspec. (344)1768William JohnsonSix Nationsunspec. (344)1770William JohnsonSix Nationsunspec. (344)1770William JohnsonSix Nationsunspec. (344)1770William JohnsonSix Nationsunspec. (344)1773William JohnsonSix Nationsunspec. (346)	1752	Thomas Cresap	Ohio Indians	unspec.	<324>
1754-55Anthony Henday"Mekesue"1/2 ft.(327)1754Anthony Henday"Archithinue"1 'foot' (328)1755-58Titus KingIndians1 twist (329)1756William JohnsonMohawksunspec. (330)1756William Johnson"River Indians"unspec. (332)1756William JohnsonYroquoisunspec. (333)1756William JohnsonDelawareunspec. (334)1756William JohnsonTuscaroras, Senecasunspec. (334)1756William JohnsonOneidasunspec. (336)1756William JohnsonMunsey, Delawareunspec. (336)1756William JohnsonShawanese, Nantikokesunspec. (336)1757William JohnsonSheecas, Onondagasunspec. (337)1757William JohnsonCherokeesunspec. (336)1757William JohnsonCherokeesunspec. (336)1757William JohnsonCherokeesunspec. (336)1758-59Isaac StillIndiansunspec. (340)1764A. Henry (elder)Algonquiansunspec. (341)1768William JohnsonSix Nationsunspec. (344)1770William JohnsonSix Nationsunspec. (344)1770William JohnsonSix Nationsunspec. (344)1773William JohnsonSix Nationsunspec. (346)1773William JohnsonSix Nationsunspec. (346)1773William JohnsonSix Nationsunspec. (346)	1752	John Potts	Naskapi	unspec.	<325>
1754Anthony Henday"Archithinue"1 "foot" (328)1755-58Titus KingIndians1 twist (329)1756William JohnsonMohawksunspec. (330)1756William Johnson"River Indians"unspec. (331)1756William JohnsonTroquoisunspec. (332)1756William JohnsonDelawareunspec. (333)1756William JohnsonDelawareunspec. (334)1756William JohnsonOneidasunspec. (335)1756William JohnsonOneidasunspec. (336)1756William JohnsonMunsey, Delawareunspec. (336)1757William JohnsonShawanese, Nantikokesunspec. (337)1757William JohnsonSenecas, Onondagasunspec. (338)1757William JohnsonCherokeesunspec. (339)1758-59Isaac StillIndiansunspec. (341)1764A. Henry (elder)Algonquiansunspec. (341)1768William JohnsonSix Nationsunspec. (344)1768William JohnsonSix Nationsunspec. (344)1770William JohnsonSix Nationsunspec. (344)1770William JohnsonSix Nationsunspec. (345)1773William JohnsonSix Nationsunspec. (346)1773William JohnsonSix Nationsunspec. (346)1773William JohnsonSix Nationsunspec. (346)1773William JohnsonSix Nationsunspec. (346)1773 <t< td=""><td>1754-55</td><td>Anthony Henday</td><td>Indians</td><td>2 "feet"</td><td>&lt;326&gt;</td></t<>	1754-55	Anthony Henday	Indians	2 "feet"	<326>
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1756William JohnsonMohawksunspec.(330)1756William Johnson"River Indians"unspec.(331)1756William JohnsonDelawareunspec.(332)1756William JohnsonDelawareunspec.(333)1756William JohnsonTuscaroras, Senecasunspec.(334)1756William JohnsonOneidasunspec.(335)1756William JohnsonMunsey, Delawareunspec.(336)1756William JohnsonMunsey, Delawareunspec.(337)1757William JohnsonShawanese, Nantikokesunspec.(337)1757William JohnsonSenecas, Onondagasunspec.(336)1757William JohnsonCherokeesunspec.(336)1757William JohnsonCherokeesunspec.(336)1757William JohnsonCherokeesunspec.(337)1758-59Isaac StillIndiansunspec.(347)1764A. Henry (elder)Algonquiansunspec.(347)1768William JohnsonSix Nationsunspec.(344)1768William JohnsonSix Nationsunspec.(344)1770William JohnsonSix Nationsunspec.(346)1773William JohnsonSix Nationsunspec.(346)1773William JohnsonSix Nationsunspec.(346)1773William JohnsonSix Nationsunspec.(346) <td< td=""><td>1754</td><td>Anthony Henday</td><td>"Archithinue"</td><td>1 "foot"</td><td>&lt;328&gt;</td></td<>	1754	Anthony Henday	"Archithinue"	1 "foot"	<328>
1756William Johnson"River Indians"unspec.(331)1756William JohnsonYroquoisunspec.(332)1756William JohnsonDelawareunspec.(333)1756William JohnsonTuscaroras, Senecasunspec.(334)1756William JohnsonOneidasunspec.(335)1756William JohnsonOneidasunspec.(336)1756William JohnsonMunsey, Delawareunspec.(336)1757William JohnsonShawanese, Nantikokesunspec.(337)1757William JohnsonSenecas, Onondagasunspec.(338)1757William JohnsonCherokeesunspec.(336)1757William JohnsonCherokeesunspec.(340)1758-59Isaac StillIndiansunspec.(341)1764A. Henry (elder)Algonquiansunspec.(342)1768William JohnsonSix Nationsunspec.(344)1770William JohnsonSix Nationsunspec.(344)1770William JohnsonSix Nationsunspec.(344)1773William JohnsonSix Nationsunspec.(345)1773William JohnsonSix Nationsunspec.(346)1773-1821NWCoIndiansseveral(347)	1755-58	Titus King	Indians	1 twist	<329>
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1756William JohnsonDelawareunspec. <333>1756William JohnsonTuscaroras, Senecasunspec. <334>1756William JohnsonOneidasunspec. <336>1756William JohnsonMunsey, Delawareunspec. <336>1757William JohnsonShawanese,Nantikokesunspec. <337>1757William JohnsonSenecas, Onondagasunspec. <338>1757William JohnsonSenecas, Onondagasunspec. <338>1757William JohnsonCherokeesunspec. <339>1758-59Isaac StillIndiansunspec. <340>1764A. Henry (elder)Algonquiansunspec. <341>1768William JohnsonSix Nationsunspec. <3443	1756	William Johnson	"River Indians"	unspec.	<b>&lt;331&gt;</b>
1756William JohnsonTuscaroras, Senecasunspec.(334)1756William JohnsonOneidasunspec.(335)1756William JohnsonMunsey, Delawareunspec.(336)1757William JohnsonShawanese, Nantikokesunspec.(337)1757William JohnsonSenecas, Onondagasunspec.(337)1757William JohnsonSenecas, Onondagasunspec.(338)1757William JohnsonCherokeesunspec.(339)1758-59Isaac StillIndiansunspec.(340)1764A. Henry (elder)Algonquiansunspec.(341)1766-70Jonathan CarverDakota1 "prick"(342)1768William JohnsonSix Nationsunspec.(344)1770William JohnsonSix Nationsunspec.(344)1770William JohnsonSix Nationsunspec.(346)1773William JohnsonSix Nationsunspec.(346)1773-1821NWCoIndiansseveral(347)	1756	William Johnson	Troquois	unspec.	<332>
1756William JohnsonOneidasunspec. <335>1756William JohnsonMunsey, Delawareunspec. <336>1757William JohnsonShawanese, Nantikokesunspec. <337>1757William JohnsonSenecas, Onondagasunspec. <338>1757William JohnsonCherokeesunspec. <338>1757William JohnsonCherokeesunspec. <338>1757William JohnsonCherokeesunspec. <339>1758-59Isaac StillIndiansunspec. <340>1764A. Henry (elder)Algonquiansunspec. <341>1765-70Jonathan CarverDakota1 "prick"<342>1768William JohnsonSix Nationsunspec. <344<	1756	William Johnson	Delaware	unspec.	<b>&lt;</b> 333>
1756William JohnsonMunsey, Delawareunspec.(336)1757William JohnsonShawanese, Nantikokesunspec.(337)1757William JohnsonSenecas, Onondagasunspec.(338)1757William JohnsonCherokeesunspec.(339)1758-59Isaac StillIndiansunspec.(340)1764A. Henry (elder)Algonquiansunspec.(341)1766-70Jonathan CarverDakota1 "prick"(342)1768William JohnsonSix Nationsunspec.(344)1768William JohnsonSix Nationsunspec.(344)1770William JohnsonSix Nationsunspec.(346)1773William JohnsonSix Nationsunspec.(346)1773-1821NWCoIndiansseveral(347)	1756	William Johnson	Tuscaroras, Senecas	unspec.	<334>
1757William JohnsonShawanese, Nantikokes unspec.<3371757William JohnsonSenecas, Onondagasunspec.<338	1756	William Johnson	Oneidas	unspec.	<b>&lt;</b> 335>
Mohickanders1757William JohnsonSenecas, Onondagasunspec. <3383	1756	William Johnson	Munsey, Delaware	unspec.	<336>
1757William JohnsonCherokeesunspec. <33931758-59Isaac StillIndiansunspec. <3403	1757	William Johnson		unspec.	<337>
1758-59Isaac StillIndiansunspec. <34031764A. Henry (elder)Algonquiansunspec. <3413	1757	William Johnson	Senecas, Onondagas	unspec.	<338>
1764A. Henry (elder)Algonquiansunspec. <34131766-70Jonathan CarverDakota1 "prick" <3423	1757	William Johnson	Cherokees	unspec.	<339>
1766-70Jonathan CarverDakota1 "prick" <34231768William JohnsonSix Nationsunspec. <3433	1758-59	Isaac Still	Indians	unspec.	<340>
1768William JohnsonSix Nationsunspec. <34331768William JohnsonOnondagasunspec. <3443	1764	A. Henry (elder)	Algonquians	unspec.	<341>
1768William JohnsonOnondagasunspec. <3441770William JohnsonSix Nationsunspec. <345	1766-70	Jonathan Carver	Dakota	l "prick	"<342>
1770William JohnsonSix Nationsunspec. <3451773William JohnsonSix Nationsunspec. <346	1768	William Johnson	Six Nations	unspec.	<343>
1773 William Johnson Six Nations unspec. <346 1773-1821 NWCo Indians several <347	1768	William Johnson	Onondagas	unspec,	<344>
1773-1821 NWCo Indians several <347	1770	William Johnson	Six Nations	unspec.	<345>
	1773	William Johnson	Six Nations	unspec.	<346>
tons annually	1773-1821	NWCo	Indians	tons	<347>
1773 Maurice Blondeau Indians 25 bales <348	1773	Maurice Blondeau	Indians	25 bales	<348>

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1774	Maurice Blondeau	Indians	45 bales <349>
1774	William Johnson	Six Nations	unspec. <350>
1774	James McGill	Indians	50 bales <351>
1774	Ben Frobisher	Indians	unspec. <352>
1774	Guy Johnson	Six Nations	unspec. <353>
1775	James McGill	Indians	100 pkgs.<354>
1775	L. Ermatinger	Indians	5,500lbs.<355>
1775	Guy Johnson	Six Nations	unsepc. <356>
1775	Guy Johnson	Cayuga, Susquehanna	unspec. <357>
1775	A. Henry (elder)	"Pasquayah"	2 bales <358>
1776	A. Henry (elder)	Plains Indians	unspec. <359>
1785	Joseph Hadfield	Indians	720 lbs. <360>
1789	NWCo.	all headmen	3 fathoms<361>
1789	A. Mackenzie	Indians	unspec. <362>
1791	John Long	Chippeway	unspec. <363>
1791	John Long	Indians	5 carrots<364>
1792	Peter Fidler	Indians	7 fathoms<365>
1792	Peter Fidler	Piegan	131 lbs. <366>
1792	A. Mackenzie	Indians	unspec. <367>
1793	A. Mackenzie	Beaver Indians	unspec. <368>
1797-98	Charles Chaboillez	Chippewa	enormous <369> quant.
1800	A. Henry	Indians	unspec. <370>
1805-6	Lewis and Clark	various groups	unspec. <371>
1806	Simon Fraser	Carrier	unspec. <372>
1809-11	John Bradbury	Omaha, Ponca, Sioux	unspec. <373>
1810-13	Alexander Ross	Indians	unspec. <374>
1811	H.M. Brackenridge	Mandans	unspec. <375>

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1811-14	Gabriel Franchere	Indians	unspec.	<376>
1817	S.H. Long	Indians	23 lbs.	<b>&lt;</b> 377>
1818-20	Thomas Nuttall	Osage	unspec.	<b>&lt;378&gt;</b>
1819-21	S.H. Long	Missouris, Konzas, Otoes, Omahaws, Pawnees, Arikara and Shienne	30 lbs.	<b>&lt;</b> 379>
1826	Fort Simpson	Indians	unspec.	<380>
1829	Jonothan Green	N.W. Coast Indians	unspec.	<381>
1831-39	Josiah Gregg	Indians	unspec.	<382>
1832	John Wyeth	Blackfeet	25 lbs.	<383>
1832-34	Maximilian, Prince of Wied	Punca, Sioux, Crow, Assiniboins, Stone, Blackfeet, Piekanns, Arikara and others	large quant.	<384>
1833-34	John K. Townsend	Indians	unspec.	<385>
1837	Thomas Simpson	Indians	unspec.	<386>
1839	Thomas J. Farnham	Kauzaus	2 lbs.	<387>
1839	Thomas J. Farnham	various groups	unspec.	<388>
1845-46	Joel Palmer	Indians	unspec.	<b>&lt;389&gt;</b>
1846	Parkman	Indians	unspec.	<390>
c.1850	William Hooper	Tuski, Inuit	unspec.	<391>
1852	A.B. Jameson	Indians	unspec.	<392>
1868	?	Indians	150 lbs.	<393>
1870s	Sinclair	Indians	unspec.	<394>
1909-10	Carl Lumholtz	Indians	unspec.	<395>

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# TABLE 5.2 Selective List of French Dispensations of Tobacco to Amerindians

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DATE	FROM	<u>TO</u>	QUANTITY REF.
1604	S. de Champlain	Penobscot	unspec. <396>
1623-24	Gabriel Sagard	Hurons	unspec. <397>
1633	Jesuits	Indians	unspec. <398>
1634	Jesuits	Indians	unspec. <399>
1636	traders	Algonkians	unspec. <400>
1636	Anthony Daniel	Indians	unspec. <401>
1636	Jean de Brébeuf	Hurons	1 dozen <402> cakes
1638	F. J. le Mercier	Hurons	1 cake <403>
1639	Jérôme Lalemant	Hurons	unspec. <404>
1642	Jesuits	Indians	unspec. <405>
1645	Jesuits	Iroquois	unspec. <406>
1654	Jesuits	Hurons	brasse- <407> length
1663	Sieur Amiot	Indians	1 roll <408>
1669	French	Ojibwa	unspec. <409>
1670s	Acadians	Indians	unspec. <410>
1672	Jesuits	Indians	"consi- <411> derable"
1672	Jesuits	Indians	3 brasses<412>
1673	Comte de Frontenac	Hurons	unspec. <413>
1673	Comte de Frontenac	Iroquois	6 fathoms<414>
1675	Jacques Marquette	Illinois	1 cubit <415>
1679	French	Iroquois	unspec. <416>
1679	French via converted Ottawa	Ottawa	unspec. <417>

1679-80	Louis Hennepin	"Koroa," "Taensas," Sioux,	unspec. <418>
1679-80	Sieur de La Salle	Illinois	unspec. <419>
1682	de La Barre	Iroquois	unspec. <420>
1682	Sieur de La Salle	Indians	unspec. <421>
1684	Sieur de La Salle	Indians	unspec. <422>
1686	French	natives at Tadoussac	a "chunk"<423>
1687-88	Baron Lahontan	Indians	roll of 〈424〉 200 weight
1688	French	Illinois	<b>δ4 livres&lt;425&gt;</b>
1689	Baron Lahontan	Sauk, Potawatomi and Menominee	"some <426> rolls"
1689	Baron Lahontan	Menominee	2 rolls <427>
1689	Baron Lahontan	Eokoros (nonexistent)	1 roll <428>
		(nonexistent)	
1689	Baron Lahontan	Indians	•at <429> 
1689 1689	Baron Lahontan Baron Lahontan		
		Indians	<b>•</b> .
1689	Baron Lahontan	Indians	unspec. <430>
1689 1689-90	Baron Lahontan French	Indians Indians Ottawa	unspec. <430> unspec. <431>
1689 1689-90 1690	Baron Lahontan French Nicolas Perrot	Indians Indians Ottawa Indians	unspec. <430> unspec. <431> unspec. <432> 12
1689 1689-90 1690 1690	Baron Lahontan French Nicolas Perrot Nicolas Perrot	Indians Indians Ottawa Indians Ottawa	unspec. <430> unspec. <431> unspec. <432> 12 brasses <433>
1689 1689-90 1690 1690 1700	Baron Lahontan French Nicolas Perrot Nicolas Perrot de Longueuil	Indians Indians Ottawa Indians Ottawa White River Indians	unspec. <430> unspec. <431> unspec. <432> 12 brasses <433> unspec. <434>
1689 1689-90 1690 1690 1700 1701	Baron Lahontan French Nicolas Perrot Nicolas Perrot de Longueuil Governor	Indians Indians Ottawa Indians Ottawa White River Indians Onondagas	unspec.       <430>         unspec.       <431>         unspec.       <432>         12       <433>         unspec.       <434>         unspec.       <435>
1689 1689-90 1690 1690 1700 1701 1702	Baron Lahontan French Nicolas Perrot Nicolas Perrot de Longueuil Governor Commandants	Indians Indians Ottawa Indians Ottawa White River Indians Onondagas Indians	unspec.       <430>         unspec.       <431>         unspec.       <432>         12       <433>         unspec.       <434>         unspec.       <435>         unspec.       <436>
1689 1689-90 1690 1690 1700 1701 1702 1710	Baron Lahontan French Nicolas Perrot Nicolas Perrot de Longueuil Governor Commandants Du Buisson	Indians Indians Ottawa Indians Ottawa White River Indians Onondagas Indians Indians	unspec.       <430>         unspec.       <431>         unspec.       <432>         12       <433>         unspec.       <434>         unspec.       <435>         unspec.       <436>         unspec.       <437>

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1723	André Pénicaut	Siou	x	unspec.	<441>
1724	Commandant of Detroit	"Far	Indians"	unspec.	<b>&lt;442&gt;</b>
1733	La Vérendrye	Cree	:	unspec.	<b>&lt;</b> 443>
1733-34	La Vérendrye	Cree	2	16 fathoms	<444>
1733-34	La Vérendrye		e and niboin	30 fathoms	<445>
1735	Father Nau	Indi	ans	unspec.	<b>&lt;446&gt;</b>
1738	La Vérendrye	Indi	ans	unspec.	<447>
1738	La Vérendrye	Assi	niboin.	unspec.	<448>
1738	La Vérendrye	Mand	lan	unspec.	<449>
1739	French	Nipi	ssing	unspec.	<b>&lt;</b> 450>
1741	Marquis de Beauharn	nois	Senecas	unspec.	<b>&lt;451&gt;</b>
1742	Marquis de Beauharn	nois	Montagnais	unspec.	<b>&lt;452&gt;</b>
1751-62	Jean-Bernard Bossu	Alab	ama	1 roll	<b>&lt;453&gt;</b>
1755-59	traders	Wyan Detr	dots near oit	unspec.	<b>&lt;454&gt;</b>
1757	Marquis de Montcalr	n	Five Nations	unspec.	<b>&lt;455&gt;</b>
1757	Marquis de Vaudreui	i1	Five Nations	l plug	<b>&lt;456&gt;</b>

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### CHAPTER SIX SHARING THE PIPE: ETHNOHISTORIC AND ARCHAEOLOGICAL EVIDENCE

While the transculturation of tobacco has been explored in considerable detail, the devices employed to consume this smoking substance have been mentioned only in passing. Since pipes and tobacco were closely knit within the same symbolic fabric of prehistory and historic culture native contact, it is inappropriate to treat them in isolation. At the same time it seems desirable to give the non-perishable component of the pipe/tobacco/smoking complex separate attention, since only here is it possible to supplement ethnohistoric sources with independent archaeological data.<1>

#### A) NATIVES GIVE PIPES TO THE NEWCOMERS

## early imitations

In Chapter Two it was indicated that Cartier witnessed pipe-smoking in 1535, and that Le Moyne de Morgues illustrated the strange device thirty years later.<2> These North American contacts did not, however, result in the diffusion of smoking implements to the Old World. There is no documentary evidence that, when France was introduced to **Nicotiana** in the 1560s, the substance was accompanied by any form of tube or cylinder. This is not surprising since, as was pointed out,<3> Nicot received the Brazilian leaf from the Portuguese, who did not use pipes. Many years were to elapse before the French learned to smoke pipes from their European neighbors.

The English experience was quite different, for they were quick to import and imitate the smoking devices used by native peoples of the eastern seaboard of North America.<4> There are suggestions that John Hawkins carried not only tobacco,<5> but also pipes on his return trip from Florida in 1565, and that his men introduced these to England and possibly West Africa.<6> These were probably a two-piece affair with separate bowl and reed stem resembling the Timucua example illustrated by Le Moyne de Morgues (see Plate 6.1).<7>

An entry dated 1573 in William Harrison's Great Chronologie suggests that, by this time, both Nicotiana rustica and Nicotiana tabacum were in use in England.<8> The same passage also alludes to the devices used in consuming the plant:

In these daies the taking-in of the smoke of the Indian herbe called "Tabaco," by an instrument formed like a litle ladell, wherby it passeth from the mouth into the hed & stomach, is gretlie taken-up and used in England, against Rewmes & some other diseases ingendred in the longes & inward partes, & not without effect.<9>

There is some evidence that the earliest pipes were makeshift imitations (using walnut shells and straws) of Amerindian prototypes.<10>

After Drake picked up Hariot, Lane and the other Roanoke settlers and returned them to England in 1586<11> a different Amerindian smoking device became a popular prototype for Elizabethan pipes. Since Roanoke was situated among North Carolina Algonquians, it is probable that any stylistic influence came from this source. Although John White's original drawing of these people "sitting at meat" does not include their personal possessions,<12> Theodore De Bry added a tobacco pipe to the illustration when he later had it engraved for publication (see Plate 6.2).<13> Enlargements of this engraving have often been compared with archaeological specimens recovered in the Roanoke vicinity (see Plate 6.3),<14> and the consensus is that De Bry accurately depicted the type of pipe taken back to England by Hariot and other colonists.<15> That this expedition returned with such artifacts is corroborated by Charles De l'Ecluse in a footnote to his 1605 Latin edition of Monardes:

...in the year 1585 Wingandecaow (which is now called Virginy) being discoverd to the English...they found that the Inhabitants did frequently use some Pipes made of Clay, to draw forth the fume of Tobacco leaves set on fire; which grew amongst them in great quantity, or rather to drink it down, to preserve their health. The English returning from thence, brought like Pipes with them, to drink the smoak of Tobacco; and since that time, the use of drinking Tobacco hath so much prevailed all England over, especially amongst the Courtiers, that they have caused many such like Pipes to be made to drink Tobacco with.  $\langle 16 \rangle$ 

Shortly before 1590, then, the English began manufacturing the one-piece pipes made from white ball-clay, which became the dominant form throughout the next two and half centuries.<17> By 1599 at least one pipemaker was identified by name,<18> and in 1619 there were enough of these tradesmen in the London area, that King James (of all people) granted them a charter and they became an incorporated guild.<19>

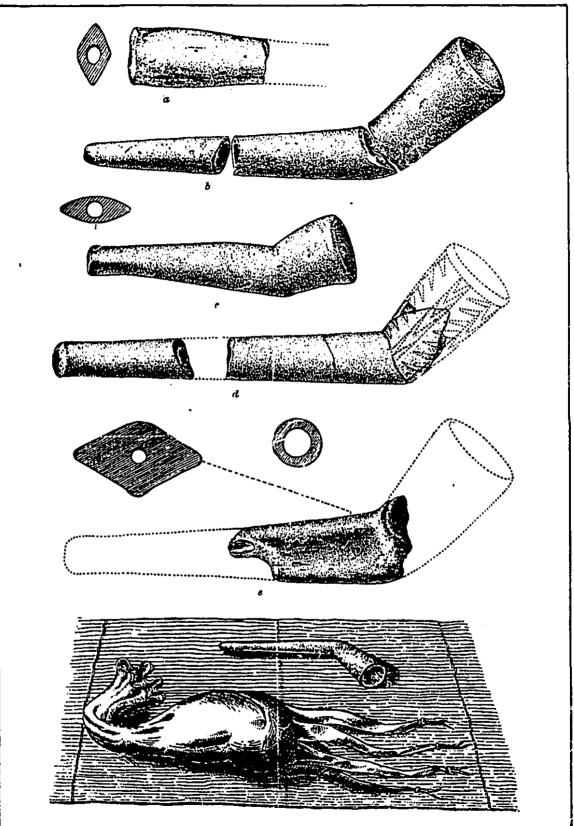


Theodore de Bry's (1591) copper cut of Le Moyne de Morgue's sketch, showing a scene in Florida in 1564. The long-stemmed, two-piece smoking implement was likely the type taken back to Europe by John Hawkins in 1565.

PLATE 6.2



Theodore de Bry's (1590) elaborated engraving of John White's painting, showing an Amerindian couple "sitting at meat" in the Roanoke vicinity in 1585. The type of pipe shown lying near the man's right leg is commonly recovered on archaeological sites in the area, and was probably similar to ones brought to England by Hariot in 1586.



Comparison of De Bry's (1590) engraving of Amerindian pipe (bottom), with archaeological specimens recovered in the Potomac Valley (a - e). From W.H. Holmes' *Aboriginal Pottery of the Eastern United States* (1903).

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It was exactly twenty years (from the time the Roanoke colonists first saw Algonquian clay pipes) before the backwash of transculturation left the English imitations on the shores of America. It must be recalled that Waymouth and Rosier handed out tobacco pipes to the Eastern Abenaki during their 1605 expedition to what is now Maine.<20> However, it must also be remembered that the Southern New England Algonquians gave smoking devices to Gosnold in 1602 and to Fring the following year.<21> The trade in these implements during this period was minor and flowed bilaterally, since both sides had limited resources.

The best illustration of the lack of domination in the manufacture and distribution of pipes by either natives or newcomers, is the case of early Virginia. In 1607 Percy described native pipes "made artificially of earth as ours are, bigger. "<22> Within a year Robert Cotten, but far ″a Tobacco-pipe-maker," was despatched to the Jamestown colony, where there was no lack of demand or material for his craft.<23> Strachey reported that "there is a clay, which the Indians call Assesqueth, whereof they make their Tobacco-pips, which is more smooth and fyne, then I have ellsewhere seene any. "<24> But there is also documentary evidence from the 1620s and 1630s, that quantities of pipes settlers were bringing large from Not surprisingly, early archaeological sites in England.<25> Virginia are characterized by highly variegated assemblages of pipes. As Heite reports:

Evidence from Camden and other contact sites supports the idea that there were several concurrent Virginia pipemaking industries: pure aboriginal, carrying on the precontact tradition; acculturating aboriginal, still following the precontact tradition but using metal tools; aboriginal-European, consciously copying imported forms; and a pure European industry that can be distinguished from imported pipes only by the clay, if then.<26>

Of special interest is the evidence that Amerindians were imitating English clay pipe-styles, <27> while some Europeans were "distinctly Indian in character. "<28> smoking pipes Archaeological evidence that, of suggests the locally-manufactured pipes recovered at the seventeenth-century Nominy Plantation, native handmade pipes outnumber the Eurocolonial versions made in molds.<29>

Amerindian pipes are also occasionally found on seventeenth-century French colonial sites.<30> While these may have been dropped by native peoples during their visits to European forts, it should also be remembered that the settlers of New France often purchased smoking devices from Amerindians.<31>

#### the demand for Amerindian pipes

As was the case with tobacco,<32> references to the presentation of pipes by natives to newcomers permeate the ethnohistoric literature produced between the early seventeenth century and the end of the nineteenth century.<33> Some of these gifts were undoubtedly part of the courteous efforts to satisfy the wants of weary European travelers.<34> Even prisoners were supplied with such comforts, as Luke Swetland found out when he

was given, among other things, close to twenty pipes while being held captive during the Revolution. <35> Many presentations were part of the formalities of calumet ceremonialism, <36> and still others reflected the gift exchanges characteristic of prehistoric interactions.<37> Diplomatic qifts to powerful leaders frequently included calumets. For this reason, the collections of the European royalty contain pipes, <38> and American Presidents (including Jefferson, Monroe, Jackson and Fillmore) were showered by a plethora of native smoking implements.<39>

As smokers, Europeans were obviously interested in pipes as practical instruments, but as collectors of curios, they were also fascinated by smoking devices as artifacts of "savage" technology and art. It was not long after the initial colonization of North America, that these objects began appearing in the curio cabinets of Western Europe.

Among the earliest surviving records of such an interest is Johann Neander's **Tabacologia** (Leyden, 1622),<40> which contains a cut showing three Amerindian pipes presumably in a European collection available to the illustrator (see Plate 6.4).<41> Three years later a catalogue of "all sorts of antiquities and strange things brought together" by Lorenz Hofmann, listed an Indian pipe.<42> John Tradescant, who formed one of the first organized collections of rarities in England (later to become the property of Elias Ashmole and Oxfor: University), is known to have received native pipes from Virginia sometime before 1638.<43> An intriguing 1673 description of the "Great Duke's Gallery at Florence" lists "many sorts of Indian tobacco-pipes from New Belgium. "<44>

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The native propensity for giving pipes away was matched by an overwhelming European need to own these hand-crafted artifacts, even if it occasionally meant acquiring them through spuricus means. The eighteenth-century observer, Peter Pond, talked of a wandering French magician who purloined the object of his desire through a remarkable sleight of hand:

They Gave him the Name of Minneto which is a Sperit In As he was Standing Among Sum People thare Langueg. thare Came an Indian up to them with a Stone Pipe or Callemeat Carelessly Rought and which he Seat Grate Store By. Minneto askd ye Indan to Leat him Look at it and he Did so. He wished to Purchis it from the Indan Minneto then Put it But he would not Part with it. into his Mouth as the Indan Supposed and Swallod it. The Poor Indan Stood Astonished. Minneto told him not to trubel himself about it--he Should Have his Pipe agane in two or three Days--it Must first pass threw him. At the time Seat the Pipe was Presented to the Indan. He Looked upon it as if he Could not Bair to Part with it But would not Put his hand upon it(.) Minneto Kept the Pipe for Nothing. It was three times Larger than Minnetos Mouth. It was Made of the Read Stone of St. Peters River so Much asteamd among the Eastern and Southern Nations.<45>

Others, less skilled in cozenage, were prepared to risk severe punishment for depriving native peoples of their nicotian possessions. James' account of S.H. Long's expedition to the Rocky Mountains in 1819-20 cites a good example:

...several Oto Indians were sitting on the river bank at the establishment of the Missouri fur company, quietly smoking their pipes, and apparently much interested in the movements before them. One of them was accosted by a soldier, who had left his cordelle for the purpose, with an offer to purchase the pipe he was then using; but the Indian would not part with it, saying, he had no other to bear him company in his hunting excursions. The soldier requested permission to examine it, but as soon as the Indian put the pipe

into his hands, he twisted the bowl from the handle and ran off with it. The Indian in company with one of the traders, immediately pursued the thief to his boat, and demanded the pipe; but obtaining no satisfaction, he Cantonment, Engineer came to and stated the cilcumstances to Major O'Fallon, who assured that his influence should not be wanting to procure the pipe again, and to have the offender punished by a severe whipping. The Indian, however, with more mercy than justice, replied, that he would extremely regret the infliction of any punishment whatever upon the soldier, and he desired it might not be done; all he wished for was the recovery of his property. <46>

If pipes had not been either given by native peoples as presents, or stolen from them, then they were purchased or traded,<47> and often sent to Europe as souvenirs of travels in "savage" America.<48> By the nineteenth century, native peoples were made aware of a lucrative white market for their elaborate smoking devices.<49>

### the argillite phenomenon

It is useful to illustrate the lengths to which native peoples went in appeasing the European mania for collecting exotic smoking devices, by briefly recounting the most extreme case: Northwest Coast sculpture of the period 1820 to 1865.

The only plant known to have been cultivated by the prehistoric Haida was tobacco, which apparently was no. smoked but, rather, was chewed with lime or traded to neighboring groups.<50> While there is archaeological evidence of tubular smoking devices in British Columbian prehistory, it is believed that the habit had disappeared in coastal regions by the time of

European contact, and was reintroduced to native peoples during the eighteenth-century fur trade.<51> Smoking was immediately incorporated into the ceremonial life of the Tlingit and Haida, who began producing their own pipes to decrease a dependence on the fragile clay versions obtained from Euro-American fur traders.<52>

At this juncture, a curious thing happened. Europeans started purchasing Haida pipes made from a black carbonaceous shale known as argillite. While some of these were merely stone skeuomorphs of white clay trade pipes, <53> others were artistically-elaborate productions reflecting either native tradition, or imitating European technology such as ships. <54> By 1818 the first of these artifacts reached a European museum. <55> Demand was so great that pipes represented the most important Haida argillite sculpture throughout much of the nineteenth century. <56>

The circulation of argillite pipes continued after the Hudson's Bay Company monopolized the Northwest Coast fur trade.<57> Remarkably, the pipes even found their way into the hands of native peoples living in entirely different areas of the continent. The most astonishing example is the case of Little Nest's medicine bundle, cited by Robin Wright. By 1840 a Haida argillite pipe had somehow ended up on top of a butte in Montana, whereupon it became incorporated as part of one of the most powerful rock medicine bundles revered by the Crow.<58>

J.C. King has observed that "tobacco and pipe smoking on the Northwest Coast provides a sequence for the transformation of ideas." <59> Indeed, consider what took place. Native peoples of British Columbia, whose ancestors once smoked, but who, by the Historic Period, practiced an alternate mode of consumption, were (re)introduced to pipe smoking by Europeans who, themselves, had borrowed the habit from Amerindians on the eastern seaboard. The Haida copied European pipes (originally derived from Virgínia Algonquian prototypes) for their own use, and added elaborate combinations of indigenous and White designs valued by European curio-seekers. In addition to enhancing the museums of Europe, the pipes occasionally circulated among Amerindians in other regions of North America, where they again became part of the shamanic ideology that once formed the cultural predisposition for smoking in the prehistoric New World. Nothing more manifestly illustrates the complexities of transculturation.

# B) EFFECTS OF TRANSCULTURATION ON AMERINDIAN PIPES

#### changes in raw materials

While the backwash of transculturation led some native peoples to manufacture smoking implements for the first time, those who already had a pipe-making tradition occasionally modified prehistoric methods when European metals became available.

In reviewing the literature relating to culture contact during the first decade of the seventeenth century, one is impressed by reports of copper or copper-and-clay pipes found among the Eastern Algonquians, Virginia Algonquians and other Indians of Cape Cod, Staten Island and the mouth of the Hudson River.<60> Early scholars were puzzled by these allusions to metal, since it was thought that the native populations in question had had little or no previous contact with Europeans. Some commentators assumed that these smoking devices were made from indigenous raw materials,<61> and Bolton even suggested that their apparent absence in archaeological collections was the result of their "metallic stock" being "bartered away with the early colonists."<62> Others, such as Beauchamp, believed the "copper" to be a mere verisimilitude, and questioned the fidelity of the eyewitnesses.<63>

It must be considered that explorers were seeking precious metals and other valuable resources and that any hint of these would have been over-emphasized in reports prepared to foster interest in continued exploration. This was almost certainly the case with Edward Bland, whose **The Discovery of New Brittaine** (London, 1651)<64> lured potential settlers with rumors that "Tobacco pipes have beene seene among these Indians tipt with Silver."<65>

It does not seem probable, however, that four different observers, over a seven year period and at five separate locations along the seaboard from Cape Cod to Chesapeake Bay, were all either mistaken in their identification of copper smoking devices, or were exaggerating the riches of the country. Moreover, several decades of intensive research on early Indian-European contacts has greatly increased the probability that native peoples of the Northeast had access to European sheet copper and brass throughout the latter half of the sixteenth century.<66> It has, therefore, become more common to attribute the presence of these metal or metal-and-clay pipes to direct European trade along the mid-Atlantic coast, particularly in light of recorded evidence that ship cargoes contained plate copper.<67>

A second hypothesis suggests a more northerly origin, given the sixteenth-century proliferation of European fishermen and fur traders along the North Atlantic coast. <68> Trigger observes that "while the Chesapeake Bay region was clearly visited by Europeans through most of the sixteenth century, it is worth remembering that during that period more European ships and men frequented the coasts of Newfoundland and the Gulf of St. Lawrence each year than traveled between Spain and its rich far-flung colonies in the New World."<69> Bourgue and Whitehead provide evidence for the existence of shallop-sailing, native entrepreneurs who brought European goods obtained in the Gulf of St. Lawrence as far south as Massachusetts Bay.<70> Trigger thinks it possible that sixteenth-century European goods wore being traded from what is now Eastern Canada to the headwaters of the Hudson River. <71> Ramenofsky has also argued that such goods reached the native populations of central New York before direct interaction with Europeans and no later than AD 1550.<72>

In the absence of prehistoric archaeological evidence for copper smoking devices, and while awaiting further rigorous, scientific analysis of copper recovered on protoand early-historic sites, one is left with the probability that, by 1602, the northeastern Amerindian pipe complex had been modified by European raw materials.<73> The possibility of earlier modifications is suggested by the occurrence of copper pipes and fittings on protohistoric Pokanoket sites of pipe the late-sixteenth century. <74> Evidence for the use of sheet metal in the repair or enhancement of native clay pipes has also been recovered on early seventeenth-century archaeological sites in New England. <75>

It seems ironic that the metal pipes which Henry Hudson thought were suggestive of rich indigenous resources, <76> may have been manufactured from materials originally brought from In any case, by the time his explorations led to the Europe. establishment of New Netherland, it became apparent that native peoples received many of their metallic resources from the newcomers. The attractiveness of European metals to Amerindian pipe-makers oven sparked a calamitous massacre that resulted in the destruction of Swanendael (on the west side of Delaware Bay) in 1631. The incident is described by David Pietersz de Vries in Korte Historiael, Ende Journaels Aenteyckeninge... (Alkmaar, 1655), <77> as translated by Meyers:

An Indian remained on board of the yacht at night, whom we asked why they had slain our people, and how it happened. He then showed us the place where our people had set up a column, to which was fastened a piece of tin, whereon the arms of Holland were painted. One of their chiefs took this off for the purpose of making tobacco-pipes, not knowing that he was doing amiss. Those in command at the house made such an ado about it, that the Indians, not knowing how it was, went away and slew the chief who had done it, and brought a token of the dead to the house to those in command, who told them that they wished they had not done it, that they should have brought him to them, as they wished to have forbidden him to do the like again. They then went away, and the friends of the murdered chief incited their friends...to set about the work of vengeance... Thus was our young colony destroyed, causing us serious loss.<78>

Archaeological evidence from numerous seventeenth-century Iroquoian sites corroborates ethnohistoric accounts of native pipes modified with European metal. One of the earliest occurrences is at the Seneca Dutch Hollow Site (c.1590-1615), where a sheet brass pipe-bowl liner for a wooden smoking implement was found in, of all places, an infant's grave.<79> Similar recoveries have been made at later Seneca settlements. Pipes with bowls or stems lined with brass have, for instance, been found at Boughton Hill (c.1670-87).<80>

James Bradley reports similar finds at seventeenth-century Onondaga habitations. At the Shurtleff Site (c.1630-40) a severely corroded iron tube was found inside one end of a stone pipe stem.<81> Conical metal liners for wooden pipes were recovered from both the Carley Site (c.1640-50) and the Lot 18 Site (c.1650-55).<82> Peter Pratt has also reported a flanged brass liner to a wooden pipe bowl at the Thruston Site--an Oneida village that flourished in the 1630s.<83>

Aside from efforts to repair fractured stems, or make wooden bowls more resistant to charring, European metal was also used to decorate the eyes of zoomorphic effigy pipes. Examples come from the Seneca Dann Site and Onondaga Indian Castle Site.<84> Ian Kenyon observes that discoidal shell beads and round glass beads were also inserted into the eye-sockets of effigies.<85> George Hamell believes that such inlays may have functioned to animate, thereby making effigies come 'alive.'<86>

Iroquoian-speaking peoples to the North (Huron and Neutral) and the South (Susquehannocks) are also known to have modified their pipe assemblages with trade metal.<87> As time went on, many other Amerindian groups did the same. Occasionally, entire pipes were made from European materials,<88> but often only the bowl liners were produced from scraps including old gun barrels.<89> Even more popular was the practice of inlaying stone pipes with various metals,<90> wrapping stems with snare wire<91> and adding tinkling cones for ornamentation.<92>

#### technological and stylistic influences

Native peoples were highly skilled at crafting elaborate stone pipes long before European contact. Early observers, such as John De Laet (Nieuwe Wereldt, Leyden, 1625)<93> marveled at the achievements of the Amgrindians of New Netherland:

Their household furniture is mean and scanty, consisting of mats and wooden dishes, together with hatchets made of hard flint stone by dint of savage labour, and tubes for smoking tobacco formed likewise of flint stone ingeniously perforated, so that it is surprising how, in so great a want of iron implements, they are able to carve the stone.<94>

It is inconceivable, however, that European metal tools did not allow greater ease in carving and artistic expression.<95> In his New Englands Prospect (London, 1634),<96> William Wood observed that the Narragansetts employed the new technology to manufacture smoking implements, which were traded to neighboring tribes and possibly to the English:

The Northerne, Easterne, and Westerne Indians (get from the Narragansetts) ...their great stone-pipes, which wil hold a quarter of an ounce of Tobacco, which they make with steele-drils and other instruments; such is their ingenuity & dexterity, that they can imitate the English mold so accurately, that were it not for matter and colour it were hard to distinguish them; they make them of greene, & sometimes of blacke stone; they be much desired of our English Tobaconists, for their rarity, strength, handsomness, and coolnesse.<97>

Fortunate circumstances have led to the chance recovery of two such pipes in a mid-seventeenth century Narragansett grave in Rhode Island. According to William Turnbaugh, both artifacts were unfinished, and one was even accompanied by the iron file that had apparently been used in the manufacturing process.<98>

There is, as yet, no comparative and quantitative evidence to suggest the degree to which the new technology changed the intensity of native manufacturing. Turnbaugh claims that "stone pipes were not common in New England until steel tools became available." <99> Yet, the source of this statement, Joseph McGuire, has been discredited for his exceedingly biased conviction that **all** but the most basic tubular pipes dated to a period **after** the introduction of European technology.<100> More certain is evidence suggesting that the use of drills, knives, rasps and saws was not restricted to the eastern seaboard but became widespread in stone pipe manufacture throughout North America.<101>

The influence of European contact on the stylistic attributes of native smoking devices is quite clear on numerous specimens recovered on archaeological sites. Occasionally, seventeenthcentury Amerindian pipes in the Northeast were patterned after English and Dutch clay versions, <102> much like the argillite skeuomorphs found in the nineteenth-century Northwest Coast. <103> More often, however, modified native productions of the Historic Period were a syncretism of indigenous design and European iconography.<104> While some scholars have greatly overemphasized European iconographic influences and, have offered these as evidence of wholesale acculturation, <105> others have pointed to a more general tendency towards persistence and even florescence of crehistoric designs after culture contact. <106>

C) NEWCOMERS GIVE PIPES TO THE NATIVES

#### native-style pipes

Just as Amerindians found it profitable to manufacture smoking devices for a European market, so too Europeans were compelled to return the favor by producing pipes closely resembling designs valued by native peoples. There is considerable evidence, for example, that many of the so-called "Micmac" pipes, although based on prehistoric prototypes, were manufactured by the French, both for their own requirements and for use in the Indian trade.<107> Indeed, after Amerindians acquired steel tools, it becomes increasingly difficult to distinguish the "Micmac" pipes of natives and newcomers.<108>

Ever more striking were the catlinite imitations. In 1831 a fur trader named Philander Prescott got together with a group of Indians and began quarrying pipestone.<109> Such mining activities continued, and by the late 1840s, European-made pipe blanks and pre-forms were being sold to tribes as far away as the Rocky Mountains.<110> General Sully commissioned James Hubbell to manufacture 5,000 specimens at five dollars apiece, which were subsequently traded to Amerindians along the Missouri for buffalo robes and other skins worth twice the investment.<111>

After the Sioux received treaty rights to the catlinite quarry in the 1850s, fur traders purchased the raw materials, manufactured finished smoking devices on lathes, and traded them back to native peoples. By the mid-1860s a fur company was churning out Siouan calumets by the thousands.<112> All of this was happening at the very time the Haida were busily carving hundreds of stone pipes for fur traders on the West Coast.<113>

PLATE 6.4

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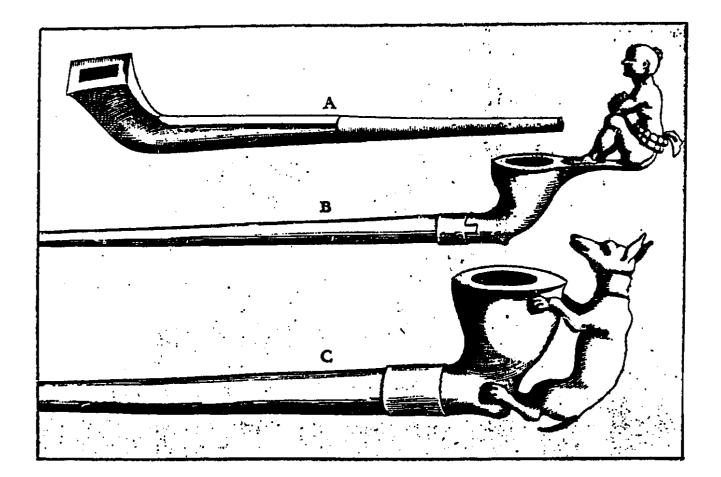


Plate from Johann Neander's *Tabacologia* (1622), showing three "pipes used by the Indians." The availability of such smoking devices to illustrators, suggests that Amerindian pipes were entering European collections of "rarities" in the early seventeenth century.



A 1796 painting by F. Bartoli, showing the Iroquois leader, Cornplanter, wielding a tomahawk pipe. These curious implements were invented by Europeans, who incorporated native symbols of peace and war to facilitate diplomacy on the frontier. Tomahawk pipes of the type depicted here were occasionally manufactured by Amerindians, who even sold them back to Europeans as symbols of native ethnicity.

## metal pipes

The "Micmac" form may have inspired the development of a curious hybrid implement, popularly known as the "tomahawk pipe," which incorporated a native smoking device with a European metal hatchet.<114> The pioneer archaeologist David Boyle called these "frauds on the Indian," and though he believed that "no Indian would degrade himself by smoking anything but a good-old-fashioned stone pipe,"<115> his comments fall flat in the face of their tremendous popularity.

The invention and even the first introduction of these ingenious implements made from steel, brass and other metals, remain shrouded in mystery. Dean Snow includes a trade tomahawk pipe among the representative artifacts belonging to the Western Abenaki living in A.D. 1600.<116> This is almost certainly an error, for there is virtually no independent evidence for their existence before the early eighteenth century, when English. French and even Spanish manufacturers began producing them for the Indian trade.<117>

The symbolic significance of the tomahawk pipe is almost too obvious to warrant discussion. The same implement could be used either to crack an enemy's skull, or to affirm friendly relations over a peaceful smoke. This powerful dialectic mirrored the structural oppositions of calumet ceremonialism, <118> and it comes as no surprise that tomahawk pipes were not only traded (for two beavers apiece), <119> but presented to chiefs at important socio-political functions.<120>

Some researchers claim that no tomahawk pipes were manufactured by Amerindians. <121> It seems likely, however, that native peoples often modified simple hatchets and spiked tomahawks by inserting pipes into holes drilled through their hafts (see Plate 6.5).<122> Some native groups, moreover, were capable of casting brass and pewter while others learned to forge iron from Euro-colonial blacksmiths. <123> By the late-nineteenth century, this trade good, originally invented by Europeans, became an "Indian" article made by native peoples on reservations for sale to Americans. <124> Once again transculturation had fed upon itself.

More recognizable European metal pipes patterned after white clay versions circulated among native peoples throughout much of the seventeenth century. These were occasionally made of copper, brass, iron and silver, though most were of lead or pewter.<125> The latter have a sporadic occurrence in the Huron and Neutral territories of Ontario.<126> Of particular interest is an example recovered at the Jesuit Mission of Saint-Marie I near Midland, Ontario, which was occupied between 1639 and 1649. In the Huron cemetery associated with the Mission, Wilfred Jury excavated:

...a beautifully designed and executed pewter pipe, 14 inches long, beautifully decorated by carving, near the bowl of which two **fleur-de-lis** can be distinguished. This must have been the grave of an influential Huron who possibly had become Christian after the death of his wife, whose bones, preserved and wrapped in pagan fashion, were placed at his side. Either by extensive

trade or by presentation he had become the possessor of this exceptional and, indeed, unique pipe, a rare example of French artistry and workmanship. It was an unusual object to be found in the New World.<127>

What Jury did not know was that the **fleur-de-lis** was a popular Dutch insignia for tobacco pipes, <128> and that the artifact in the Huron grave was probably bought by the French from a manufacturer in Holland. Also escaping Jury's attention was an important contemporary reference in the **Jesuit Relations** (dated 1645) indicating that three Huron Indians were given pewter pipes while visiting near Trois-Rivières, Quebec.<129>

Smoking devices made of pewter or lead are occasionally found on Seneca, <130> Onondaga <131> and other Iroquois sites <132> which date to the second half of the seventeenth century. These often have effigies of birds and animals (including monkeys and lions) attached to their bowls.<133> Similar examples are known from New England(134) and particularly from New Jersey.(135) The fact that these implements could be made with very long stems without increasing their fragility, was likely attractive to native peoples, who smoked in conditions which frequently led to accidental breakages of clay pipes. On the other hand, the thin but sturdy stems were fraught with peril, as Jonathan Fisher observed, when an inebriated Penobscot shaman "fell with a metal pipe in his mouth, which pierced his neck, and caused his death. <136>

While many pewter pipes (such as the one recovered at Saint-Marie) were certainly of European manufacture, others were

probably produced by Amerindian craftsmen. As early as 1643 Roger Williams exclaimed that New England Indians "have an excellent Art to cast our Pewter and Brasse into very neate and artificiall pipes." <137> These may have been the model for the illustrations published by Neander (see Plate 6.4), although it is again difficult to say whether any particular example had been fashioned by the hands of natives or newcomers.

# white clay pipes

While the idea of making smoking implements from clay originated in America, the molds which could mass produce cheap replicas were invented by Europeans.<138> By the middle of the seventeenth century, English and Dutch pipe-makers were almost certainly producing more of these implements in ten years than were possible in all the millennia of North American prehistory.<139> Factories produced and sold pipes by the gross (144)<140>, since their low cost and high fragility made them almost as disposable as paper napkins are today.<141>

The English had had a head start in the business,<142> and it was they who introduced the craft to the Netherlands in the first decade of the seventeenth century.<143> The Dutch immediately expanded the industry, which rose to importance particularly in the Gouda region.<144> Archaeological sites in the areas occupied by New Netherland and New Sweden, suggest that large quantities of Dutch white clay pipes were brought to North America throughout much of the seventeenth century.<145> Excavations in the former territories of New France, indicate that the French obtained most of their European white clay pipes from the English and the Dutch.<146> This is not surprising since pipe-making remained relatively unimportant in France until the eighteenth century,<147> and was not an industry in Lower and Upper Canada until the nineteenth century.<148>

White clay pipes have been extremely important artifacts in North American historical archaeology, for they are ubiquitous at European colonial and post-colonial forts, trading posts, portages and settlements.<149> They have, moreover, been instrumental in dating sites and in culture-chronological reconstruction, since their morphological variability reflects consistencies over periods as short as ten or twenty years, and their use-life is measured in days. <150> As Pfeiffer points out, provide information on economic they also status, trade connections and even political affiliations.<151>

For the purposes of this study, however, European white clay pipes significant material are as expressions of transculturation, particularly when they are recovered on Amerindian archaeological sites.<152> Their occurrence in seventeenth-century Iroquoia is especially interesting, since the Five Nations were known for their own ceramic pipe manufacture, which persisted throughout the Historic Period despite a flourishing European trade in nicotian products.

In Seneca territory, European white clay pipes have been

recoverd at the Warren Site (c.1615-1637), <153> which post-dates the earliest presence of sheet brass pipe-bowl liners and other evidence of European technological influence. <154> The Blowers Site has yielded a specimen dating to 1622-25, thus displacing Thurston (c.1625-37), which Pratt believed was the earliest Oneida "castle" having had access to European-manufactured, clay smoking implements. <155> Among the Cayuga, white clay pipes first occur at Slamon Valley II site (c.1620-1640);<156> in the Onondaga region they are reported at the Shurtleff site (c.1630-40),<157> and in Mohawk territory at Oak Hi11 (c.1630-1650).<158> Based on evidence from this series of dates, McCashion has concluded that the Iroquois began receiving limited numbers of European clay pipes only after the erection of Fort Orange in 1624.<159>

Studies of the numerous fragments of white clay pipes excavated at seventeenth-century Iroquois sites, suggest that the majority were of Dutch origin, and that many may be attributed to the English pipe maker Edward Bird, who practiced his craft in Amsterdam sometime between 1628 and 1665.<160> Dutch pipes continued to increase in popularity after mid-century, and only began to decline with English predominance in the early eighteenth century.<161> It is a point of interest that some Dutch pipes found on Amerindian sites are larger than those usually found in the Netherland, and may have been especially made for the competetive fur trade in the New World.<162>

The archaeological record in Iroquoia corroborates

ethnohistoric accounts, which speak of copious shipments of pipes to the New World, and trade of same to the Five Nations. Α dispensation of 130 pipes to the Indians is known, for example, from Dutch records dating to 1639.<163> Johannes Megapolensis noted that, in 1641, deer were so plentiful, that they were sold by the Mohawks to the Dutch for a single tobacco pipe each. <164> Three years later we hear of smoking implements aboard the vessel "Rensselaerwyck, "<165> and, by 1657, it appears that over 17,000 sent to New Netherland pipes were in a single clay shipment. <166> After the English displaced the Dutch as the principal allies of the Iroquois, large dispensations of European pipes continued for more than a century (see Table 6.1).

The reasons for giving natives clay smoking devices, when Amerindians had many of their own, parallel those already delineated in the discussion of tobacco dispensations.<167> Pipes were often among the goods handed over to native peoples in the earliest European land "purchases" in the Northeast.<168> Among the more infamous were the 120 pipes and other goods exchanged for a parcel of land in New Jersey in 1677,<169> and the 300 pipes and miscellaneous trinkets offered in 1682 for a considerable portion of Pennsylvania.<170> More frequently, however, clay pipes were bartered in the fur trade,<171> or had the same role in the semiotics of culture contact as was played by tobacco.<172>

Predictably, the Hudson's Bay Company got in on the action, as is reflected in the numerous minutes, requisitions, indentures and cargo lists, which cite enormous quantities of pipes.(173) While not as perishable as tobacco, clay pipes were highly susceptible to defects and breakage, resulting in complaints from Company employees, that this trade good was often smashed in transit.(174) Yet, much like "Brazil" tobacco, smoking implements were a highly desirable commodity among native peoples, and, as James Isham rowarted from Fort York in 1739, they were essential if the Company wished to compete effectively with the French:

Pipes is great encouragement to Indians especially leading Indians, for when they come with a gang of Indians, we give them a pipe and pipe of tobacco, which they are extremely thankful for; but when they are broke so that we have not way withal to supply them, they make a great many words and say if they went to another place they would be better received (meaning your grand enemy the French), when at the same time it's not in my power to help them, only promising with good words they shall have them for the future, when at the same time it's precarious whether I can make my words qood or not, they being broke SO as aforementioned. This I do assure your honours is not the first time of being so, they being the same for some time, which I find is a disencouragement to Indians. <175>

By the late-eighteenth century, the British Indian Department had, for other reasons, gone to great lengths in supplying native residents of Upper Canada with tobacco pipes. Eventually, a British firm was commissioned to manufacture distinctive types intended specifically for distribution in Amerindian settlements, where they are now occasionally recovered during archaeological investigations.<176>

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#### miscellaneous accessories

Given the degree to which Amerindians consumed Nicotiana, and the demand for European pipes, traders surmised it might be profitable to introduce the smoking accessories and conveniences developed for the tobacco complex in Europe. It was not long before thousands of fancy tobacco or snuff boxes flooded native America. While these are frequently mentioned in ethnohistoric accounts,<177> they are only occasionally discovered in. archaeological contexts, <178> perhaps because they were often made from a thin, corrodible metal. Among the more spectacular specimens to have survived, is one recovered at the Susquehannock Byrd Leibhart Site, which, in addition to various baroque designs, depicted a bust of the Prince of Orange and the date 1634 in raised relief.<179> Remarkably, the lids of two absolutely identical boxes were discovered at the Seneca Dann site and at the Oneida Thurston site. <180> It remains unclear whether the Iroquois employed these boxes for the purpose originally intended for them.

Another item frequently traded to Amerindians was the tobacco tong, which was a kind of pincer used to transfer fire from a hearth to a pipe bowl. Although these are frequently listed in trade inventories, <181> Isham reported that they did not turn out to be a big hit in hudson's Bay territory:

Tobacco tongs lies useless in the factory, and few or none traded, for which reason I have sent them home, according to your honours' desire. The only reason I can give for the Indians dislike is they are of no service to them, but to take a piece of fire up with to light their pipe; but they take their knives to be more handy, not only so but for the most part they strike light to a piece of wood called (posoging) and so light their pipe with a piece, which is all the reason i can give for the dislike of the same.<182>

Undoubtedly more useful was the European technology that facilitated the lighting of pipes in a mobile hunting and gathering mode of subsistence. Alexander Mackenzie noted that his companion "lighted a bit of touch-wood with a burning-glass, in the cover of his tobacco-box, which so surprised the natives, that they exchanged the best of their otter skins for it."<183> In the 1750s Jean-Bernard Bossu bemused his Amerindian hosts with a feat rivaling the best shamanic performances of the country:

I met a rebellious party of Choctaws...they handed me a peace pipe, which I accepted on the condition that it be lighted with a new fire. This would mean that the past was forgotten and that our alliance would be renewed with the Choctaws, the children of the great chief of the French. To convince them that the past was really going to be forgotten, I said that the fire would light itself. I had with me a small phial of phosphorous that I had brought back from France during my last trip. I put some of this powder in the pipe, looked up at the sky, and uttered a few words to the Great Spirit. During this time, the powder, which had been exposed to the air, lit the tobacco. This surprised not only the Indians but also my French companions, who had never before seen an experiment performed with this powder. <184>

Strike-a-lights, burning glasses, tinder boxes and fire steels were soon valued trade commodities, and became standard equipment in native pouches.<185> Moreover, Mainfort's analysis of grave goods at an historic Indian cemetery in Michigan, suggests that a firestarting kit was the most basic symbolic indicator of adult male status.<186>

## D) The Calumet Complex

The literature on calumets, "peace pipes" and other aspects of highly formalized and institutionalized native pipe ceremonialism, is voluminous in both academic and public discourse. <187> While a synthesis of these sources was an outcome of the Amerindian Pipe/Tobacco/Smoking Project, and a comparative study of calumet ritual is currently underway, it is necessary here to address briefly those issues relating to contacts between natives and newcomers.

On perusing any sample of historic and ethnographic accounts which record the Amerindian use of tobacco, one gains the impression that all pipe-smoking groups formally institutionalized the habit in some way or another. What is often referred to as the "calumet" must, therefore, be envisioned as a symbolically-elaborated variation of a common theme--a variation that, much like the Plains medicine pipe, made the smoking implement the object of particularly intense religious and socio-political attention, and a theme that gives North American Indians a historical and spiritual unity. <188> Much confusion has resulted from a tendency to decontextualize the calumet complex and treat it as an isolated and bounded religious cult, that originated in one native group and eventually diffused throughout much of North America.



Frontispiece to Lewis Hennepin's A New Discovery of a Vast Country in America (1698), showing a ceremonial pipe being presented to European explorers. The French actively participated in the calumet complex, and often used the pipe to facilitate exploration, diplomacy, trade and proselytization.

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Scene showing Ottawa (Pontiac) smoking a ceremonial pipe with the English (Major Roberts) in 1763. Such pipes traded hands so many times during the eighteenth century, that it becomes difficult to ascertain whether they belonged to natives or newcomers.

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PLATE 6.8

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The "Dance of the Calumet of Peace" as illustrated in Le Page du Pratz's *Histoire De La Louisiane* (1758). In this, the most elaborate expression of pipe ceremonialism, the French were obliged to sit and watch attentively for hours and even days on end. Calumet protocol was sometimes so binding, that Europeans were forced to schedule their lives around the ritual.

### use of the term

The confusion has been exacerbated by the unique etymology of "calumet," as well as by changes in the meaning of the appelation throughout history. Unfortunately, most etymological reference works leave the impression that the term came into popular usage only after Marquette used it to describe the feathered, ritual pipe-stems of the Illinois and other tribes living in the Mississippi Valley in 1673. The Oxford English Dictionary does cite one earlier occurrence in the Jesuit Relations (dated 1638),<189> but this too, post-dates historic accounts in which it is used with some frequency.

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Calumet appears to have been a Norman corruption of the French chalumeau(x) (from Latin calamus, "reed")<190>. The latter was a single-reed, folk musical instrument that was popular in the late-sixteenth century, and that eventually served as the precursor of the clarinet.<191> It may surprise some readers that chalumeau was already used to describe Amerindian tobacco pipes in Urbain Chauveton's 1579 French translation of Benzoni's popular La Historia del Mondo Nuovo (Venice, 1565).<192> For Frenchmen, the peasant musical pipe may have been the most appropriate European analog for the curious tubular smoking devices used by "savages" to consume tobacco. <193> By the beginning of the seventeenth century, pippe and petunoir (from petun, "tobacco") became popular, while chalumeau was changed to calumet when referring to a smoking pipe with a reed or wood stem. The latter spelling occurs as early as 1609 in Marc

Lescarbot's Histoire de la Nouvelle France, <194> and again in Gabriel Sagard's Le Grand voyage du pays des Hurons (1632). <195> It was also used with regularity by Jesuit missionaries in New France throughout the first half of the seventeenth century, <196> which suggests that "calumet" was a common French name for an Iroquoian or Eastern Algonquian pipe, long before it was used to describe specific forms in the Mississippi Valley.

Despite this use of "calumet" as a generic rubric for a variety of pipes employed in various ceremonial contexts, its meaning became restricted to a highly elaborated, ritual object that was wielded during a native dance encountered by the French in the third quarter of the seventeenth century. James Springer summarizes the basic characteristics of the ceremony:

The core element of the Calumet Dance was the ritual pipe or calumet, which contained a stem decorated with eagle feathers and the skins of ducks and woodpeckers. A village would entertain and honor the visiting leader of a foreign tribe (or a group of Europeans) with a series of dances and songs, by sharing the smoke from the calumet, and by giving the calumet to the guest. It is important to note that the calumet rituals involved a complete pipe and the smoke from the pipe, not just the pipe stem as some have implied... The calumet was a seal or memorial to an agreement of peace and friendship and could even be presented to a newly encountered group as a sign of peaceful intentions. Some authors speak of a separate calumet for war. The calumet often had attributes suggestive of a weapon, and indeed the Calumet Dance frequently involved a mock combat.<197>

Ironically, Allouez, who in 1665-67 was the first Frenchman to leave an account of this particular Illinois "dance," used the term grande pipe, rather than "calumet" to describe the smoking device used.<198> It was only after Marquette's famous description,<199> that the term became inextricably associated

with the specific ritual. "This word," he wrote in 1673, "has become so much into use that, in order to be understood, I shall be obliged to use it, as I shall often have to mention these pipes."<200>

Marquette's account of the calumet not only changed the meaning of the term, but also left the impression that the ritual had solely religious and diplomatic functions. Citing evidence from other early sources (including Deliette, Joutel and Gravier), Springer points out that:

a substantial exchange of property, particularly pelts, occurred at the Calumet Dance. This trade was conducted as an exchange of gifts between prominent and wealthy men, rather than as outright purchase or barter. As in many societies, trade was surrounded with extensive etiquette and ceremony, and the occasions for trade and the choice of partners were not entirely at the discretion of the individuals involved. Nonetheless, the strictly material consequences were considerable and often provided the principal motivation... It is interesting to note that at least some Europeans immediately grasped the significance of the custom and that European individuals and their goods were integrated into the calumet trade. <201>

In other words, a ritual context existed in native culture that facilitated all the major objectives of European exploration, diplomacy and trade. As is suggested in the following chapter, the calumet even aided the challenging work of Jesuit proselytization.

#### European participation

The degree of European involvement with, and even exploitation of, the calumet has led some researchers to argue that the newcomers were primarily responsible for the spread or diffusion of the ritual.<202> While this has been overstated, there is, indeed, some evidence to suggest that Europeans stimulated an extant ceremonial complex.

This stimulation sometimes involved a manipulation of native In 1662-63, for example, Radisson and Groseilliers, symbolism. who had no ceremonial pipes of their own, took a Sioux calumet, removed the eagle feathers (replacing them with iron arrow points on ribbons), tied a steel sword along the shaft of the pipe, and returned the modified contraption to the original owners. As Robert Hall indicates, the explorers had employed a "metaphor in steel" to communicate the powerful message of the calumet. <203> In this case, the pipe served as an expression of military solidarity between natives and newcomers. But, when Du Luth returned two Siouan calumets in 1679, it was meant as a statement of extreme displeasure at the capture and detention of Louis Hennepin. <204>

"To honor their calumet" in 1687, Joutel gave the Arkansas a quantity of French colonial tobacco, which they immediately smoked with the usual reverence.<205> Early references alluding to the French practice of formally offering calumets to Amerindians are more numerous.<206> Such ritual smoking devices had often been given to Frenchmen by native peoples to ensure safe passage in hostile territory (see Plate 6.6).<207>

The English are also known to have routinely presented

calumets.<208> Jonathan Carver even felt it necessary to fix a "pipe of peace" at the head of his canoe.<209> By 1756 William Johnson had given "the largest pipe in America" to the Six Nations, with instructions to store it in the great Council Chamber at Onondaga (see also Plate 6.7).<210> The European stimulation of the ceremonial pipe complex reached its peak in the nineteenth century, when fur trading companies produced Siouan calumet bowls by the thousands.<211>

There is little doubt that European aggressiveness in commerce and diplomacy either directly or indirectly contributed to a continuation, and, perhaps, even an expansion of calumet ceremonialism. There is, however, not much evidence to suggest, as William Fenton does, <212> that the French were, "for reasons of personal inviolability," instrumental in an alleged diffusion of the calumet ceremony from the Great Lakes to Louisiana in the second half of the seventeenth century. <213> In recent articles, William Turnbaugh accepts Fenton's claim that it spread to most areas in relatively recent times, and argues that, with the increase in cultural disruption caused by European influence, the pipe and associated rituals underwent a florescence representing a nativistic response or revitalization movement.<214> Springer has, however, correctly observed that many descriptions of the Calumet Dance, in a variety of cultural contexts, were written by authors who were among the first Europeans to visit the tribes, suggesting that diffusion had occurred earlier and without help from the French. <215> Donald Blakeslee agrees that the calumet was present in both the western Great Lakes region and the Mississippi Valley before the arrival of French explorers. He provides additional evidence from the records of the Spanish Inquisition, that the calumet ceremony was already celebrated in 1634 by the Plains Apache (who probably received it from earlier Caddoan-speaking tribes), and attempts to trace the type of pipe bowl used in the ritual to at least 710 BP.<216> Efforts to find a symbolic link between prehistoric Hopewellian platform pipes and historic calumets have also been made by Hall.<217> An independent study, unknown to any of these researchers, was prepared by the German scholar Gertrude Hafner, who argued that the calumet was prehistorically related not only to Hopewell pipes of the Ohio Valley, but also to the Pawnee Hako and the prayer sticks of the Hopi-Pueblo. <218>

While the claim of Beauchamp, Wissler and Fenton, <219> that the typical calumet ceremony (of the eighteenth-century, central Algonquians) only diffused to Iroquoia in relatively late is corroborated by ethnohistoric records, historic times, archaeological evidence suggests that some type of ceremonial calumets were used by Iroquoians in prehistory. <220> Witthoft, Schoff and Wray believe that "formalized calumet procedures" were a prehistoric diffusion into the Northeast, and speak of an familiarity with the forms of <sup>\*</sup>Iroquoian prairie pipe ceremonialism. "<221> Evidence familiarity of this comes the discovery of disc-shaped calumets primarily from in prehistoric Iroquois graves.<222>

That calumet ceremonialism and related pipe rituals were

widespread in central and eastern North America long before apparent. Fenton European contact seems has tended to overemphasize, what he calls, "a vast difference" between the respective pipe complexes of various Amerindian groups.<223> Although the existence of local variations cannot be denied, one is struck by the fundamental similarities in pipe rituals through I have argued elsewhere, <224> that these time and space. similarities (which often involve very specific symbols) need not be a function of diffusion, but may be related to an ancient ideological substratum that resurfaces, or is expressed in various native cultures, without necessarily involving contact between the specific occurrences. Since pipe rituals arose from a belief system shared by all Amerindians in the New World, they became appropriate vehicles of communication in native culture contact.

One should recall, that since the transculturation of tobacco-smoking had already begun long before the period of intensive European involvement in calumet ceremonialism, Europeans were not confronted with an entirely new behavior. <225> As early as Elizabethan times, it was the usual custom in England to pass a pipe from person to person as a sign of hospitality.<226> By 1614 William Barclay exclaimed that "it is the only medicament in the world ordained by nature to entertaine good companie: inso much that it worketh never so well, as when it is given from man to man, as a pledge of friendshippe and amitie."<227> Although lacking the elaborated ritual context of native behavior, Europeans had an existing cultural predisposition that fit well into the communicative system of culture contact in the New World.

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At times, native pipe ceremonies were so elaborate that they became a nuisance for the newcomers. Bellomont described one in 1700 as "the greatest fatigue I ever underwent in my whole life."<228> Timberlake, who participated in a Cherokee ritual in 1762, even suffered from nicotine intoxication:

The harrangue being finished, several pipes were presented me by the headsmen, to take a whiff. This ceremony I could have waved, as smoaking was always very disagreeable to me; but as it was a token of their amity, and they might be offended if I did not comply, I put on the best face I was able, though I dared not even wipe the end of the pipe that came out of their mouths; which, considering their paint and dirtiness, are not of the most ragoutant, as the French term it... After I had performed my part with this, I was almost suffocated with the pipes presented me on every hand, which I dared not to decline. They might amount to about 170 or 180; which made me so sick, that I could not stir for several hours.<229>

Meanwhile, the French were obliged to schedule their life in Louisiana into three-day sequences, so binding was calumet protocol (see Plate 6.8).<230>

Yet, as a whole, the ritual pipe was not a serious imposition on either side, and was probably the most powerful and consistent vehicle for fostering understanding between natives and newcomers over a period of three centuries (see Table 6.2). Every time the pipe was shared (which was likely a much more frequent occurrence than Table 6.2 indicates), the line between "savagery" and "civilization" was eroded.

As non-perishable manifestations of the transculturation of smoking, pipes are valuable indicators of culture contact and influence. As is the case of tobacco, it is difficult to ascertain whether sharing pipes made a greater impact on natives or newcomers.

The Amerindian pipe complex of the eastern seaboard had been partially modified by already European metals and technology, and the English had begun manufacturing their own smoking implements, before the pipe routinely brought representatives of both cultures together under an official cloud of smoke. The two sides copied pipe styles from one another, and archaeological sites of the early Historic Period reveal a mishmash of indigenous, foreign and syncretic designs. Later, "Micmac," argillite, catlinite and other pipes were transferred back and forth across the boundaries of culture contact, so that it becomes an archaeological challenge to discover who was making and trading what to whom. Some types, originally conceived by Europeans, were produced by Amerindians, and then bought by Europeans as symbols of native ethnicity. While the newcomers collected native smoking devices, they distributed thousands of their own pipes and nicotian accessories throughout the North American Continent.

Meanwhile, both sides were engaged in formal pipe rituals, which functioned as lubricants in everything from diplomacy and trade to missionary work. Long before the term became associated with a particular Illinois "dance," the French recognized that the "calumet" was shared by many different native groups in eastern North America. Europeans became active participants in calumet ceremonialism, both receiving and offering the pipe on countless occasions.

The traditional, anthropological tendency to view Historic culture period contact as unilateral а process of "acculturation," has led many researchers to express surprise whenever evidence of continuity and persistence in Amerindian technology and beliefs is encountered. This is particularly true in the case of native pipes which, despite the near-total replacement of other material culture with European counterparts, continued to flourish in late historic times. <231> Given the positive nature of European participation in the Amerindian smoking complex, and the fortification of the complex throughout three centuries of culture contact, this should not seem surprising. Nevertheless, a general lack of consensus characterizes academic discussions about the causal factors which led to this deviation from wholesale acculturation.

One of the peculiarities of the native artifact sequence shared by archaeological sites attributed to the Seneca, Oneida and Onondaga, is the popularity of smoking devices in early prehistoric times; followed by a decline in the late prehistoric and early historic periods; and a resurgence after c1640.<232> A number of explanations have been offered to account for this unexpected phenomenon.

Following Charles Wray, Bradley suggests that the "decline in the occurrence of ceramic pipes during the late protohistoric period is probably related to the growing availability of metal tools which were used to carve wooden pipes."<233> This explanation postulates no major change resulting from European contact, and speaks only of a temporary switch to another material medium. It fails, however, to account for the later florescence of native ceramic pipes which apparently occurred despite the availability of European wood-working tools.

William Ritchie explains the increase in the number of ceramic pipes on Seneca sites after 1640 in the context of warfare. The "extensive adoption of captives during the Iroquois wars" is said to have brought pipes into the domain of the Seneca, who previously seemed "not to have been greatly inclined to the custom of smoking." <234> Pratt attributes the same florescence of native pipes in the Oneida sequence to "Dutch influence." <235> Both archaeologists have assumed that the frequency of pipes recovered is a reflection of the amount of "interest" in smoking and tobacco-use, and have all but ignored the fact that the Amerindian smoking complex was much more than its non-perishable expressions indicated.

William Turnbaugh, who has expended the most effort in tackling the question, offers a different explanation. In a series of articles, Turnbaugh argues that there was a native

(emic) distinction between ritual smoking, and "puffing for pleasure. "<236> As European trade brought white clay pipes and Nicotiana tabacum into the Northeast, "profane smoking was greatly increased," and "the higher meaning and dignity of the smoking pipe and its use were threatened. <237> In response to this situation, native peoples are said to have made efforts to revitalize "pious (as opposed to casual) smoking as ritual activity."<238> While Turnbaugh accepts Witthoft, Schoff and Wray's evidence for a prehistoric calumet-like ritualism in the Northeast, <239> he surmises that these "half-forgotten traditions" <240> did not germinate until, and as a response to, a sociocultural fragmentation caused by European contact.<241> This nativistic movement is said to have crystalized into a veritable "pipe cult."<242>

The research presented in this chapter and, indeed, throughout the present study, does not tend to support Turnbaugh's hypothesis. From the outset, it remains unclear whether western notions of "sacred" and "profane" are appropriate impositions on seventeenth-century Amerindian ideology. Be that it may, there is no contemporary, documentary evidence to as suggest that European contact led to a "secularization" of smoking in the first half of the seventeenth century, or that accounts of ubiquitous smoking among men, women and children represent conditions prevalent only after the widespread dispensation of nicotian products by Europeans. Nor is there evidence to support Turnbaugh's assertion that "many peoples of the Contact period shared the conviction that their native

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smoking instruments were endowed with a potency and symbolic introduced European pipes apparently prestige which the lacked. "<243> While there is no denying that ritual calumets were probably seen as a different class of objects than the disposable white clay pipes, it must be remembered that Europeans went to great lengths to produce and trade native-style smoking devices. For their part, Amerindians sometimes copied European pipes, and added foreign metals in the manufacturing process, apparently for both technological and symbolic reasons. Moreover, European nicotian products became essential ingredients in the socio-political formalities of culture contact, and were incorporated into native ritual paraphernalia.<244>

important to recognize that the decline in ceramic It is pipes apparent in the Iroquois archaeological sequence, occurred years before Europeans had access to the quantity of tobacco and smoking devices that would have been necessary to make any impact If the florescence of ceramic pipe on native consumption. manufacture in the mid-seventeenth century reflects an actual increase in smoking, and does not merely indicate a technological shift, then it is certainly not a nativistic response to European In point of fact, the chronology suggests that the incursion. pipes of natives and newcomers increased in tandem. Indeed, ceremonial pipe smoking, perhaps more than any other Amerindian received widespread fortification in the historic activity, The traditional models of acculturation period. and revitalization must, in this instance, be replaced with the notion of transculturation, in which the pipe/tobacco/smoking

complex of both natives and newcomers, mingle to become part of the same historical trajectory.<245>

It is, perhaps, unwise to use the presence or absence of European goods recovered on archaeological sites as a measure of native "acculturation," particularly in cases where such goods have symbolically-charged analogs in native life. As Hamell has argued with crystals and trade beads,<246> prehistoric symbolism was sometimes transferred to European material culture in surprisingly consistent ways.

Another cautionary tale comes from Fred Miller's fascinating dissertation on tobacco and smoking phenomena in the Sun Dance Religion of the Crow Indians of Montana.<247> Miller points out that, through a process of selective assimilation, cigarettes have effectively replaced native pipes without any major disruption of ritual behavior, and without the concomitant practices and values associated with western smoking:

At first impress it is rather puzzling that commercial cigarettes, the product of the non-native civilization would play such a profound role in a religious complex explicitly identified by the Crow as being traditional nature. Given the circumstances of the in appropriation of the practice of smoking by peoples of European descent and the blatant disregard of the religious dimensions of the practice by these peoples, it seems quite inappropriate for the Crow to utilize these products in ceremonial settings. Indeed, one might even go further and assert that this use of commercial cigarettes actually undermines the values of the native culture. That is, as cigarettes, a symbol of the dominant culture, replace pipes, a strong symbol of the native culture, in native rituals, is not a definite erosion of the native value system necessarily entailed? Interestingly enough, the answer to this question in the context of the Crow Sun Dance is "no." How then are we to understand this transition as

# anything other than a severe case of cultural depletion?<248>

Miller answers this question by alluding to the importance of tobacco in Crow ritual and to the transcendence of relationships and contexts over the origin and form of the plant used.<249>

There is no reason to suppose that the situation in the seventeenth-century Northeast was any different. In fact, if ritual smoking can survive among the Crow, despite the almost-complete loss of traditional smoking paraphernalia,<250> why should the Iroquois have suddenly felt the need to revitalize a tradition that was never threatened in the first place? Furthermore, pipes and tobacco were often exchanged between various Amerindian groups, and incorporated into ritual life without any apparent loss in value due to their "foreign" origin.

Martha Latta has attempted to demonstrate a statistical correlation between the presence of European trade goods, and certain types of native pipes found on Huron sites.<251> The manufacture of effigy pipes depicting guardian spirits is said to have been "an early aspect of acculturation," and she asks whether the practice of seeking such spirits may only have been adopted after European contact. "It seems likely," she concludes, "that the Huron altered their traditional representations of guardian spirits in imitation of other Iroquois groups which were more successful at trade and This explanation envisions Huron warfare. "<252> religion as being somewhat fickle, and profoundly underestimates the

antiquity, consistency and persistence of native ideology in the face of infrastructural change.

Another recent researcher who has employed the acculturation model to explain the alleged florescence of Iroquoian ceramic pipes in the period of European contact, is Zena Pearlstone Mathews. Mathews dismisses one of Latta's other hypotheses (that an increase in wealth and/or leisure time were primary factors contributing to the elaboration of Huron pipes) (253) and argues that "the most immediate impact of contact was not trade but disease."(254) What particularly impresses the author, is the elaboration of human effigy pipes depicting shamanistic features. These, she suggests, reflect an Iroquoian response to the traumatic changes brought about by the introduction of European diseases such as measles and smallpox.(255)

Mathews' explanation is based on the traditional view of shamanism as a medical treatment requiring a curing specialist, rather than as a Weltanschauung dealing with all aspects of native life, and involving all communication and relationships between humans, nature and the supernatural. When effigy pipes are contextualized in the broader realm of Iroquoian ideology, there is no reason to attribute the occurrence of shamanistic features to specific epidemiological phenomena.<256> More importantly, Mathews has not been able to provide adequate statistical, distributional and chronological data to support the premise that the elaboration of effigy pipes was a response to culture contact. Trigger notes the recovery of numerous pipes on prehistoric sites, and suggests that what happened in the historic period was "the florescence of an already dynamic tradition, rather than any radical departure from it."<257>

While the impact of European contact on the Amerindian pipe complex remains controversial and requires further study, it seems beyond question that sharing the pipe with the newcomers did **not** lead to an undermining of native culture. In fact, European participation in the ceremonial pipe complex may have feedback effect, had а helping to reinforce native traditions.<258> This fortification complemented the widespread distribution of nicotian products in the fur trade. For the newcomers, the real impact was to come later when, far removed from the immediacy of colonial diplomacy and trade, the significance of sharing the pipe with savages was realized.

TABLE 6.1 Selective List of European Dispensations of White Clay Pipes to Amerindians

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DATE	FROM	<u>T0</u>	QUANTITY REF.
1605	G. Waymouth and J. Rosier	Penobscot	unspec. <259>
1639	Dutch officials	Indians	130 <260>
1652-64	W. Pynchon	New England Algonquians	2,147 <261>
1671-1900	HBC	many groups via Cree, Ojibwa, Assiniboine	thousands<262>
1677	Lewis Dubois	Esopus	l schepel<263> (120-125)
1682	H. Coursey and P. Lloyd	Mahican, Esopus and Munsee	3 dozen <264> (36)
1682	H. Coursey and P. Lloyd	Five Nations	unspec. <265>
1682	William Penn	Indians	2 barrels<266> (300)
1692	R. Ingoldsby	Five Nations	6 gross <267> (864)
1693	Gov. B. Fletcher	Five Nations	5 1/2 gr.<268> (792)
1696	Gov. B. Fletcher	Five Nations	2 gross <269> (288)
1696	King William III	Five Nations	1 gross <270> (144)
1700	Gov. R.C. Earl of Bellomont	Five Nations	3 barrels<271>
1700	Gov. R.C. Earl of Bellomont	"River Indians"	l cask <272>
1702	Lord Cornbury	"Far Indians"	unspec. <273>
1702	Lord Cornbury	Five Nations	1 cask <274>
1702	Lord Cornbury	"River Indians"	1/2 barrel<275>

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1711	Robert Hunter	Skaahkook Indians	2 per Indian	<276>
1711	Robert Hunter	Five Nations	unspec.	<277>
1711	Queen Anne	Senecas, Mohawks	3 gross each Nation (864)	<278>
1711	Queen Anne	Cayugas, Oneidas and Onondagas	2 gross each Nation (864)	<279>
1714	Robert Hunter	Five Nations	l cask	<280>
1729	?	Conestogas	unspec.	<281>
1732	English	Delaware	400	<282>
1742	Gov. G. Thomas	Six Nations	1,000	<283>
1744	Governor	Six Nations	unspec.	<284>
1748	Conrad Weiser	Seneca	2	<285>
1749	James Hamilton	Ohio Indians	unspec.	<286>
1756	William Johnson	Mohawks	unspec.	<287>
1756	William Johnson	River Indians	unspec.	<288>
1756	William Johnson	Onondaga	unspec.	<289>
1756	William Johnson	Delaware	unspec.	<290>
1756	William Johnson	Tuscaroras and Senecas	unspec.	<291>
1756	William Johnson	Oneidas	unspec.	<292>
1757	William Johnson	"Shawanese, Nantikokes, Mohickanders"	unspec.	<293>
1757	William Johnson	Senecas, Onondagas	unspec.	<294>
1768	William Johnson	Six Nations	unspec.	<295>
1768	William Johnson	Onondagas	unspec.	<296>
1770	William Johnson	Six Nations and others	unspec.	<297>

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1773	William Johnson	Six Nations	unspec.	<298>
1773-1821	NWCo	Indians	thousands	\$<299>
1774	William Johnson	Six Nations	unspec.	<300>
1774	Col. Guy Johnson	Six Nations	unspec.	<301>
1775	Col. Guy Johnson	Six Nations	unspec.	<b>&lt;</b> 302>
1775	Col. Guy Johnson	Cayuga and Susquehannock	unspec.	<b>&lt;</b> 303>
c.1790- c.1840	British Indian Dept	. Indians of Upper Canada	unspec.	<304>
1797	Thomas Morris	Senecas	unspec.	<305>
1799	Steiner and Scheinitz	Cherokees	unspec.	<b>&lt;</b> 306>
1819-20	Dougherty	Missouri	1	<307>
1832-34	Laidlaw	Teton Sioux	unspec.	<308>
1833-34	Townsend	"Bannecks"	1	<309>
1845-46	Palmer	?	unspec.	<310>

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# TABLE 6.2 Selective List of European Involvement in Amerindian Pipe or Calumet Ceremonies

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DATE	PARTICIPANTS	REF.
1603	Champlain, Gravé du Pont, Montagnais	<b>&lt;311&gt;</b>
1605	Rosier, Waymouth, Penobscot	<312>
1607	Newport, Percy, Virginia Algonquians	<313>
1613	Champlain, Kichesipirini	<314>
1614	Parker, Powhatan	<315>
1621	Bradford, Winslow, Pokanoket	<316>
1645	French, Iroquois	<317>
1660	Romero, Plains Apache	<318>
1661-62	Radisson, Groseilliers, Sioux	<319>
1665-99	Perrot, Menominee, Miami, Outagamis and others	<320>
1670	Frontenac, Iroquois	<321>
1671-1900	Hudson's Bay Company traders, Subarctic Indians	<322>
1673	Jolliet, Marquette, Illinois and others	<b>&lt;323&gt;</b>
1680	Du Luth, Sioux	<324>
1680	La Salle, Tonty, Illinois	<325>
1682	La Salle, Arkansas, Natchez	<326>
1684	La Barre, Iroquois	<327>
1687	Joutel, Cavelier, Arkansas, Cahinnio and others	<328>
1688	Tonty, Arkansas	<329>
1689	Lahontan, Sauk, Potawatomi, Menominee, Fox	<330>
1690	Perrot, Wisconsin Indians	<b>&lt;331&gt;</b>
1696-97	Frontenac, Fox	<332>
1698	Tonty, Mississippi tribes	<b>&lt;333&gt;</b>
1698	St. Cosme, Tonty, Kappas (Arkansas)	<334>

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1700	Du Ru, D'Iberville, Natchez	<335>
1700	Bellomont, Five Nations Iroquois	<336>
1701	Callieres, many Amerindian groups	<337>
1710	English, "Uttawawas"	<338>
1712	Governor at Philadelphia, Delaware	<339>
1715	Governor at Philadelphia, Delaware	<340>
1715	Espinosa, Tejas	<341>
1723	Albany officials, western Indians	<342>
1730	Marin, Winnebago	<343>
1740	French, Chicasaws	<344>
1741 ·	Behring, Tschirikow and West Coast Indians	<345>
1741	Governor of New York, Cherokee	<346>
1742	Beauharnois, "Ouyatanons and Petilokias"	<347>
1745	Moravians, Onondaga	<348>
1747-48	French, Miamis	<349>
1751-62	Bossu, Arkansas	<350>
1752	French, Fox, Sioux, Sauk, Potawatomi and others	<351>
1752	Virginia officials, various Indian nations	<352>
1753	Moravians, Six Nations	<353>
1755-59	James Smith, Iroquois	<354>
1756	Johnson, Six Nations	<355>
1757	Johnson, Cherokees, Iroquois	<356>
1758-59	Moravians, Cherokees	<b>&lt;357&gt;</b>
1760	Croghan, Ottawa and other Indians	<358>
1761-62	Timberlake, Cherokees	<b>&lt;</b> 359>
1761	Henry (the elder), "Chipeways"	<360>
1763	Roberts, Ottawa	<361>
1764	Henry (the elder), "Chipeways"	<362>

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1765	French, Kickapoos, Musquattamies	<b>&lt;</b> 363>
1765-66	English, Indians	<364>
1766	Johnson, Pontiac and other Indians	<365>
1766	Moravians, Onondagas	<366>
1766-68	Carver, "Chipeways" and others	<367>
1768	Johnson, Cherokees	<b>&lt;</b> 368>
1770	Johnson, Six Nations	<369>
1773-74	Pond, Sioux	<370>
1773-74	Bartram, Indians	<b>&lt;</b> 371>
1775	English colonial officials, Six Nations	<b>&lt;</b> 372>
1776	Henry (the elder), Assiniboines	<373>
1784	T. Dalton, "Piankashaws"	<b>&lt;</b> 374>
1794	Spanish envoy, Great Lakes Indians	<b>&lt;</b> 375>
1796	Mackay, Indians	<b>&lt;</b> 376>
1804	Lewis, Clark, Sioux	<b>&lt;</b> 377>
1809-11	Bradbury, Sioux	<378>
1810-13	Ross, western Indians	<b>&lt;</b> 379>
1811	Brackenridge, Osage	<380>
1819-20	Long, Pawnee, Omaha, Cheyennes, and others	<381>
1820	Faux, Otto	<382>
1820	Franklin, Cree	<383>
1823	Long, Indians	<384>
1824-30	Pattie, Commanche and others	<385>
1831-39	Cregg, Mason, Prairie Indians	<386>
1832-34	Maximilian of Wied, Puncas, Sioux, and others	<387>
1833-34	Townsend, Otto, Snake	<388>
1838-42	De Smet, Omaha, Sioux, Cheyennes and others	` <b>&lt;</b> 389>
1845-46	Palmer, Indians	<390>

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1846	De Smet, Blackfeet	<391>
1850-53	President Fillmore, Senator Briggs, Indians	<392>
<u>1851</u>	De Smet, 10,000 Indians of different tribes	<393>
1852	Johnston, Chippewa, Sioux	<394>
1867	American General, Arapahoes	<395>

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CHAPTER SEVEN SMOKING PROSELYTIZERS: TOBACCO IN THE QUEST FOR AMERINDIAN SOULS

Unlike Amerindian ideology in which even mundane, every-day activities had profound shamanic connotations, the European Weltanschauung, even during the Renaissance, drew a comparatively greater distinction between secular and religious life. For this reason the men who sought a harvest of furs and tobacco in the New World, did not always behave the same way as those who sought a harvest of souls. Thus far, efforts have been made to understand what impact the transculturation of tobacco had on explorers, traders and colonists, and on various relationships in intersocietal exchange. The impact on missionaries who, as Axtell suggests, "were expected to build their spiritual edifices on the inroads made by copper pots, wool blankets, and glass beads, "<1> has not yet been considered. The importance of missionaries, whose role in the "invasion within" had great relevance in the history of colonial North America, <2> is matched by their prodigious literary output, which constitutes the bulk of early accounts on the New World.<3> It is to their work that one must turn in a continuing attempt to illuminate the place of tobacco in Euro-Amerindian culture contact. This first requires an understanding of how the ecclesiastical establishment, as a separate interest group, reacted to, and felt about, the strange and ambiguous Amerindian weed.

#### A) THE IDEOLOGICAL BACKDROP

Chapter Two documented the plethora of seventeenth- century works on tobacco which offered antithetical views on the status of Nicotiana as either a medical panacea or a baneful recreation. No less was the ambivalence of the clergy, whose arguments, clothed in religious rhetoric, fell along a continuum between two powerful images: tobacco as a gift from God and tobacco as a deceit of the Devil. Since there was no precedent for smoking and snuffing behavior in the entire history of Western theology, ecclesiastical scholars were being asked embarrassing new questions for which neither the Bible, nor the voluminous writings of theologians from Aquinas to Zwingli, seemed to have The fuss made over the plant and associated habit in answers. the Church throughout the three centuries following the Spanish discovery of the New World, could only be described as unbelievable, were it not for the considerable evidence at the disposal of researchers.<4>

# the devil's smoking gun

The context in which a new and unfamiliar phenomenon was originally found often forms the springboard for a gut reaction towards it. That tobacco was a gift from the savages of the New World was still fresh on the early seventeenth-century European mind. That these savage smokers were "godless pagans" who, on good authority, were devil-worshippers,<5> was also not to be forgotten. Advocates of the new panacea were already suffering from a handicap that would not have existed had the plant been

discovered as a stray weed in the Vatican garden.

Opponents were quick to affirm and exploit the connection godlessness and diabolic practices.<6> with savagery, An intellectual distrust of native customs, <7> together with the the characteristics of idea that Amerindians acquired the nourishment they consumed, <8> contributed to the notion of satanic involvement in smoking. Indians enjoyed breathing smoke, therefore they must have conspired with the Devil. Tobacco was related to the foul-smelling henbane of witchcraft notoriety, and therefore must have been part of a diabolic plot to trick Christians.<9>

These ideas were given homiletic expression through visual images, such as pictures showing wraiths smoking in hell,<10> pulpit, and a great sermons from the deal of published discussion. In the late-sixteenth century, orthodox Anglicans brought evidence against atheists by alluding to the practice of tearing leaves from Bibles to dry tobacco on. <11> Testimony given at the so-called 'Baines libel' of 1593 accused an atheist of having proclaimed "that if Christ would have instituted the sacrament with more ceremoniall Reverence it would have bin had in more admiration, that it would have bin much better being administered in a Tobacco pipe."<12> The reputation of pipes and tobacco was further degraded when they became associated with seventeenth-century brothel-houses.<13>

Philaretes, in his Work for Chimny-sweepers (London,

1602),<14> denounced tobacco, for "the first author and finder hereof was the Divell, and the first practisers of the same were the Divells Priests, and therefore not to be used of us Christians."<15> A Counterblaste to Tobacco (London, 1604)<16> by the King of England, asked a series of rhetorical questions which make it evident that, by "Divells Priests," Philaretes and others were referring to the American savage:

And now good Countrey men let us (I pray you) consider, what honour or policie can moove us to imitate the barbarous and beastly maners of the wilde, godlesse, and slavish Indians, especially in so vile and stinking a custome? ...shall we, I say, without blushing, abase our selves so farre, as to imitate these beastly Indians, slaves to the Spaniards, refuse to the world, and as yet aliens to the holy Covenant of God? Why doe we not as well imitate them in walking naked as they doe? in preferring glasses, feathers, and such toyes, to golde and precious stones, as they do? yea why do we not denie God and adore the Devill, as they doe?

At the Oxford tobacco debate of 1605 a scholar boldly proposed that English doctors might learn proper smoking techniques from shamans in the Indies. King James, who participated in the proceedings, suggested that such Englishmen should indeed be relegated to the New World, "where, too far away to contaminate and disgust our countrymen, they could freely become intoxicated (with tobacco), mixing with those inebriate physicians (Indians), and there henceforth practise their art." <18>

Similar themes emerged in continental Europe. Swiss theologians labeled the plant **Teufelskraut** ("devil's weed"),<19> the French historian, Sorel, called it "the dessert of the devil,"<20> and the Greek Church promulgated a tradition that it was tobacco smoke with which Satan had intoxicated Noah.<21>

Many Spaniards were entirely convinced that the Amerindian weed was the work of Lucifer's wickedness.<22> Francisco de Quevedo bluntly stated that "tobacco addicts are like Lutherans: if they take it in smoke, they are serving their apprenticeship in hell."<23>

#### "nature doth nothing in vaine"

The competing image was promoted by those who were convinced of the medicinal efficacy of tobacco and wished to associate the new panacea with the omnipotent and omniscient deity of Christendom. These promoters naturally down-played the notion that the plant and habit had been presented to Europeans by "savages," and left the impression that Nicotiana had been simply discovered as part of a God-given, natural environment.

In 1561 (one year after Nicot's celebrated introduction of tobacco into France) the Cardinal Prospero di Santa Croce imported N. tabacum from Lisbon into Italy. The Pope himself is said to have ordered the seeds to be planted in the Vatican garden, where the new plant became known as Herba di Santa Croce in honor of the donor.<24> Throughout most of Europe there was, at this time, no clerical disapproval of the use of tobacco, and, as has been noted, it was regarded primarily as a medical plant.<25>

Not long after the introduction of Herba di Santa Croce, Leonardo Fioravanti wrote (in Della Fisica, Venice, 1582)<26> that "everyone should make use of tobacco, since it is the plant which has been revealed in this century for human health through In A Defence of Tabacco (London, the goodness of God. "<27> 1602)<28> Roger Marbecke argued that "it were a more charitable motion, to thinke that it came from God, who is the author of all good gifts, then from the divell. "<29> Edmund Gardiner (The Triall of Tabacco, London, 1610)<30> agreed and proclaimed it "certaine that the divell did not finde it, but nature gave it, and Nature doth nothing in vaine."<31> "God honoured America," wrote William Barclay (Nepenthes, of the Vertues of Tabacco, Edinburgh, 1614), <32> and blessed it by this wonderful and sacred plant. <33> Advice given by Nathanael Cole in Preservatives against Sinne (London, 1618), <34> suggested that, when not abused to intemperance, tobacco could be employed without hindering While attacking the excesses of smoking, God's service.<35> Adrian de Rocquiqny (La Muse Chrestienne, London, 1634) <36> also admitted that moderate use of petun aided nature.<37> Even the popular comedy Dom Juan by the great French playwright Molière, contains a line in which tobacco is said to exhilarate and purge human brains, and to "train the mind to virtue." <38> Von Hohberg and Gerhard's illustrated rendition of the Psalms (Lust-Und Artzeney-Garten, Regensburg, 1675)<39> elevated the notion that tobacco was a God-given gift for the benefit of body and soul to astonishing heights (see Plate 7.1).<40> In this work Psalm 62 is illustrated by an engraving of the tobacco plant with the caption "Heil aller Welt" (roughly "salvation of the world"). <41>

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Tobacco plant used as illustration for Psalm 62 in Hohberg and Gerhard's Lust-Und Artzeney-Garten (1675). Promoters of Nicotiana as a panacea often stressed that the plant was a gift from God for the benefit of mankind. In this case, Taback was labeled "salvation of the world" and was offered as a symbol of God's omniscience, for "whoever places his hopes in God has found the true salvation of the whole world."

The result of all this panegyric literature alluding to the discovery of a hitherto unrevealed gift from God, was to seriously undermine the vitriolic diatribes offered by those defending the deceit-of-the-devil hypothesis. As many came to the conclusion that the weed was a creation of God, it was argued that priests should be permitted to enjoy the salubrious benefits of the substance,<42> and, soon, some types of tobacco-use were associated in the popular mind with the clergy.<43>

# ecclesiastical smokers and snuffers

While churchmen of all denominations were great patrons of snuff, the Roman Catholic clergy became notorious for indulging St. Peter's in the habit, causing and other venerable to echo with the institutions sounds of sneezing and spitting.<44> It was reasoned that snuffing was less obtrusive than smoking since a discrete pinch could be obtained during the performance of **Pivine** Service from jewelled snuff-boxes conveniently placed on the altar. <45> This abuse had become so as Dickson observes, great that, "even during mass the communicants defiled the floor of the Church with tobacco and caused a disagreeable odor. "<46> By the early eighteenth century it is said that "no French Abbé was without his box".<47> The extent of the problem is graphically illustrated in a report, found in A. Vitagliani's De abusu tabaci (Rome, 1650), <48> of an incident at Capocelere (Kingdom of Naples) in the first half of the seventeenth century. As Corti summarizes, "one Sunday a priest who was celebrating Mass took a pinch of sauff just after

receiving Holy Communion; the fit of sneezing that ensued caused him to vomit, and throw up the Blessed Sacrament on to the altar in sight of the congregation. "<49> During this eructation of the consecrated host, the faithful are said to have wept.<50>

The Supreme pontiff of the Western Church had just about enough of this unsavoury affair, and, in an effort to preserve ecclesiastical discipline and rid the altars and floors of tobacco and spittle, Urban VIII (Pope from 1623 to 1644) issued a Bull against the practice in 1642.<51>

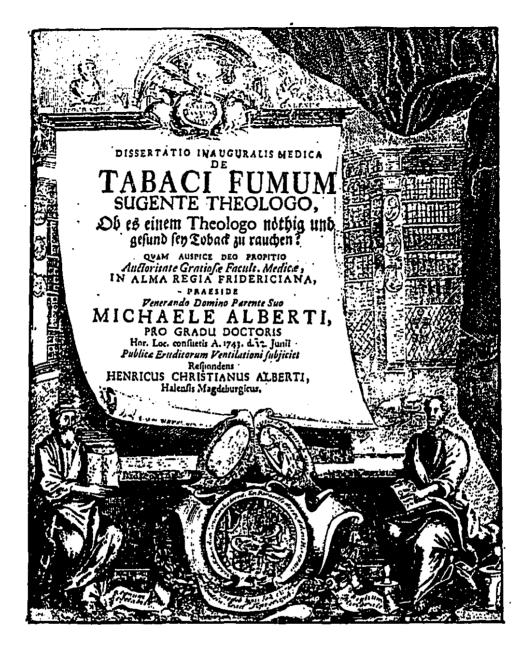
...the use of the herb commonly called tobacco has gained so strong a hold on persons of both sexes, yea, even priests and clerics, that--we blush to state--during the actual celebration of Holy Mass, they do not shrick from taking tobacco through the mouth or nostriis, thus soiling the alter linen and infecting the churches with its noxious fumes, sacrilegiously and to the great scandal of the pious... $\langle 52 \rangle$ 

The papal interdiction went on to "forbid, all generally and each in particular, persons of either sex, seculars, ecclesiastics, every religious order, and all those forming a portion of any religious institution whatsoever, to take tobacco in the future in the porches or interiors of the churches whether by chewing, smoking, or inhaling it in the form of powder--in short, to use it in any shape or form whatsoever. "<53> Perhaps because the Bull named the archdiocese of Seville as the most serious offender, it had little impact in other areas of Europe. Moreover, a special clause created a loophole through which "certain high personages were exempted,"<54> and the Bull became virtually ineffective. One gains the impression that the Church of Rome was ambivalent towards the habit and only acted if

excessive misuse affected liturgical etiquette.<55>

The church floors continued to be defiled with spittle, and the next pontiff, Innocent X (1644-1655), was forced to issue a second Bull in 1650 in which St. Peter's in Rome was singled out as the irreverent violator.<56> His successor, Pope Alexander VII (1655-1667), chose to ignore the persistent problem, imposing instead, a monetary penalty on every pound of tobacco imported or grown in the Papal States. <57> In 1657 he granted a monopoly of manufacturing the plant to the Jews of Ferrara. <58> In 1678 Pope Innocent XI (1676-1689) ordered that priests be suspended if caught consuming tobacco before celebrating mass.<59> That this had little effect is evidenced by the threat of excommunication to all who smoked or snuffed in church by Pope Innocent XII (1691-1700) in 1694.<60> Pope Clement XI (1700-1721) once again needed officially to forbid tobacco in St. Peter's at Rome, <61> although Benedict XIII later revoked the penalty of excommunication and annulled all edicts against tobacco since, he, himself, apparently enjoyed the habit. <62> Penn's claim that "most Popes found pleasure in the nose-refreshing weed"<63> is clearly an exaggeration, though Pius IX, who is known for the longest pontificate in history (1846-1878), apparently smoked. while Leo XIII (1878-1903) took snuff.<64> The addiction of high Church officials and the frequency of papal prohibitions suggests the futility of eradicating the habit in the ecclesiastical establishment.<65> By 1779 Rome had opened a tobacco factory and issued permits for the manufacturing of cigars.<66>

PLATE 7.2



Title of inaugural medical dissertation on the smoking of tobacco by the theologian. It was presented in 1743 by Henry Christian Alberti for consideration by a thesis committee headed by his father, Michaele Alberti. This was one of many learned inquiries into a habit that lacked any precedential theological discussion in the period prior to the sixteenth and seventeenth-century transculturation of tobacco.

PLATE 7.3



Figure A is a scene of a smoking bout in an early seventeenthcentury *Tabagie*. An anthropoidal creature is shown puffing on two pipes (centre) while a sick smoker vomits on the floor (lower right). A juvenile is also throwing up a liquid which is immediately lapped up by a passing dog (lower left). Figure B is a handbill from 1640 showing an individual retching from excessive smoking. Figure C is the title-page of Hornby's *The Scourge of Drunkennes* (1618) showing a beast-like creature smoking. Such digusting and frightening images were evoked by those who wished to associate tobacco-use with the defilement of body and soul.

## theological ruminations

Ecclesiastical dispute over tobacco may have been partly prompted by theological considerations regarding the tangibility of smoke. As ardent peripatetics the Jesuits and other religious Orders likely followed Aristotle's argument that nourishment had to be a tangible substance. If smoking or snuffing were considered nutritious, should, for example, these practices be permitted during Lent, and did they not violate the conditions of the pre-communion fast?<67> In his Chocolate Y Tabaco (Madrid, 1642), <68> Tomas Hurtado, a professor of theology at the University of Seville, pondered the question in some depth, and concluded that tobacco did not break the ecclesiastical or natural fast in such a way that it interfered with the sacred The problem was again raised, in 1668, in a guide communion.<69> for Catholic missionary priests in South America, <70> and, by 1703, the Vicar General of Padua argued that tobacco did break the fast after all and could not be taken before communion and the celebration of the Mass.<71> After he completed his inaugural medical dissertation on De Tabaci Fumum Sugente **Theologo** (Halle-Magdeburg, 1743),<72> Henry Christian Alberti was convinced that, since theologians and minsters of the church used their voices considerably and suffered the same bodily afflictions (catarrh, asthma, etc.) as the laity, they should be permitted to share in the "medical aid of tobacco" (see Plate 7.2).<73>

It may be assumed that other theological dilemmas caused by

the transculturation of the Amerindian plant and habit must have arisen, particularly when we recall European notions of the body and its relation to extra-corporeal substances. Unlike food and drink, the residues of which were later privately excreted from the body through entirely different and unmentionable orifices, tobacco usually came out the same way it came in--and this immediately and indiscretely for all to see. The many who consumed tobacco during the seventeenth century frequently exhaled through the nose, and coughed, sneezed, spit, vomited or otherwise expectorated a variety of glutinous liquids and air-borne particulates (see Plate 7.3).<74> As Mary Douglas suggested, <75> and many other symbolic anthropologists have affirmed, bodily exuviae, such as urine, faeces, spittle and nail clippings, traverse corporeal boundaries and hence are powerful ingredients for institutionalized taboos. Perhaps this is best illustrated by citing the Biblical grounds given by the Russian Church for prohibiting tobacco-use: "it is not that which entereth into a man that defileth him, but that which proceedeth from him. <<76>

Yet another moral issue that needed to be overcome by ecclesiastical proponents of the new panacea, involved rumors that it served as an aphrodisiac. Where this notion originated is anyone's guess, though, as in the case of the devil hypothesis, it probably resulted from associations with the context in which tobacco was originally discovered. While in Virginia in 1611 William Strachey observed that "those Indians which have one, twoo or more women take much (tobacco) but such

have as yet no appropriate woman take little or none at as all."<77> This cryptic passage has been taken to imply that, among Amerindians, promiscuity was related to tobacco-use.<78> is a recent interpretation, and it seems doubtful that This Strachey's unpublished text had any effect on seventeenth-century ideology. The rumors may have been initiated or fortified by colonizers who explained the alleged ardency of native Nicaraguan women, by citing their addiction to cigar-smoking. <79> On the other hand, several botanists had already related Nicotiana to satyrium, a plant that ostensibly excited lust, <80> and tobacco was a common ingredient in love philters. <81> An association with the fires of sexuality persisted as late as the nineteenth century when Orson S. Fowler claimed that

the feverish state of the system which it produces necessarily causes a craving and lustful exercise of amativeness. Just as alcoholic liquors cause such and for the same amatory cravings, reason. As alcoholic liquors and the grosser forms of sensuality are twin sisters, so tobacco-eating and deviltry are both one; because the fierce passions of many tobacco chewers, as regards the other sex, are immensely increased by the fires kindled in their systems, and of course in their cerebellums, by tobacco excitement. Ye who would be pure in your love-instinct, cast this sensualizing fire from you.<82>

Had such apocryphal pronouncements been embedded in religious doctrine to the degree that the tobacco-as-panacea idea became part of the medical paradigm, it would have meant serious trouble for the addicted clergy. Fortunately for the latter, a competing myth was to receive more general acceptance: the belief that tobacco produces sterility and depresses sexual impulses.<83> "The sperm and seed of man," Philaretes exclaimed, was "greatly altered and decayed" in heavy smokers.<84> Sir William Vaughan, the promoter of the Newfoundland colony, was less than enthusiastic about the new found panacea:

Tobacco that outlandish weed Doth spend the brain and spoile the seed. It dulls the spright, it dimmes the sight, It robs a woman of her right.<85>

Two hundred years later writers were still deferring to tobacco as "a considerable population check," and that it should be introduced "to the notice of our Malthusians."<86>

While this dubious reputation prompted repressive legislation (particularly in the Ottoman Empire, where monarchs wished to maintain the virility of the populace), <87> it provided clergy on the Catholic Church a wonderful the celibate justification for their smoking and snuffing addiction. <88> Indeed, as Corti notes, one of the principal excuses for the startling spread of tobacco-use among Catholic priests, was that they "found it a safequard for the chastity to which they were vowed; smoking expelled the humours from the brain and body, with the result that smokers were less liable than others to the temptations of the flesh. (89) Throughout the seventeenth century we find indications of the belief that tobacco repressed sensual emotions, restrained carnal desires and kept priests alert for prayers and other holy duties. <90> Acceptance of this idea by a suspicious papacy cleared the way for heavy smokers literally to become saints. The most famous case involved the (1603-1663), Franciscan Joseph Desa of Cupertino whose beatification and canonization were first opposed, and then partly facilitated by his notoriety as a chastity-seeking snuff
addict.<91>

The same weed, obtained in a land of savagery and defiling the altar linens of European cathedrals, could also lead men to good health and even sainthood. These contradictions were to prove particularly troublesome as they became part of the ideological baggage carried by missionaries to the New World.

## ambivalence in the Latin American missions

The notion that native shamans were "Devills Priests," and that consequently tobacco-use had diabolic connotations, originated with, and was popularized by, the sixteenth-century chroniclers of contact between Europeans and the indigenous peoples of South and Central America. Accounts such as Oviedo's Historia General delas Indias (Seville, 1535),<92> which contained the earliest occurrence in print of a word from which "tobacco" is derived, had already alluded to the use of snuffing and smoking substances in heathen rituals.<93> Another influential work was La Historia del Mondo Nuovo (Venice, 1565)<94> by Girolamo Benzoni, in which the stupefying effects of smoking were cited and illustrated as evidence of satanic influence in Amerindian behavior:

And there are some who take so much of it, that they fall down as if they were dead, and remain the greater part of the day or night stupefied. Some men are found who are content with imbibing only enough of this smoke to make them giddy, and no more. See what a pestiferous and wicked poison from the devil this must be. It has happened to me several times that, going through the provinces of Guatemala and Nicaragua, I have entered the house of an Indian who had taken this herb, which in the Mexican (sic) language is called tabacco, and immediately perceiving the sharp fetid smell of this truly diabolical and stinking smoke, I was obliged to go away in haste, and seek some other place.

In La Espanola and other islands, when their doctors wanted to cure a sick man, they went to the place where they were to administer the smoke, and when he was thoroughly intoxicated by it, the cure was mostly effected. On returning to his senses, he told a thousand stories, of his having been at the council of the gods, and other high visions. (see Plate 7.4)<95>

While such accounts associated smoking with idolatrous manifestations of pagan cults, and made the plant the subject of Christian abomination, the clergy in the New World initially tolerated tobacco-use, and even profited through the tithes received from the cultivation and export of the leaf.<96> As Ortiz puts it, "in the last analysis, the devil, by extending the scope of his temptations, was indirectly contributing to the funds of the Church."<97> Yet, as was the the case in Europe, ecclesiastical authorities in the New World were prepared to go only so far in their tolerance of the moral, medical and economic arguments.

As early as 1555 Duarte da Costa wrote of a **donatario<98>** named Vasco Fernandes Coutinho, who, while in Salvador (Brazil), grew attached to tobacco:

...this the bishop has forbidden in the city, under the pain of excommunication and other heavy punishments, saying it is a heathen custom, whereas it is a medicine which it appears ought not to be prohibited, as in this country it cures men and beasts of many ailments. Because a poor man <Coutinho> was found who smoked it, <the Bishop> ordered him to be put, stripped to the waist, in the cathedral on Sunday at mass, with his cigars on his back, and condemned another to the same penalty...<99>

The next year the Synod of Santa Fé de Bogotá issued a directive that "the priests in charge of Indian curacies shall not permit...that they cultivate tobacco in their fields or houses, nor that they consume it."<100>

Emboden believes that within a few decades there were more Spaniards converted to smoking than Indians converted to Christianity.<101> By 1565 an investigation of tobacco-use in native ceremonies had been ordered, <102> and, in 1575, a Mexican Council was forced to prohibit the use of tobacco in churches throughout Spanish America. <103> Although this may have been aimed primarily at Amerindian converts, <104> eight years later it became necessary to legislate an end to specifically clerical As recorded in José de Acosta's Concilium Limense abuses. (Madrid, 1591), <105> among the regulations adopted in a Synod held in Lima, Peru, in 1583 (approved in 1588), it was "forbidden under penalty of eternal damnation for priests, about to administer the sacrements, either to take the smoke of...tobacco, into the mouth, or the powder of tobacco into the nose, even under the guise of medicine, before the service of the mass."<106> A similar manifesto was issued in Mexico in 1589, but, as time went on, these prohibitions were relaxed or ignored since they were difficult to enforce and the addiction was too widespread.<107> Meanwhile, Monardes had published his famous laudation of tobacco, and the plant's reputation as a veritable panacea had spread throughout Europe and the colonies. <108>



Woodcut from Benzoni's La Historia del Mondo Nuovo (1565) showing Amerindians falling into altered states of consciousness after smoking cigars. "See what a pestiferous and wicked poison from the devil this must be," exclaimed the author. Many observers believed tobacco was the means by which native peoples communicated with diabolic potencies and the plant was thus thought to have had satanic origins. Such eye-witness accounts from the New World were strategically incorporated into the arguments of those opposed to an ecclesiastical sanction of nicotian usage. Missionaries in the New World struggled with the moral dilemma of condoning a usage that was simultaneously beneficial to the health of humankind and capable of instigating un-Christian excesses of physical addiction. In the comfort of the Vatican the papacy was not inclined to favor the medical argument. The harsh conditions of proselytizing labors in the New World, however, made it easier for missionaries to recognize the usefulness of a plant that had a reputation for ameliorating the effects of unbalanced humors.

In a letter sent from Brazil in 1550 by the Jesuit Manoel de Nóbrega and published in the sixteenth-century version of the Jesuit Relations,<109> we find one of the earliest and most important indications of the ambivalence felt by missionaries:

All the food is difficult to digest, but God has remedied this with a plant, the smoke of which is of much aid in digestion and for other bodily ills and to drive the moisture from the stomach. No one of our brothers uses it, nor do any other of the Christians, in order not to imitate the unbelievers who like it very much. I need it because of the dampness and my catarrh, but I abstain--not what is useful for myself <do I want> but what is good for many that they may be saved.<110>

After de Goes suggested, in 1566, that petun should be called "the holy herb"<111> and Monardes issued his Segunda parte...(112> (1571), Jesuit reports stressed, more than ever, the medical virtues of the plant. Fernao Cardim, who held high office in the Brazilian section of the Order and was rector of the Jesuit college at Bahia, wrote, in the mid-1580s, that "the holy herb is helpful for various diseases," including asthma, coughs, wounds, headaches and stomach complaints. <113> By 1590 the Jesuit missionary and scholar José de Acosta had published his **Historia natural y moral de las Indias, <114>** in which he noted the use of tobacco, especially for its curative and anesthetic virtues. <115> This extremely popular work on the history of the New World was translated into French in 1598.

#### B) CATHOLIC MISSIONS IN NEW FRANCE

## the Recollect experience

The period of intense missionary activities in New France coincides with the pontificates of Urban VIII, Innocent X, Alexander VII, Innocent XI and Innocent XII. It does not seem probable that the Jesuits and Franciscans were totally unaware of the extraordinary uproar at the Holy See, as Pope after Pope was forced into official denunciations of tobacco throughout the seventeenth century. Papal anathemas were obviously insufficient to stem the tide of clerical snuffers and smokers. Addiction had levels of the ecclesiastical spread to many hierarchy, particularly in Italy, Spain, Portugal and the South American colonies, but also throughout the rest of continental Europe. The views of the North American missionaries, whether for or against tobacco, were likely greatly affected by the prevailing ambivalence in the Catholic Church as a whole.

The Franciscans had had extraordinary success in converting the Indians of Spanish America, so, when representatives of the Friar Minor (or Recollect) branch of the Order arrived at Quebec in 1615, hopes were high.<116> Before this optimism collapsed into the blunt conclusion that the native peoples of Canada were "extremely stupid," and that it was "to no purpose to preach the Gospel to a sort of People that have less Knowledge than the Brutes,"<117> the Order had sent friars into the wilderness in the insatiable quest for Amerindian souls. It is through the published account of one of these, Gabriel Sagard, that we gain an understanding of early missionary attitudes towards tobacco in northeastern North America.

Sagard, like most Recollects of his day, steadfastly refused to adapt to the lifestyle of his native hosts, even if it meant almost unbearable hardships. In **Le Grand voyage du pays des Hurons** (Paris, 1632)<118> he recalled how, during his 1623-24 trip through what is now Ontario, he "suffered greatly from want" because he was reluctant to imitate the native custom of smoking tobacco to deaden hunger.<119> Sagard also commented on the Iroquoian practice of presenting a lighted pipe to demonstrate friendship and entertain visitors:

... considering us as friends and relatives they would offer and hand it to us with very fine courtesy. But as I had never wished to become habituated to tobacco I used to thank them but not take it, at which they were at first all astonished, because there is nobody in all those countries who does not take it and use it in order to warm the stomach in default of wine and spices, so as to break up in some measure so much indigestible matter that comes from their bad food.<120>

When he wrote his **Histoire du Canada** (Paris, 1636),<121> the Recollect repeated that a fear of tobacco addiction, which he had

learned through observing the excesses of fellow Frenchmen, caused him to suffer from hunger. He also implied that smoking was only harmful if employed in non-therapeutic contexts.<122> In other words, healthy Frenchmen, who were not suffering from "humidity in the brain," did not require the drying action of tobacco, while poor diets and harsh climates warranted its use among the "savages."

In perusing Sagard's works one is left with an uncanny sense of deja vu, until it is recognized that the Friar Minor had plagiarism down to an art. To understand Sagard means to understand not only his personal experiences in the New World, but also the contemporary written sources which were routinely inserted into his traveloque. The original source of many of his ideas on tobacco appears to have been Marc Lescarbot's Histoire de la Nouvelle France, <123> from which a passage has already been The Micmac, who, having "no knowledge of wine or quoted. spices", were said to "have discovered another means to warm the stomach, and in some sort to destroy the many crudities proceeding from the fish they eat. "<124> Neither Lescarbot nor Sagard could have learned of this reason for tobacco-use from the Micmac or Hurons. On the contrary, both Lawyer and Recollect were simply repeating what the humors paradigm dictated and what was recorded in print in the early seventeenth-century:

For where God hath given this herbe for a remedy to those poor people that want both wine, spice, and salt...that suffer hunger and thirst...we in this part of the world use Wine of all sorts, and all sorts of Spices, we eate salt with our meat, and powder our flesh and fish with it, and thereby drye up, and suck out the corrupt and harmefull moysture that it hath: we that, besides Wine, have strong Beere, and strong Ale, that cover our bodies with garments...do not need any such drying fume at all.<125>

Another European idea about tobacco influencing the ethnographic descriptions of both authors, was the notion that the leaf had anti-aphrodisiac virtues.<126> This is clearly revealed in Lescarbot's explanation of Micmac sexual continence and public modesty:

One might think that the nakedness of this people would make them more lecherous, but the contrary is the case. For just as Caesar praises the Germans for having in their ancient savage life such continence that they reputed it a thing most vile for a young man to have the company of a woman or girl before he reached the age of twenty; and for their part also they were not moved thereunto, although they all pell-mell, men and women, young and old, bathed together in the rivers; so also I can say for our savages, that I never saw amongst them any immodest gesture or look, and I venture to affirm that they are far less given to that vice than we in these parts. I attribute the cause of this, partly to this their nakedness, and chiefly to their keeping bare the head, where lies the fountain of the spirits which excite to procreation; partly to the lack of salt, of hot spices, of wine, and of meats which provoke desire, and partly to their frequent use of tobacco, the smoke of which dulls the senses, and mounting up to the brain hinders the functions of Venus. <127>

Later in the same work, albeit in a different context, Lescarbot repeats that smoking "mitigateth the passions of Venus." <128> in his characteristic laziness Sagard copied the former passage in 1632, slightly adapting the lawyer's original locution to leave the impression that this was an eye-witness account among the Huron:

We read that Caesar praised the Germans highly for having in their ancient savage life such continence as to consider it a very vile thing for a young man to have the company of a woman or girl before he was twenty years old. It is the reverse with the boys and young men of Canada, and especially with those of the Huron country, who are at liberty to give themselves over to this wickedness as soon as they can, and the young girls to prostitute themselves as soon as they are capable of doing so. Nay even the parents are often procurers of their own daughters; although I can truthfully say that I have never seen a single kiss given, or any immodest gesture or look, and for this reason I venture to asert that they are less prone to this vice than people here. This may be attributed partly to their lack of clothing, especially about the head, partly to the absence of spices and wine, and partly to their habitual use of tobacco, the smoke of which deadens the senses and ascends to the brain. <129>

Although Joseph Lafitau later implied that it was the Amerindians who attributed to smoking the virtue "of deadening the fires of concupiscence and the revolts of the flesh, "<130> it has already been noted that this was part of the ideological baggage of the European clergy, who used the explanation to Sagard, the justify their own addiction.<131> confirmed non-smoker, would not have had a personal reason to promulgate the idea that tobacco functioned as an anti-aphrodisiac. Yet, he likely would have favoured a practical and physiological (rather than a theological) explanation for the few natural odours of morality he sensed in an otherwise offensive native existence. the few indigenous products that If tobacco were one of facilitated digestion and encouraged sexual restraint, then it was acceptable among the "savages." Thus, it comes to no surprise that Sagard and other Recollects distributed nicotian products to the native peoples of Gaspesia and Huronia. <132>

Another Franciscan missionary of the Recollect Order of Friars Minor was Louis Hennepin, who is best known for his role

as the chaplain on La Salle's celebrated exploration of the Great Lakes and Illinois in 1679, his capture by the Sioux in 1680 and his reckless claim (since discredited) that he had travelled down the Mississippi to its mouth. Hennepin's initial exposure to the tobacco habit resulted in a negative reaction. While at the fishing port of Calais he was drawn to **tabagies**, where tales of adventure could be heard amidst the puffs of sailors' pipes. "The Smoak of Tobacco was offensive to me," he later recalled, "and created Pain in my Stomach, while I was thus intent upon giving ear to their Relations."<133>

Hennepin's abhorrence of smoking was matched by his intolerance of the "savage" culture from which the habit was originally derived. In his A New Discovery of a Vast Country in America (London, 1698),<134> he complained that native peoples were willing to participate in Christian rituals only if tobacco and brandy were offered as incentives:

These miserable dark Creatures listen to all we say concerning our Mysteries, just as if 'twere a Song; they are naturally very vitious, and addicted to some Superstitions that signific nothing; there Customs are savage, brutal and barbarous; they will suffer themselves to be baptized ten times a Day for a Glass of Brandy, or a Pipe of Tobacco, and offer their Children to be baptiz'd, but all without any Religious Motive.<135>

This reflected the general attitude of the Friars Minor as a whole, for we find an almost identical passage in the First Establishment of the Faith in New France (1691)<136>--a work attributed to the Recollect Chrestien Le Clercq, but probably compiled by Claude Bernou and Eusèbe Renaudot:

These poor blind creatures hear as songs what we say of our mysteries; they take only what is material and meets the senses; they have their natural vices and unmeaning superstitions, savage, brutal, and barbarous manners and customs; they would willingly be baptized ten times a day for a glass of brandy and a pipe of tobacco; they offer us their children and wish them baptized, but all this without the least sentiment of religion.<137>

Although the tobacco gambits did not always pay off in serious conversions, the missionaries continued to distribute the leaf, since, if nothing else, it at least kept the "miserable creatures" interested dark and helped preserve peaceful relations. La Salle had provided Hennepin with a quantity of Martinico tobacco to aid the expedition chaplain in his quest for native souls, <138> and the missionary found many opportunities to distribute the present to a variety of Amerindian groups. <139> In some instances the French tobacco was particularly useful, for it helped moderate the resolve of hostile natives to have the missionary put to death.<140>

Despite his negative feelings towards traditional native customs, Hennepin was compelled to return Amerindian gestures of "civility" with the mandatory dispensations of tobacco.<141> On one occasion the Franciscan even participated in a "savage" funeral rite, though he promptly exploited the event as a forum for proselytization:

I admired how neatly these Savages had laid out the dead Corps... They said I must give him some Tobacco of Martineco, of which I had a small quantity, that the Defunct might have something to smoak: This gave me an occasion to tell them, that the dead did neither smoak nor eat in the Country of Souls, and that they have no more need of Bows and Arrows... They made but a gross Conception of what I said to them: afterwards I made them a Present of two Fathom of our black Tobacco; they love it passionately... I made them understand, that I gave it them to smoak, and not to the deceased, because he had no need of it.<142>

It seems apparent that Hennepin tolerated native tobacco addiction and even used it to the advantage of his mission. Moreover, there is evidence that the Recollect himself cultivated a small patch of Nicotiana plants.<143>

#### Jesuit attitudes

The Jesuits were the other major, Catholic Order competing for Amerindian souls in seventeenth-century northeastern North Their attitude towards the new panacea and their policy America. regarding its place in the continuum between heaven and hell, was characterized by the same ambivalence expressed by their rivals ip other Orders. As a reply to the notorious misocapnist (tobacco-hater<144>), King James I of England, the Polish Jesuits published a work entitled Anti-Misocapnus in which it was argued that tobacco-smoking was to the advantage of public health and morals, and that the recently discovered plant should not be condemmed by the Church since its potential had not yet been properly assessed. <145> Other Jesuits, such as Bernabe Cobo, were not convinced, and regarded snuffing as a hypocritical invention of the Spanish priests, who had found a way of enjoying tobacco without noticeably polluting the air (if not the floors) of their churches. <146>

By 1630 the "rhetorici" of the Jesuit College at Antwerp had

written three poems concerning the slavery caused by the tobacco hab\_t, and had symbolised addiction through an emblem depicting a cupid smoking a pipe with a heavy chain attached to its ankle. $\langle 147 \rangle$  In 1658 Jakob Balde, a Jesuit of world-wide celebrity, issued a satirical indictment of tobacco entitled Die Truckene Trunkenheit (lit. "the dry drunkenness"), <148> in which he thundered against the habit (see Plate 7.5). Writers on Balde say, however, that he himself smoked to relieve a catarrhal condition, and that his satire was directed only towards the most excessive abusers of the God-given plant. <149> To what extent tobacco was used by the Jesuits is difficult to ascertain, though a letter to Athanasius Kircher from Francesco Redi (dated 1671), suggests that the Order was kept fully informed on the medical efficacy of the panacea. <150>

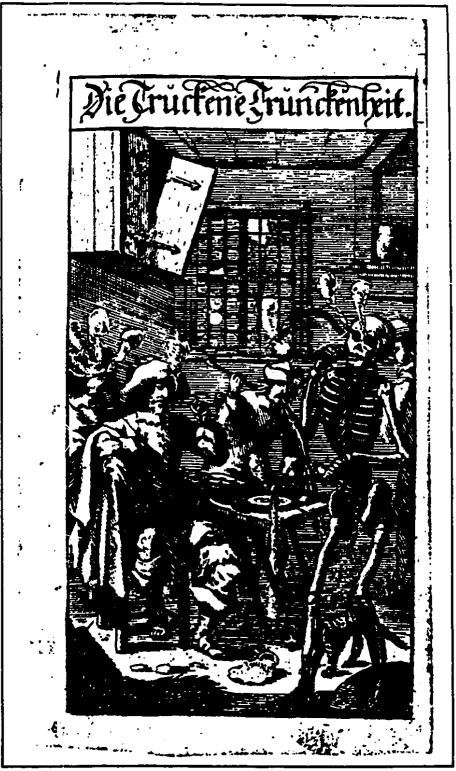
That at least some Jesuit missionaries employed snuff is evidenced by their being credited for having introduced the practice to China, where smoking had been the previous method of consuming tobacco.<151> As Laufer observes:

The impetus to the practice was doubtless given by the Jesuit missionaries at a time when they wielded a powerful influence at the court of the Manchu is no emperors...It wonder that France, where snuff-taking was an established custom of the elegant world, should have communicated it to China... The fleur-de-lis still forms the insignia of a snuff-shop in Peking, and it is even asserted that to this day the sellers chief of snuff Catholic Roman are converts.<152>

An obscure anti-Jesuit work entitled **Renversement De La Morale Chretienne** (c. 1686) illustrates three members of the Order with pipes as part of their paraphernalia, suggesting that, in the opinion of the author, smoking was part of their spurious reputation.<153>

Like the Recollects, the Jesuit missionaries of New France were definitely aware of the presumed salubrious effects of tobacco. Pierre Biard noted in 1616 that smoking among native peoples was "without doubt a help to them, and upon the whole rather necessary, considering the great extremes of cold and bad weather and of hunger and overeating or satiety which they endure." He was forced to add, however, that "many ills arise from it, on account of its excessive use. "<154> In 1634 the Jesuit Paul Le Jeune refused to part with a small stock of tobacco he had reserved for himself, with the excuse (given the natives who pressed him for it), that he wished to test the assertion that smoking satisfied hunger during famines. <155> When François du Creux, the official historian of the Jesuit mission in New France, published his Historia Canadensis (Paris, 1664), <156> he referred to the smoking of "the noxious dust" as "perilous business," but was obliged to admit that tobacco had "a wonderful effect of drying up the brain. "<157> So ingrained was this latter notion, that, as late as the nineteenth century (well after the humors paradigm had lost its appeal), the Jesuit Pierre-Jean De Smet still talked in the same terms:

However ridiculous this custom of smoking may appear to some, it has a good effect among the Indians. Experience has taught them that the smoke of the calumet dispels the vapors of the brain, aids them to think and judge with greater accuracy and precision, and excites their courage. This seems to be the principal reason why they have introduced it into their councils, where it is looked upon as the seal of their decisions.<158>



Title of Jacob Balde's *Die Truckene Trunkenheit* (1658) showing a skeleton with tobacco smoke issuing from its eyes (foreground) and a vomiting tobacco-addict (background). The author was a Jesuit who smoked for medicinal purposes despite thundering against the habit. Other Jesuits praised the panacea with equal fervor, thus contributing to the ambivalence both within the Order and the Catholic Church as a whole.

PLATE 7.5

In addition to acknowledging the efficacy of the new panacea, priests of the Jesuit Order may also have been cognizant of the peculiar seventeenth-century idea that tobacco had anti-aphrodisiac virtues. Although hints of this are not found in their own writings, contemporary literature suggesting that it was well known in both secular circles and the Church, has already been cited.<159> It may be assumed that this curious attribute of the leaf would have been particularly attractive in northeastern North America. Axtell says that:

the missionaries who lived among the sexually liberated natives felt in need of truly "angelic chastity," for as Father le Jeune put it, "one needs only to extend the hand to gather the apple of sin." <160>

It. is evident. from the evidence cited. that seventeenth-century Catholic missionaries in northeastern North America were, in their attitudes towards tobacco, influenced by the renowned position the herb had in the humors paradigm of contemporary European medicine. At the same time, they were also affected by the raging controversies over the morals of tobacco-use, both within the Jesuit Order and the Catholic Church as a whole. The result was a series of seemingly contradictory actions and pronouncements on the subject in the historic literature of the period.

Despite the medical arguments in secular society, in the Catholic Church and within the Jesuit Order itself, it does not appear that Jesuit missionaries in New France adopted tobacco-use on any scale. The desire to promote health, decrease hunger and maintain chastity, often seemed insufficient to relax moral considerations. Between 1633 and 1636 Paul le Jeune and Antoine Daniel stressed, on three different occasions, that they did not use tobacco.<161> Although as eager to benefit from the supposed salubrious effects of the habit as other European many ecclesiastics, the missionaries encountered an unexpected problem. As role-models for Amerindian converts, they could not prudentially adopt a usage that was inextricably linked to "savage" religion.<162>

While agreeing with Biard and Sagard that smoking helped ease the effects of harsh climates and poor diets, later missionaries became increasingly alarmed with the manner in which Nicotiana permeated native ritual and every-day life. Since the Jesuits had a list of proscriptions that affected virtually every aspect of native culture, <163> it comes as no surprise that efforts were made to curtail, if not eradicate, tobacco--the very sustenance of the addicted "pagan" gods. The Jesuits' negative attitude is reflected in comments made on the progress of new Huron converts to Christianity:

This good man, after having answered and performed all the renunciations that are found in the ceremonies of Baptism, during Mass mentally revolving the question if there were any evil thing to which he was attached, and nothing occurring to him but Tobacco, immediately asked if tobacco were forbidden, explaining that he was quite ready to give it up and abandon it, in case it were not allowable to use it. This resolution may pass for one of the most heroic acts of which a Savage is capable, who, it seems, would as soon dispense with eating as with smoking.<164> Other Hurons were evidently alarmed at the prospect of spending an afterlife in a European Heaven, where the garden of the great White God lacked the leaf, and smokers might be banished to hell fires:

...some say that they do not see how, as they have so weak legs, they can make so long a journey and reach Heaven. Others assert that they are already afraid, and dread lest they may fall from so great a height, not being able to understand how they can remain there long without falling. You will find some of them anxious to know if there will be tobacco there, saying that they cannot dispense with it.<165>

Smoking was banned in church, (at least while in the presence of the priests),<166> and further efforts were made to alter the behavior of converts:

As he had taken the resolution not to smoke on the day that he received communion,-- which is a rather difficult thing for a Savage, who prefers tobacco to food and drink,--the Father who had charge of him told him one day that he might deceive him, and break his resolution in secret. He made a very neat reply..."I do not go to visit the French soldiers on the day that I have received communion, because they would invite me to smoke."<167>

In 1640 Vimont reported an example that clearly illustrates the missionary assault on the nicotian habit:

The Father who had charge of him, seeing him smoking, asked him why he smoked. He stopped short, and did not answer. "If God said to you," pursued the Father, "Render an account of your actions; why did you take tobacco?' what would you say?" "Indeed I would be at a loss; for I have never taken it except for the pleasure I felt from it. But why," he added, "have you not informed me sooner of this disorderly action? I will never again take it." In fact he dispensed with it for a long time, until some one told him that it would be proper for him to take a little for his health. Those who know what a mania the Savages and some Frenchmen have for smoking tobacco, will admire this abstinence in a Canadian. Intemperate drinkers are not so fond of wine as the Savages are of tobacco.<168> In this case one may surmise that smoking was excusable among native Christians, provided it had a legitimate therapeutic motive. Such exceptions, although logical in French ideology, would have appeared puzzling in native contexts, where religion and medicine were virtually inseparable. Discounting the religious, while giving tentative consideration to the medical components of the tobacco complex, was part of a general ideological confusion in New France, as occidental theology clashed with Amerind shamanism.<169>

Tobacco in Amerindian life did not, of course, only serve as a smoking substance. The spirit world was not merely to be contacted, but also to be propitiated with presents of dry leaves and powder of the precious plant. While Moore has recently suggested that the Jesuits "patiently tolerated the tobacco sacrifice," there is ample evidence that this was not always the The frequency and shamanic intensity of such case.<170> invocations were especially offensive to the missionaries and they went to great lengths to remove the "idolatry" from native life. These included what, from an anthropological vantage, can only be described as reprehensible acts of iconoclasm. During a journey in 1679, Father Claude Allouez, for example, discovered that native peoples were offering tobacco gifts to two oddly-shaped rocks near a group of rapids. The Jesuits promptly had these objects of reverence carried off and cast to the bottom of the river.<171>

Ironically, the very fact that tobacco was a suitable gift

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to preternatural potencies, helped the Jesuits foster a sense of reverence for themselves and their own God. Allouez was occasionally elevated to the status of shaman or spirit, as happened among the Mascouten living on the upper Fox River of Wisconsin in 1670:

When all were seated, and after some had filled a dish with powdered tobacco, an Old man arose and, turning to me, with both hands full of tobacco which he took from the dish, harangued me as follows: "This is well, black Gown, that thou comest to visit us. Take pity on us: thou art a Manitou; we give thee tobacco to smoke. The Nadouessious and the Iroquois are eating us; take pity on us. We are often ill, our children are dying, we are hungry. Hear me, Manitou; I give thee tobacco to smoke.<172>

Although the Black Robe indicated his "horror of this ceremony," he was not quite so dismayed in an earlier encounter with the Fox, where a similar nicotian oblation was redirected to the invisible God at the end of Allouez's uplifted arms:

One day, on entering the Cabin of an Outagamy, I found his parents dangerously ill; and I told him that bleeding would cure them, the poor man took some powdered tobacco and sprinkled it completely over my gown, saying to me: 'Thou art a spirit; come now, restore these sick people to health; I offer thee this tobacco in sacrifice.' 'What art thou doing, my brother?' said I; 'I am nothing, but he who made all things is the master of our lives, while I am but his servant.' "Well, then,' he rejoined, scattering some tobacco on the ground, and raising his eyes on high, 'to thee, then, who madest Heaven and earth I offer this tobacco.' $\langle 173 \rangle$ 

Not surprising is the missionary's conclusion that "these people are not very far removed from the recognition of the Creator of the world."<174>

Allouez was but one of many Jesuits reporting such experiences. Paul du Ru, who was chaplain of the 1699 expedition under Pierre Le Moyne d'Iberville, wrote of a "savage" who "came and blew smoke from his pipe into my nose as though to cense me."<175> In the nineteenth century Father Pierre-Jean De Smet described his activities among the Sioux, who:

immediately brought the calumet, and after having offered it first to the Master of Life, imploring his blessing, the savages, in their engaging simplicity, presented it to his visible representative, entreating me to make known to him the esteem and love which they bear to him, and the ardent desire they entertain to listen to the Blackrobes sent in his name. $\langle 176 \rangle$ 

In cases of initial contact, this type of behavior appears to have been common among native peoples who were not only impressed by the wonderous stories of a Christian heaven, but also by the mysteries of French technology. La Potherie's description of Nicolas Perrot's adventures among the Potawatomi in the 1660s indicates that the newcomer "was regarded as a god:"

The old men solemnly smoked a calumet and came into his presence, offering it to him as homage that they rendered to him. After he had smoked the calumet, it was presented by the chief to his tribesmen, who all offered it in turn to one another, blowing from their mouths the tobacco-smoke over him as if it were incense. They said to him: "Thou art one of the chief spirits, since thou usest iron; it is for thee to rule and protect all men. Praised be the Sun, who has instructed thee and sent thee to our country." They adored him as a god; they took his knives and hatchets and incensed them with tobacco-smoke from their mouths...<

A later encounter with the Mascouten was no different:

The old man struck two pieces of wood together, to obtain fire from it; but as it was wet he could not light it. The Frenchman drew forth his own fire-steel, and immediately made fire with tinder. The old man uttered loud exclamations about the iron, which seemed to him a spirit; the calumet was lighted, and each man smoked... those who smoked blew the tobacco-smoke into the Frenchman's face, as the greatest honor that they could render him; he saw himself smoked (boucaner) like meat, but said not a word.<178>

While the focus of such redirected piety often involved the French God and the fire-steels he had bestowed upon his powerful shamans, it also included Christian icons and religious structures. Native neophytes "ceased not to cast tobacco on the crucifix," <179> and sprinkled the substance in and around the chapels where the Jesuits appeared to communicate with the spirit world:

The Savages of this country show sufficiently, by the honors that they pay to our holy church, after their fashion, that, if they do not all pray as yet, they at least esteem prayer... Sometimes, even, in their councils they address their speeches to this house of God, and speak to it as to an animate being. When they pass by there they throw tobacco all around the church, which is a kind of devotion to their divinity...<180>

The parallels that these offerings of powder and smoke had with the liturgical practices of the Catholic acolyte, who swung his censor with fragrant incense, <181> would not have escaped the Jesuits. Indeed, Spanish Catholics had already made extensive theological inquiries into these "intimations" of the holy sacraments found among Amerindians. <182>

The ease with which tobacco could be disengaged from shamanic "idolatry" and incorporated as part of Christian piety, would only contribute to the ambivalence missionaries felt about the entire Amerindian pipe/tobacco/smoking complex. They had, moreover, to come to grips with the most elaborate expression of that complex: calumet ceremonialism.

When the Jesuit missionary and explorer Jacques Marquette traveled through the Mississippi River drainage in 1673 and 1674, he noted that the pipe "must not be refused, unless one wishes to be considered an enemy, or at least uncivil (although) it suffices that one makes a pretense of smoking. (183) The Illinois later gave him a calumet "to serve as a safequard among all the Nations" through whom he had to pass during his travels. <184> This proved to be a godsend for the adventurous missionary and his companions who, without this symbol of peaceful culture contact, would have perished under a hail of arrows and clubs. "Recourse to our Patroness and quide, The Blessed Virgin Immaculate," was clearly not enough:

... for we heard from afar The savages who were inciting one another to the Fray by their Continual yells. They were armed with bows, arrows, hatchets, clubs, and shields... One of them then hurled his club, which passed over without striking us. In vain I showed The calumet, and made them signs that we were not coming to war against them. The alarm continued, and they were already preparing to pierce us with arrows from all sides, when God suddenly touched the hearts of the old men, who were standing at the water's edge. This no doubt happened through the sight of our Calumet, which they had not clearly distinguished from afar; but as I did not cease displaying it, they were influenced by it, and checked the ardor of their Young men. <185>

The Jesuits were eager to encourage this political civility and, as late as the nineteenth century, one still finds missionaries tolerating the calumet ceremony.<186>

By the same token, some priests, such as Father Du Poisson, the eighteenth-century missionary to the "Akensas," absolutely refused to even watch, let alone participate in, the ceremony for fear of committing himself to any ensuing native, socio-political obligations.<187> Even more vehement was the reaction of the Jesuits laboring at the Western Abenaki mission of St. Francis after 1700. Father Vincent Bigot, the co-founder of the mission, opposed the calumet, and was successfull in repressing the ceremony until the **Renards** (Fox) convinced several Abenaki elders to defy Jesuit intolerance and celebrate the calumet dance openly in 1720.<188>

This bold action in the midst of a Catholic mission prompted Father Jacques le Sueur to carefully evaluate the theological ramifications of such regressions to a native belief system. Although the resulting discussion did not find its way into the Jesuit Relations, it is fortunate that his 21-page manuscript, titled Histoire du Calumet et de la Danse (1744)<189>, has survived, for it is the most telling indication that missionary attitudes towards this component of the pipe complex were far from adiaphoristic.

Le Sueur reveals that, according to the St. Francis missionaries, "Christianity and this idolatrous dance could not exist together, and that it was necessary to choose one or the other." An Abenaki headman was said to have replied that, "since the two things are incompatible, he would prefer to keep the calumet dance." (190> In case there were any Christians who asserted that "the savages intend no evil in what they are doing, "(191> the Jesuit had numerous counter-arguments. While it is inconceivable that the Western Abenaki had no pipe ceremonies, dances or related rituals in prehistoric times, Le Sueur stressed that the calumet dance had been imported from the idolatrous Renards, and alluded to the ostensibly analogous case of the Israelites adopting the Egyptian cult of the golden calf.<192> He pleaded "that grace be given to the work of destroying the ancient superstitions" peculiar to the Abenaki, and that "they might not be compelled to receive new superstitions."<193>

During the dangerous odysseys of Marquette and Allouez, the calumet had served as a useful gambit, paving the way for spreading the Gospel. Now, in the relative security of the St. Francis Mission, where native neophytes had prayed for decades, the calumet was an offensive intrusion requiring the full force of Jesuit rhetoric.

#### the Jesuits exploit a native addiction

The transfer of tobacco from "pagan" invocations to Christian prayers, and the occasional adoption of calumet ceremonialism, were not the only ways in which the smoking complex proved its usefulness in the fulfillment of missionary objectives. The maintenance of friendly relations with Amerindians was often best achieved by making presents of highly valued goods. What could be more dearly prized and, at the same time, easily transported than tobacco and pipes?

Since, as we have noted, <194> much of secular society in New France had become addicted to smoking and snuffing, the Jesuits frequently presented their fellow countrymen with the means of enjoying the habit. Thus, on January 1, 1651 a certain Monsieur Couillar received a stone calumet as a new-year's gift from the missionaries.<195> When, in 1659, Father Dablon and another Jesuit went to pay their respects to "Monseigneur the Bishop" and the Governor, the attending soldiers complimented them to such a degree that the missionaries were obliged to give each a rosary, a pot of brandy, and a livre of tobacco.<196> Soon thereafter, the Bishop was greatly offended by the manner in which soldiers played fifes and drums while marching to and from mass, and the ill-feelings engendered by an ensuing recompense were assuaged by a reciprocal gift, from the Bishop, of two pots of brandy and two **livres** of tobacco.<197> Such incidents suggest that quantities of **petun** were available to missionaries and other ecclesiastics in New France, and that stocks were reserved expressly for the purpose of preserving amicable sociality.

Despite a decided apprehension about condoning a usage fraught with excesses and prominent in "pagan" religion, the Jesuits routinely dispensed their nicotian resources to native peoples of North America. Throughout the 72-volume Jesuit Relations, this practice is mentioned time and time again,<198> and one is compelled to conclude that no official policy was even mildly resistant.

One of the reasons for giving tobacco, may have been linked to the Jesuit desire to fit into a culture and proselytize from the inside. Thus, one finds in a **Relation** of 1638, that the Jesuits opened an Amerind council by presenting "a cake of tobacco in a dish, in the manner of the country. "<199> Local custom also saw it proper to offer tobacco at formal greetings, and so, the Huron chief of Orleans Island was given a "brasse-length" of tobacco by the Jesuits in 1654.<207> Had such courtesies not been extended as lubricants in culture contact, the missionaries would, as Axtell quips, "have preached to the trees."<201>

Yet, was this solely a matter of accommodating Amerindian custom? Despite their ethnocentrism and the political and ideological motives for which they are occasionally condemned, the Jesuits do seem to have been at least partly driven by a genuine altruistic beneficence. Tobacco was, after all, widely regarded as a panacea, and handing it out in moderate doses may have been justified as part of the medical goals of a mission. . That the presentation of tobacco may have been envisioned as a virtuous and charitable act, is further evidenced by the unique position the plant had in the fringes of seventeenth-century Christian thinking. When Raphael Sadeler published his Zodiacus Christianus (Munich, 1618)<202> the symbol of charity was an illustration of Nicotiana (see Plate 7.6). This rather curious analogical reasoning was based on the principle that charity healed poverty and sin, much like tobacco healed ulcers and wounds.<203> To give tobacco was, therefore, tantamount to improving the human condition.<204>

The underlying motives for supplying Amerindians with the controversial weed were in the majority of cases, however, not

related to charity, the calumet complex or the demonstration of friendly sincerity. The "presents" were often accompanied by certain conditions, such as the assurance that the native recipient had not employed the "dream-wish" as a pretext for educing the precious substance.<205> The recipients were also expected to provide a wide range of services, and tobacco became more a gratuity, or even an outright bribe, than a friendly present. As Ménard wrote Lalemant (c. 1660), "everything can be done with that money."<206> The missionaries needed first to survive in a foreign country under difficult conditions, and secondly, to harvest as many souls as possible. To do so they exploited a physical addiction with remarkable hypocrisy.

Lacking their own transportation, the Jesuits depended almost entirely on their hosts. The instructions given to Fathers of the Order who were being sent to the Hurons, suggested that they provide themselves "with a tinder box or with a burning mirror, or with both, to furnish <the Hurons> fire in the daytime to light their pipes, and in the evening when they have to encamp; these little services win their hearts."<207> The formula was simple: the more tobacco the missionaries possessed, the greater the facility and speed of their journeys. As Father Daniel reported in 1636:

I met our Fathers on the third of August, three days' journey above the Island; both wore their shoes in the Canoe and were not paddling, which made me think they were being well treated; this caused me to do something for their men which I had not yet wished to do for my own, which was to make them a present of an herb that they adore, namely, tobacco, which is very high-priced this year. I would willingly give up ten times as much of it at the Island, and see you so much the sooner, together with my young Hurons; I shall spare nothing to accomplish it.<208>

. J.

By the early 1670s missionary travel was possible over great distances, with tobacco acting as the principal ticket fare:

I further promised him as much tobacco as he could use on the way, and a second very considerable present upon our return, if he and his son would embark and guide us to Miskoutenagasit on Hutson's (sic) bay, twenty leagues along the shore. He began to laugh, and said to his son, 'Come on, we shall not want for tobacco this Summer.'(209)

Once they arrived at their destinations, the Jesuits were equally dependent on Amerindians for shelter. The long-robed priests were not about to construct dwellings on their own and "encouraged" the natives, as they did in 1636, to erect a cabin, after offering a dozen cakes of tobacco and some skins. Upon accepting the tobacco, but rejecting the skins, the builders were reported to have "set to work so diligently and worked with so much zeal that they erected a cabin for us in less than three days."<210> Thirty-five years later another missionary ordered the construction of a house, and produced "a handsome calumet and three brasses of tobacco," which he gave to the chief, "that he might smoke and regale his young men."<211>

In addition to transportation and shelter, the Jesuits occasionally required help with the idiosyncracies of Amerind languages. To ameliorate his embarassing solecism Le Jeune was forced to hire an interpreter in 1633, at the cost of fueling the native's smoking habit with copious presents of tobacco:

Oh, how grateful I am to those who sent me some tobacco last year. The Savages love it to madness. Whenever we came to a difficulty, I gave my master a piece of tobacco, to make him more attentive. I never can thank our Lord enough for this fortunate circumstance.<212>

In a subsequent **Relation** Le Jeune reported the extraordinary difficulty he had in reserving his small stock of tobacco "money" for the purpose of "buying" language training and obtaining drinking water:

I brought some tobacco with me, but not for myself, as I do not use it. I have given liberally, according to my store, to several Savages, saving some to draw from the Apostate a few words of his language, for he would not say a word if I did not pay him with this money. When our people had consumed what I had given them, and what they had of their own, I had no more peace. The Sorcerer was so annoying in his demands for it, that I could not endure him; and all the others acted as if they wanted to eat me, when I refused them. In vain I told them that they had no consideration, that I had given them more than three times as much as I had reserved for myself. "You see," I said to them, "that I love your language and that I must buy it with this money, for if it is lacking no one will teach me a word; you see if I have to have a glass of water, I must go a long way to get it, or I must give a bit of tobacco to a child to get it for me..." It was impossible to resist their teasing, and I had to draw out the last bit, not without astonishment at seeing people so passionately fond of smoke. <213>

As if life in the missions was not already difficult enough during food shortages, Jesuit efforts to appear unoffending during the Iroquoian eat-all feast led to further difficulties. This Le Jeune learned when he attempted to pass off his share of the ritual gluttony. As he could not come to the end of his portion, he invited a neighbor to take part of it, giving some tobacco as a reward for what the collaborator would eat for him, and secretly threw the rest to the dogs.<214>

Aside from paying for essential services, the most

significant use of tobacco involved the Jesuits' ultimate ambition: converting Amerindians to Christianity. In 1639 a missionary surmised that special assemblies of village chiefs and elders might be highly profitable as a stage in proselytization. "Judging rightly that this could not be hoped for except through some temporal attraction, the Father felt obliged to throw, each time, some cakes of tobacco into the midst of the assembly, which were immediately cut to pieces, and distributed by the principal Captains, or by their order. (215) A few years later an Iroquoian neophyte entered all the houses of his village, ransacked the ritual bundles, inspected all the pouches and carried them off to the Christian chapel. The priest, who was overjoyed at this action, enticed the villagers with presents of tobacco to encourage the burning of the collected "implements of impiety."<216>

The most effective way of distributing such bribes was to supply Christianized natives with sufficient quantities so that ammunition with which to they, in turn. hađ burn the "superstitions and everything that the devil had taught" their after conversion, fellow countrymen.<217> tobacco Even inducements continued to promote the Christian cause, as was the case among the Kiskakon group of Ottawas in 1679:

The most influential chief of this nation, after having Confessed in preparation for first Communion at easter, which he had long solicited, of his own accord went to assemble the old Christians, that he might have an opportunity of speaking to them. He distributed among them all that he had of some French tobacco, which they so highly prize, willingly depriving himself of it that he might exhort them all to Confess on that easter festival, at which all Christians do so, and also to bring all the persons in their cabins to Confess, telling them that it was the best method of establishing good order among them.<218>

The Jesuit desperation for new baptisms was only equalled by the native fondness for smoking, and soon the tables turned, with the latter exploiting the former. This was particularly a problem in the missions of the 1630s, when many Hurons attended Catechism solely to obtain the promised tobacco and laugh among themselves at what they had heard there.<219> One observer later noted that "they have no other design in approaching to the place of Worship, than to snatch away a pipe of tobacco, or to ridicule the good Fathers."<220>

Where the missionaries obtained nicotian products is often difficult to ascertain. Sagard left an intriguing clue when he assured readers that Amerindians "themselves had traded to us the little which we had."<221> It seems that, in the early years, stocks of tobacco were often secured quite fortuitously. When, for example, in 1632 the Hurons expressed reluctance to take the long-robed priests in their canoes, a Monsieur du Plessis became urgent, pressing the Jesuit cause with all the power he had, to find a place for a few:

A certain Savage, addressing the Father, said, "Arrange for me to trade my tobacco for porcelain; and, my canoe being unloaded, I will take one Frenchman." The Father had none of this; but, when Monsieur du Plessis and Monsieur de l'Espinay heard of it, they bought his tobacco and this made place for six persons.<222>

Such was the strange fate of Huron petun: traded to the French in return for "porcelain" and seats in a canoe, and traded back to

the natives to ensure further transportation.

Aside from its inherent absurdity, this manipulation of tobacco as a veritable currency could not possibly survive within a closed system. The demand was high, availability was often seasonal and Amerindians were only inclined to offer goods of which they had predictable surpluses. Inevitably, tobacco from outside the region (usually Brazil or the West Indies) began to find its way into missionary hands, just as it had among the explorers, traders, soldiers and colonists of New France.<223>

In the early eighteenth century French missionaries were still supplying Amerindians with significant quantities of tobacco.<224> As the Jesuit Sébastien Rasles wrote his brother in 1723, "to give them a piece of tobacco pleases them more than to give them their weight in gold. "<225> About 1710 a French merchant could not help "admiring the temperance and constancy of the Lorette Hurons." "They never could be induced, he continued," to taste a drop of wine, even to touch it with their lips, being satisfied with bread and a little tobacco, which we willingly gave them. "<226> In 1702 the Brothers of the Illinois mission issued a formal request (addressed to Jean de Lamberville) for fresh supplies, which included "thirty livres of good tobacco. "<227> After the Louisiana colony began to flourish, at least one Jesuit Father (Nicolas I. de Beaubois) had his own tobacco plantation, which he plowed for a fortnight and described as "truly magnificent."<228>

Although tobacco had many uses among Amerindians of the Northeast,<229> most of it ended up in the bowls of pipes. The smoking devices themselves soon became highly desirable, and, throughout the **Jesuit Relations**, we find sporadic references to the presentation of "handsome calumets" by the French.<230> In 1645, for example, the Reverend Father Vimont, Superior of the Mission at Sillery, gave each of a group of Iroquoians tobacco and a pipe with which to smoke it. The spokesman for the Iroquois responded with a witty reply:

...I thank you for your presents; you have covered us from our feet to our heads. Only our mouth remained free and you have filled it with a fine calumet and have gladdened it with the flavor of a plant that is very pleasing to us.<231>

Whether these "calumets" were of local or European manufacture is difficult to say, although Du Creux (1664) indicated that they were "pipes commonly used by the French and the natives." <232> Since the settlers of New France, perhaps more than any other colonials, often purchased Indian pipes or manufactured their own based on native prototypes, <233> it is possible that the same smoking devices circulated in both cultures. What is definite, is the European origin of the pewter pipes given, around 1645, by the Ursulines (another Catholic Order) to three Hurons as a reward for services. <234>

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PLATE 7.6

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ZODIACVS 52 CHRISTIANVS. 53 VII. STMBOLVM: RVTEX TABACI. faluberri-Vincurginandauit Deus de proximo suo. Laij mum hoc fruticis genus eft, ulceribus præfertim & vulneribuscurandisillustre. grande ul. cus corporis est, paupertas: grandius animi, peccatum. utrique perfanando mirifice conducir eleemolyna, illa presertim que datur cum benigno affectu in eyenos. & hac per Tabaci fruticem reprælentatur. Ab Apostolo id discimus In duite vos, inquit, visceramileri, cordiz ficut clecti DEI (adCo Ioff. 3.) Verè beatus qui intelli fuper egenum & pauperem, i die malâ liberabit eum Domi Diving for

Tobacco as a symbol of Christian charity in Sadeler's Zodiacus Christianus (1618). A translation of the text by Sarah Dickson reacs: "The tobacco shrub. This kind of plant is very healing, especially in curing ulcers and wounds. Poverty is great in size, sin is larger in its nature. Charity is wonderfully good in healing both, especially when given with kindly feeling to the poor. This is typified by the tobacco plant." This may have been part of the same ideological backdrop that helped justify the missionary practice of distributing great quantities of tobacco to North American Indians.

#### C) OTHER MISSIONS IN NORTH AMERICA

## Maryland, Virginia and New England

The Maryland mission of the 1630s, for which records survive in the Annual Letters of the Provincials of the Society of Jesus, appears to have had its share of problems with capricious neophytes who literally smoked Christianity into oblivion. One man:

though he had felt some internal drawings of God, and had for some time made use of means which seemed to lead toward conversion, yet on a certain day determined to cast aside all such thoughts, and go back to the customary paths of his earlier life. In the time when meditated better thoughts he he had obtained prayer-beads for himself; but afterwards, having changed his mind, he was accustomed to smoke them in his pipe with tobacco, after grinding them to powder, often boasting that he was eating up his "Ave Marias"; for so he called the beads by telling of which the salutation of the angel recited. <235>

Little is known of the attitudes of the clergy towards tobacco-use either here, or in the neighboring colony of Virginia. In the latter case it is evident that the salaries of protestant ministers were paid in tobacco in both the seventeenth and eighteenth centuries. Despite stipends of ten to twenty thousand pounds of the leaf per annum,<236> Brooks notes that this was often deemed insufficient:

The clergy, quite naturally, thought they could best serve God in those parishes where tobacco of superior quality was grown... Superb sermons were often thundered from pulpits on the importance of raising good tobacco and the moral necessity of curing it properly. A law of 1624 required that "no man dispose of his tobacco before the minister be satisfied..." Frequent disputes arose between ministers and their parishoners over the amounts of fees or salaries and the quality of receipts. Shrewd evaluation of a crop became a routine of ministerial activity. At a later period, when tobacco was scarce, the Assembly ordered that the clergy be paid in cash. This indecent proposal, clearly inspired by Satan, was indignantly rejected by the ministers as a body.<237>

It may be fair to assume that, in Virginia, there were few moral qualms about the Amerindian weed. Without tobacco the Jesuits of New France may occasionally have preached to the trees; the Virginia preachers would have had no reason to come to the New World in the first place.

It has often been asserted that the spokesmen for New England Puritanism were even more intolerant of Amerindian behavior and ideas than their rivals promoting the ideals of the Counter-Reformation in New France.<238> Indeed, Protestants felt that it was necessary to "civilize Savages before they can be converted to Christianity, and that in order to make them Christians, they must first be made men."<239>

If savages were not yet men, was their behavior, such as smoking, acceptable among Christians? The answer would have been "no," had not so easv many clergymen such an as John Brereton<240> adopted tobacco-use before coming to America. The Reverend Bradstreet of the First Church of Charlestown "was always seen with a pipe in his mouth."<241> However, John Eliot, the dominant English missionary in the seventeenth century, who promoted praying towns "for the incuragement of the Indians to live in an orderly way amongst us, "<242> denounced tobacco, <243> thereby contributing to the puritanical ambivalence over the

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habit.

# the Dutch and Moravians

Trelease observes that efforts to save native souls were never as pressing in New Netherland as they were in either New France or New England.<244> This was partially because Domine Jonas Michaelius, the first clerical representative in North America of the Dutch Reformed Church, characterized the natives as "uncivil and stupid as garden poles," who had a "made-up, childish language" that was impossible to master.<245> Johannes Megapolensis did, however, set up a mission for the Mohawks at Fort Orange from 1642 to 1649. While he recorded that, "when we have a sermon, sometimes ten or twelve of them, more or less, will attend, each having a long tobacco pipe, made by himself, in his mouth,"<246> he did not express either negative or positive feelings towards the practice.

Jean de Labadie, a disgruntled Jesuit who founded Labadism, a seventeenth-century Dutch Protestant sect, had a hundled-odd followers who, in the 1680s, wished to settle in what was previously New Netherland. Tobacco was still being cultivated on Manhattan,<247> and since the use of this commodity was prohibited by Labadist doctrine, there was a reluctance to settle there. For various reasons the emigrants ended up in Maryland where, ironically, moral considerations were put on the back-burner as they profited from raising **Nicotiana.<248**> Such was the power of this extraordinary leaf. Eighteenth-century missionary work in English New York met with little success, despite Queen Anne's donation of a chapel and the necessary religious paraphernalia. William Andrews set up a mission in 1712 at Fort Hunter near the Lower Mohawk Castle. He complained that he constantly felt obliged to give the Indians pipes and tobacco ("which I cant well deny them, for it is what they come for"<249>) and he soon abandoned the mission, exclaiming that "Heathens they are, and Heathens they will still be."<250>

The Moravian Church made missionary work among American Indians a principal concern in the mid-eighteenth century. Centered in Bethlehem, Pennsylvania and Winston-Salem, North Carolina, its membership was largely engaged in missions throughout much of North America. Moravian activities in central New York, which have been woefully ignored by Axtell and other colonial historians, resulted in a valuable set of journals compiled in 1916 by William Beauchamp.<251> While the intent of the missionary journeys related to preparation and study, rather than proselytization, the experiences of the participants offer clues to the attitudes of this religious sect towards native peoples in general, and tobacco smoking in particular.

Bishop A.G. Spangenberg's journal of a journey to Onondaga in 1745 indicates that the Moravians smoked pipes with the natives.<252> The Iroquois did not attempt to pronounce European names such as John Joseph and substituted, instead, **Hajingonis** ("one who twists tobacco"),<253> which suggests that at least one

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expedition member was known for carrying this type of nicotian product with him.

A diary of the journey of Cammerhoff and Zeisberger to the Five Nations in 1750, makes it clear that Moravian tobacco and even pipe stems were frequently distributed to the Iroquois, occasionally as payment for canoe transport, <254> but usually to promote friendly relations.<255> The same occurred during Mack, Zeisberger and Rundt's 1752 trip<256> and Zeisberger and Frey's journey the following year.<257> On the latter occasion, an Iroquoian chief gave the Moravians tobacco as a parting gift,<258> suggesting that the leaf was being passed back and fashion reminiscent of the early seventeenth forth in a century. <259> Finally, evidence from an archaeological site in Nebraska indicates that, by the nineteenth century, Moravian missionaries were actually manufacturing terra cotta reed-stemmed religious sect seems that this had few pipes.<260> It reservations about the Amerindian habit.

## southwestern missions

The patterns emerging from various missions in the Northeast have parallels in the eighteenth-century Spanish experience in the Southwest, and it seems desirable to conclude with a few examples from this region of the Continent.

• The chronicles of the Franciscan Fray Isidro Felis Espinosa, of an expedition to the Tejas Indians of Texas in 1715, indicate

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that the Spanish participated in pipe ceremonialism, and distributed tobacco much like their Jesuit counterparts in New France:

Each captain took a handful of the powdered tobacco they use and placed it upon a curious and beautifully painted deerskin. They all stirred it around to show their union of wills. They then put some of the tobacco in a pipe adorned with many white feathers as a sign of peace among them. One of the principal Indians lighted it and, after taking a whiff, he passed it to the priests and other Spaniards, for this is their most usual ceremony when receiving friends. ...in the name of His Majesty, the captains divided among all the Indians hats, little blankets, tobacco, and other trinkets.<261>

Some southwestern missionaries, however, "insisted on the abjuration of faith in the native jugglers or priests, and demanded the breaking and burning of their smoking tubes and other instruments and tokens of superstition in proof of this." <262>

By the time Juan Bautista de Anza visited California in the 1770s, it had become evident that missionary objectives could only be fulfilled if large quantities of tobacco were available for dispensation:

I thought that by moving from the other house to this one I should not be so much molested by the Indians, but just the contrary has happened; for if formerly they used to come for a short spell now it is for the whole day. I said **molested** not because they anger me, for I love them greatly, but because it is necessary to have a great quantity of tobacco and other things to give them, whereas I have very little. I infer that during the first years after missions are founded it will be necessary for each minister to have a load of tobacco to give them, for aside from continually asking for it, they put the tobacco in a reed as thick as the finger, to fill which a good handful is necessary; and so they smoke, for they are not satisfied with a cigarette.<263> Meanwhile, the Franciscan friar Francisco Garcés travelled through Sonora, Arizona and California, where ne often distributed tobacco and glass beads.<264> When these presents failed to materialize in 1781, the Indians revolted, killing Garcés, three other friars and thirty Spanish soldiers.<265>

#### D) CONSPECTUS

The transculturation of tobacco had as great an impact on the Christian clergy as it had on European secular society. The new plant, whether envisioned as panacea or bane, needed to be mapped onto the ecclesiastical continuum between Heaven and Hell. But the lack of any analogous precedent made this a difficult venture. Tobacco thus fell into a theological crack from whence it was retrieved in the interest of widely divergent goals.

The whole issue boiled down to whether the use of Nicotiana was one of the inherently diabolic characteristics of a state of savagery, or whether the savages had simply stumbled upon God's gift and abused it in "pagan" rituals. This dilemma was never fully resolved in two centuries of vitriolic and panegyrical literature. At the same time, the reputation of tobacco as an anti-aphrodisiac and as an excellent cure for various ailments, resulted in an astonishing rate of addiction among clergymen throughout Europe. The plant, called by some, the "salvation of the world" caused others, in an uncontrollable defilement, literally to vomit the Communion Host onto the altar.

The most concerted missionary work in the New World took place at the very time when ecclesiastical dispute over tobacco was at its height. Small wonder that the actions of missionaries were contradictory to the point of being hypocritical. Although the Jesuits affirmed the medical efficacy of the nicotian panacea, they discouraged smoking among neophytes and banned the practice in church. At the same time they distributed tobacco bribes to encourage native peoples to attend sermons. They even thanked God for the fortunate circumstance that they could pay for transportation, shelter and language tutoring simply by satisfying a native addiction. They destroyed sacred objects to which natives had traditionally offered the powdered leaf, and rewarded those who helped in this iconoclasm with presents of tobacco. Their intolerance of native tobacco invocations effectively vanished whenever these were redirected towards the cross, the church and the French God. Opposition to calumet ceremonialism also disappeared in cases where participation was essential to promoting the missionary cause.

The French Recollects and their Franciscan colleagues in the Spanish southwest, as well as the Moravians and even some Puritans, likewise benefitted in their labors through liberal dispensations of tobacco to native peoples. In fact, the practice was not even restricted to missionary activities in the New World. In a terribly ethnocentric travelogue (aptly titled **No Tobacco No Halleluja)**, Matthew Smedts cites a case among the "Capaukoos" of New Guinea which is so reminiscent of the struggle for Amerindian souls that it warrants repetition:

The Catholic priests founded a mission-post at Enarotali, but they were not alone in the field for Some American Protestant missionaries arrived long. who were members of a strict sect which was strongly opposed to smoking and drinking ... The Catholics ... had no objection at all to smoking. The Papuans felt more attracted to them than to ascetic Americans, whose faith did not forbid baptism of a polygamist. No Capaukoo can resist tobacco. He grows a little patch in his garden, enough to cover his requirements, but they are always ready for more. The Catholic priests, who gave them an occasional cigarette, were favourites in this struggle for souls. The Protestant rivals, who knew this, were faced with a serious dilemma. Could they also give them cigarettes? Did the sinful means justify the holy ends? They did, it was decided, and thereafter the Capaukoos who came to sing and pray in the Protestant Church received a cigarette after the Sunday service.

A year later there was a painful searching of consciences. "Are we not really encouraging these people in their sinful habits instead of eradicating the evil in their soul?" the missionaries asked themselves. "Anyway, the Capaukoos had some idea of Christian doctrine by now and might as well be told the whole sad truth." Next Sunday, it was announced to them they would no longer get cigarettes because smoking is sinful. And the Sunday following the church was empty.

The missionary visited one of their chiefs, a man of some standing, to ask him why nobody had come to sing. The Capaukoo's answer was short and to the point. "No tobacco, no halleluja." ...Never has anyone revealed in so few words the Capaukoo soul.<266>

As missionaries distributed tobacco "in the manner of the country," adopted native pipe ceremonies, or smoked to promote chastity and relieve catarrhal conditions, it was best to ignore the cognitive dissonance and concentrate on the immediate objectives at hand. Where the smoking habit came from and what associations it had with "savage" doings were to be forgotten. Just as the practice was redirected to help fulfill European proselytizing and economic goals, so too history would be rewritten to help tobacco into an intellectual niche closer on the road to civilization.

# CHAPTER EIGHT A HABIT BETWIXT AND BETWEEN SAVAGERY AND CIVILIZATION

As we leave the sixteenth, seventeenth and eighteenth centuries behind and shift focus to the modern era, we find that the ambivalence felt by missionaries in the New World was not merely a question of religious morality, but was part of a much more fundamental intellectual dilemma. The problem of mapping tobacco on the ecclesiastical continuum between Hell and Heaven, was simultaneously a problem of locating the plant in the conceptual space between savagery and civilization.

So ubiquitous and complete was the transculturation of smoking, it created the illusion that it had been indigenous to the Old World since ancient times. The illusion was fortified by the infrastructural importance of tobacco production and trade in the global economy and the widespread dispensation of pipes and nicotian products by Europeans to "savages" all over the world. By the nineteenth century the habit was widely regarded as an offspring of civilization, the early literature on the transculturation of tobacco was forgotten and the role of the American Indian in the development of pipes was often denied. The archaeological and ethnohistorical record became an integral part of a wider disputation on the relative contributions of a savage and civilized state. The result was an enormous body of literature on the origin of Nicotiana and pipes.

As a myth that Europeans told themselves, the idea of an Old World invention of tobacco smoking contextualizes this study, since the myth is premised on the conviction that the sixteenth and seventeenth-century transculturation of tobacco was a non-event. Why make a big fuss over the Amerindian plant if smoking was old hat in occidental antiquity? The following two chapters briefly trace the intellectual history of both the persistent denial that the diffusion of smoking followed a path from the New World to the Old (or from "savagery" to "civilization"), and the anthropological affirmation that this had indeed been the case.

It seems desirable to review this debate in historical context, and to ask ourselves why a habit involving the combustion and inhalation of a solonaceous weed became a source of endless speculation and fascination, particularly during the period that saw the emergence of a scientific analysis of past and present human cultures. Such a review allows us to understand why the pipe/tobacco/smoking complex not only achieved prominence as a catalyst in culture contact, but has a unique place in the history of Western thought. Since Cartier's day, pipes had been discussed as much as they had been smoked. By the nineteenth century these discussions culminated in a published record, that, while often denying an association of tobacco with Amerindians, actually institutionalized the pipe as a symbol of North American native identity.

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#### A) SPECULATIONS IN THE PRE-VICTORIAN ERA

# Lafitau, Adair and Atwater

The idea that tobacco, smoking or both, originated in Africa, was recorded as early as 1674.<1> Fifty years later, Joseph Lafitau, citing indirect evidence from Maximus of Tyre, Herodotus, Pomponius Mela, Solinus and Strabo, was equally convinced that the classical "ancients" indulged in the habit.<2> Elsewhere in his Moeurs des sauvages Ameriquains, comparées aux moeurs des premier temps (Paris, 1724), <3> Lafitau built a singular edifice of analogical reasoning, in an effort to convince readers that the Amerindian calumet was historically related to the Greco-Roman Caduceus or "Mercury's wand".<4> symbolic, morphological Although based primarily on and functional similarities between the devices in question, the argument was almost certainly formulated from an a priori conviction that evidence of the unity of all peoples during the Patriarchal period of history, could be found in similar, albeit degenerate, vestiges of customs among cultures of later times.<5>

By the end of the century many, writing in defence of monogenism, argued that Amerindians were one of the Ten Lost Tribes of Israel. Among these was James Adair, whose influential

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History of the American Indians (London, 1775)<6> included a set of observations and arguments demonstrating that native peoples were descended from the Jews. His discussion of native pipe and tobacco rituals<7> is spiced with biblical allusions, though it remains unclear whether Adair reckoned the habit originated in the Middle East. Perhaps he thought it best to avoid the subject, particularly since Cherokee effigy pipe art, which often depicted men and women **"puris naturalibus,"** could not "be commended for its modesty," and may have been offensive to orthodoxical sensibilities.<8>

In 1820 the first Transaction of the newly founded American Antiquarian Society was published with a contribution from Caleb Atwater describing antiquities discovered in Ohio and other states.<9> Atwater, who, next to Thomas Jefferson, ranks as the most important figure in the pre-1840 period of American archaeology, argued that the peoples who built the mounds in Ohio and surrounding regions were originally Hindus or Chinese, who migrated to the New World sometime between Noah's Deluge in 2349 B.C. and the founding of Rome in 753 B.C.<10> Describing an effigy pipe found while digging a trench near the Sandusky River, Atwater observed that "the stone from which it is made, is the real talc graphique, exactly resembling the stone of which the Chinese make their idols;" hence, "this article, of course, must have been brought here from a distance, probably from Asia. "<11> Despite advances in archaeological methods and theory, similar denials of an indigenous development of pipe art and technology persisted throughout much of the nineteenth century.

#### B) RUDE CALUMETS AND ARTISTIC MOUND PIPES, 1840-1855

## Catlin, Schoolcraft and Morgan

The 1840s mark the beginning of a series of important ethnographic accounts of native peoples. George Catlin's Manners, Customs, and Condition of the North American Indians (London, 1841)<12> contained hundreds of pages of descriptions and illustrations relating to Amerindian pipes and tobacco-use. Since he had spent years among native groups of the Great Lakes and Plains (who were continuing an ancient tradition of manufacturing, decorating and using elaborate pipes), Catlin was convinced that smoking was ubiquitous among Indians "in their primitive state," though tobacco was "only introduced amongst them by civilized adventurers," to compliment the narcotic weeds, leaves and tree-bark employed in prehistoric times.<13>

Catlin's serious and long-sustained interest in smoking implements is evident not only by their prominence in his popular publication of 1841, but by his preparation, sometime in the early 1850s, of a profusely illustrated monographic study of Amerindian tobacco pipes. A preliminary version, preserved in the Arents Collection of the New York Public Library, was finished as a bound volume, which eventually ended up in the British Museum, where it was found by John C. Ewers and published in 1979.<14> In Plate I of this remarkable portfolio, Catlin constructed a prehistoric pipe typology based on morphological characteristics, in order to show the evolution of form through time (see Plate 8.1).<15> While this was an extraordinary anticipation of typological studies produced a century later, <16> Catlin worked with a peculiarly skewed sample of archaeological material recovered from fields and mounds having widely distributed proveniences. All specimens recovered from the ground were called **barrow** pipes and were considered "exceedingly rude," suggesting "that smoking among North American Indians has been a very ancient custom." By comparison, the examples collected by Catlin from living natives, and illustrated in the rest of the manuscript, "show distinctly their progress in manufacture." <17> It will probably remain a mystery why Catlin either ignored or was unfamiliar with the Mound Builder effigy pipes, which archaeologists had by now heralded as "unsurpassed by any specimen of ancient American art. "<18>

Given Adair's circumlocutory discussion of Cherokee sexual iconography, it is of interest to observe that, in the British Museum manuscript, Catlin grouped all effigy pipes depicting nudity in a single plate of "obscene carvings." <19> Although he emphasized that these depictions were "exceedingly rare," and encouraged the Victorian mind to view them abstractly "as works of native art and design, independent of propriety or taste," it was apparently necessary to conceal the plate in a locked compartment at the end of the volume.<20> One Winnebago pipe bowl in the shape of a fully erect penis underwent a miraculous transformation into a respectable rectangular form, sometime before it was included in Catlin's published product of 1841.<21> The variety of sexual positions depicted on these pipes, and the

detail of their artistic rendering, would have been a source of fascination for the same bourgeoisie that made Chadwick's report on slums and sewers a Victorian best-seller.<22> Had Catlin's "obscene carvings" been released to the public, they would have greatly contributed to what was, as will soon become apparent, an on-going debate over the association of pipe smoking with savagery.

Meanwhile, Henry Rowe Schoolcraft, who, unlike Catlin, had experience that was well-rounded in all aspects of Amerindian ethnology, linguistics, mythology and archaeology, was also preparing large quantities of data for publication. When, in 1845, he published his interpretation of the infamous discoveries at Grave Creek Mound, he appeared to support the idea that the Mound Builders were a superior race unrelated to the Indians. <23> Ironically, the same stone tubes which Catlin would have included in the category of "exceedingly rude," Indian barrow pipes, were tentatively thought by Schoolcraft to have been sophisticated telescopes utilized by ancient astronomers.<24> He concluded that "the degree of skill evinced by these curious instruments is superior to that observed in the pipe-carvings and other evidences of North American Indian sculpture."<25>

In 1846 Schoolcraft published his Notes on the Iroquois, <26> in which, among many other observations, he included information supplied by Chester Dewey. On a site in New York the latter had recovered pipes which appeared to belong to three distinct time periods. A human effigy pipe suggested "an earlier age and

people," who may have been different from the local Indian inhabitants, and who had features similar to those found in Central America. An ordinary limestone pipe indicated "the work of the savage or aborigines," while a red clay pipe was evidence of "the age of French influence over the Indians."<27>

Schoolcraft, who had an early interest in geology, felt that the same classificatory rigor applied by scientists to the works of nature, should be transferred to "relics of aboriginal art." The result was a typology with a typically Linnaean binomial nomenclature, though Latin terms were replaced by Amerindian and English equivalents.<28> The reasoning behind this scheme was outlined in the preamble to the typological section of Notes on the Iroquois:

It will tend to render the work of antiquarian examination exact, and facilitate comparison, if names descriptive of the general classes and species of each object of archaeological inquiry be introduced. No science can advance if the terms and definitions of it be left vague... To establish the classes of articles, names are introduced from the Indian vocabulary. These are qualified by specific terms, adjective or substantive, from the same class of languages, or from the English; rarely from other sources. A nomenclature derived from such sources, appeared preferable for these simple objects of art, to one taken from ancient languages, whose prerogative it has so long been to furnish terms for science and art.<29>

The "class of antique pipes" received the appelation Opoaguna--an Algonquian term for "pipe"<30> --despite the fact that all specimens in the typology were Iroquoian in origin. All effigy pipes had non-Amerindian "species" names such as Azteek, Iberic and Etruscan (see Plate 8.2).<31> Although Schoolcraft probably recognized that these smoking devices were of Iroquoian manufacture, the ethnocentric nomenclature make the culture-chronological implications of his typology unclear. It is possible that the allusions to "higher" civilizations were intended merely to bolster the artistic reputation of the Iroquois, rather than to postulate design influence from remote In any case, by the time Schoolcraft published his regions. massive Indian Tribes (Philadelphia, 1851-57),<32> he was much more certain that even the great mounds of the Ohio Valley, and hence the pipes they contained, were the work of the ancestors of the North American Indians.<33> Buried as they were in an unindexed and disjointed treatise, such views were ignored, and scholars continued to attribute mounds and effigy pipes to foreign peoples and influence.<34>

In the 1850s Lewis Henry Morgan, often regarded as the most social scientist in nineteenth-century important America, published his League of the Iroquois (Rochester, 1851), <35> which is widely recognized as the first ethnography ever written. Numerous detailed observations of the Iroquois use of tobacco in horticultural and ceremonial practices led Morgan, unlike Catlin, to conclude that not only the pipe, but also the plant, was part of prehistoric Amerindian life and, indeed, was a "gift of the Indian to the world" ("but a gift," he felt obliged to add, "of questionable utility").<36> His brief discussion of archaeological materials included a description and illustration smoking devices, and here Morgan demonstrated a tolerable of command of the spatial and temporal dimensions of the finds. Pipes were attributed to relative periods of time, and intrusive

specimens from other Indian cultures were identified.<37> A Mound Builder's pipe, of a Hopewell platform type, recovered in a Seneca grave, required some explication. Although Morgan admitted that in material and in finish it was "superior to the pipes of the Iroquois,"<38> he wisely avoided the awkward implication this had for the evolution of prehistoric art and technology.

## Squier and Davis

While Catlin, Schoolcraft and Morgan are popularly known for their work among living Amerindians, their speculations on prehistoric matters are rarely mentioned in historical summaries of the period. A work appearing at about the same time, however, was most definitely archaeological in nature: E.G. Squier and E.H. Davis' Ancient Monuments of the Mississippi Valley (Washington, 1848).<39> This contribution marked the beginning of, what Willey and Sabloff<40> have called, the "Classificatory-Descriptive" period of American archaeology, and remained the most influential book on Amerindian antiquities for the next half-century.

Squier and Davis adhered to the predominant theory that the ancestors of modern Indians could not possibly have erected enormous mounds,<41> and hence the contents of these tumuli were attributed to an ancient superior race. Among the most striking corroborations of this self-fulfilling hypothesis was the recovery, in the mounds, of hundreds of unique tobacco pipes unlike any observed among living Amerindians. These artifacts were so numerous and varied that their illustration, description and analysis dominated much of the book, and they became crucial in the central argument itself. The manner in which the objects, we now recognize as Hopewell effigy pipes, were conceptually distinguished from later "Indian" versions, reveals how the tobacco pipe was more than a mere smoking device, but a symbol of cultural identity and accomplishment.

Squier and Davis were faced with a potentially disturbing dilemma. "The mound-builders were inveterate smokers."<42> Indeed, "from the appearance of these relics it is fairly inferable that, among the mound-builders as among the tribes of North American Indians, the practice of smoking was very general if not universal. "<43> How could a custom which Catlin had noted was "uniformly in constant use amongst the poor Indians, "<44> have been shared by the sophisticated peoples who built the mounds? If anything, this suggested a continuity rather than a difference between the ancient civilized race and the nineteenth-century savage.

Squier, who did most of the writing, found a brilliant strategy, both to circumvent the apparent contradiction and use the shared trait to the advantage of the Mound Builder myth. He downplayed the smoking connection and concentrated on the relative merits of the art and technology produced by the two "races." He even went so far as to sometimes omit, in his engraved illustrations, the "unessential parts" (identifying

objects as functional smoking devices), in order to emphasize and highlight the effigy sculptures on Hopewell platform pipes. His scientific conscience did, however, prompt him to concede that the bulk of Mound Builder sculpture "will be found to have subserved the purposes of pipes."<45>

If the function could not be effectively divorced from the art, then at least one could contrast the technological and artistic sophistication of objects manufactured for similar purposes. Although Catlin had greatly admired the ingenious production and ornamentation of smoking devices among living Indian tribes, even he admitted that the technology, which may have been "staggering the wits of the enlightened world," <46> was rudimentary when one understood the simple procedure of burning out the pith of ashwood stems or sculpting a relatively soft stone with a knife. Squier and Davis were, cf course, much more eager to degrade the contribution of the American Indian. They pointed out that the pipes of the "later race" were manufactured from clay, coarse-grained granite or, more often, "of steatites and other soft and easily worked varieties of stone. (47) Moreover, "as works of art," the Indian pipes were "not in general elegantly sculptured," and were, indeed, "immeasurably inferior to the relics from the mounds. "<48>

While Indian manufactures were produced from poor and lowly substances, the raw materials employed by Mound Builders drew a volley of • metaphors alluding to the loftiness of their civilization. Pipes had been cut from stone reminiscent of

"Egyptian marble" or "closely resembling, if not identical with, the Potomac marble, of which the columns of the hall of the House Washington made. "<49> of Representatives at are With unrestrained enthusiasm the artistic quality of the mound pipes All displayed "a truthfulness, was praised to the skies. delicacy, and finish, which we are unprepared to look for, except among the remains of a people considerably advanced in the Some were "executed with strict fidelity to nature, arts. <50> they were "incomparably superior and with exquisite skill; <51> to any remains of the existing tribes of Indians" (see Plate 8.3).<52> In the face of such superiority, "the elaborate and laborious, but usually clumsy and ungraceful, not to say unmeaning, productions of the savage can claim but slight approach." <53> Some of the human and animal effigy pipes made by Indians were admittedly "tasteful:"

But they never display the nice observation, and true, artistic appreciation and skill exhibited by those of the mounds, notwithstanding their makers have all the advantages resulting from steel implements for carving, and from the **suggestions** afforded by European art. The only fair test of the relative degrees of skill possessed by the two races would be in a comparison of the mounds with the productions of the Indians before the commencement of European intercourse. A comparison with the works of the latter however, at any period, would not fail to exhibit in a striking light the greatly superior skill of the ancient people.<54>

Even with European technology and iconographic influence, the best the savage could produce were the fanciful argillite pipes of the Northwest Coast, which had begun flooding museums in the 1830s.<55> Yet:

a much higher rank can be claimed for the mound-sculptures; they combine taste in arrangement with skill in workmanship, and are faithful copies, not distorted caricatures, from nature... So far as fidelity is concerned, many of them deserve to rank side by the side of the best efforts of the artist-naturalists of our own day.<56>

It would have been obvious to most that many Plains calumets, as well as the Haida argillite pipes, with their highly detailed carvings of numerous interlocking figures, required greater skill than was necessary for the production of the most elaborate Hopewell effigy. By shifting the standard of comparison from technological factors, to a more subjective evaluation of artistic merit (based on the degree to which iconography had degenerated from realism to abstraction), Squier and Davis were able to maintain arbitrarily a qualitative separation in the cultural productions of the two "races" and hence, uphold the Mound Builder myth.

Although Joseph Henry, the Smithsonian editor of Ancient Monuments, attempted to ensure that the report was a model of Baconian induction, (57) Squier's claim that "all preconceived notions were abandoned" falls flat in the face of his tenacious efforts to deny Amerindians a comparable sophistication in smoking-pipe manufacture. Historians of archaeology have, perhaps, been too kind in attributing Squier's biases to the tenor of the era. Many of his own distinguished contemporaries, some of whom were intimately familiar with the capabilities of living Amerindians, were likely unconvinced, if not appalled, by the belittling attitude inherent in Ancient Monuments.(58) Yet the book set the tone for much of the rest of the century.

PLATE 8.1

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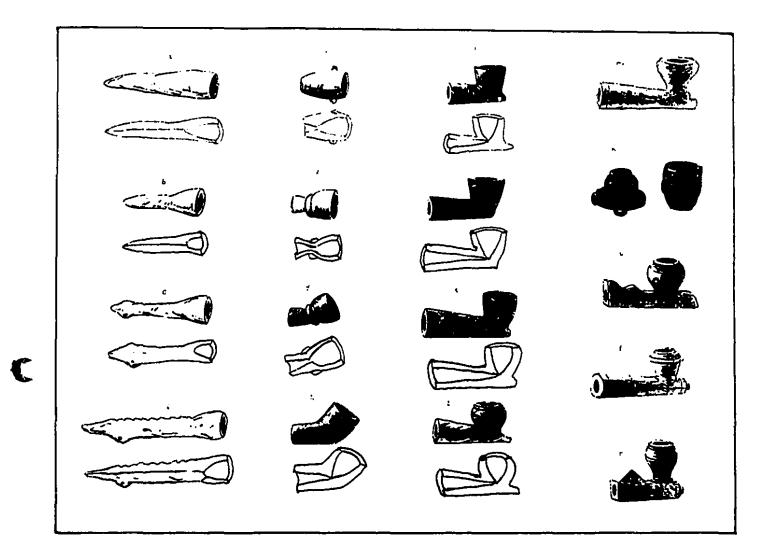
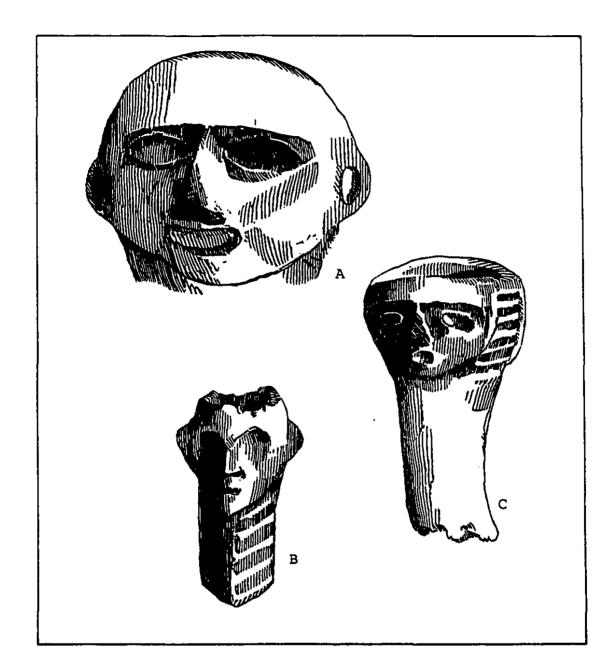
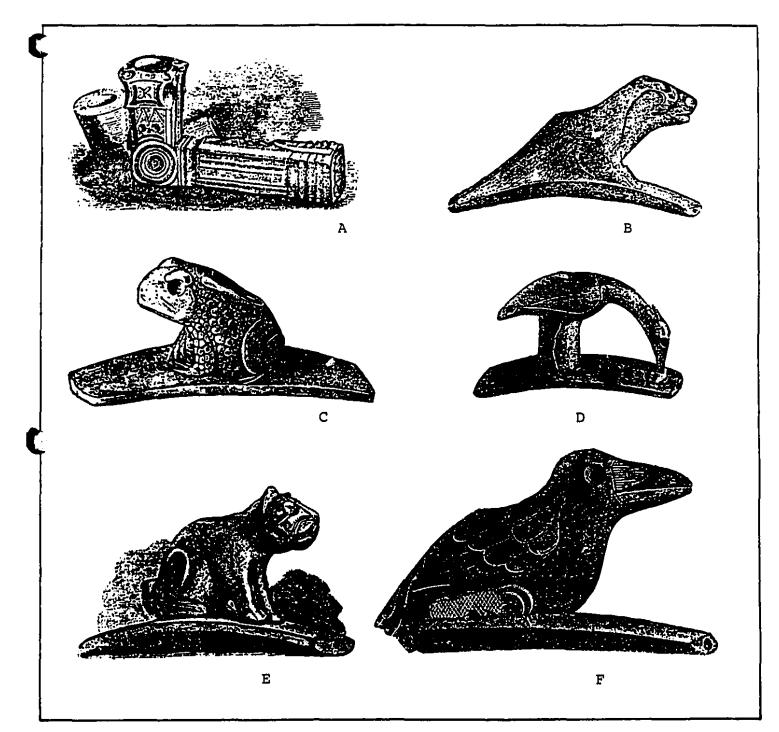


Plate 1 from George Catlin's Portfolio in the British Museum. This typology prepared in the early 1850s was one of the first efforts to show that Amerindian pipes of the Historic period developed from simple tubular types found in prehistoric contexts.

PLATE 8.2



Henry R. Schoolcraft's illustrations of Iroquoian effigy pipes published in his *Notes on the Iroquois* (1846). Each example was considered representative of a different pipe type and identified through a binomial nomenclature. Figure A was called *Opoaguna Azteek*, figure B *Opoaguna Iberic* and figure C *Opoaguna Etruscan*. This, the first Iroquoian pipe typology, created confusion by combining Algonquian terminology with allusions to "higher" civilizations. PLATE 8.3



Selected examples from the numerous illustrations of smoking devices found in Squier and Davis' Ancient Monuments of the Mississippi Valley (1848). Pipes manufactured by "savage Indians" of the Historic period (figure A) were contrasted with the superior productions of the "ancient civilization of Mound Builders" (figures B-F). The differences were stressed as an affirmation of racial distinctions, while the same racial distinctions were used to explain differences in artistic and technological sophistication.

# the American scene

While Catlin, Schoolcraft, Morgan, Squier and others were writing about pipes and mounds, the tobacco habit flourished in the American city, town and countryside. Indeed, tobacco was more American than apple pie. In 1776 George Washington, who himself had been one of the largest tobacco planters of his day, had asked his countrymen to give aid for the army: "If you can't send money, send tobacco. << 59> The following year Benjamin Franklin had borrowed 2,000,000 livres against a credit of Virginia leaf to help the war effort.<60> Thomas Jefferson had also built a fortune on tobacco planting, part of which had been spent excavating burial mounds on his property in Virginia. <61> James Madison opposed a tax on chew and pipe tobacco, since he felt it would deprive "innocent the poor of an gratification. "<62> Mrs. Andrew Jackson and Mrs. Zachary Taylor had smoked pipes while living in the White House, and John Quincy Adams had popularized the cigar. <63> A later President made the "plug" conspicuous by incessantly stuffing bits of compressed leaves into his mouth. <64> With such Presidential support, tobacco-use was bound to increase in the early nineteenth century.

The mode of consumption that was to become intimately and uniquely associated with America was chewing. **Harper's Magazine** claimed at mid-century that "it is particularly a favorite habit with leading politicians, and seems to be a vital qualification for a foreign minister. \*<65> Dickens described the Washington of 1842 as "the headquarters of tobacco-tinctured saliva, \*<66> though the habit was flourishing even more in the hinterlands. Billington notes the disgust felt by many Europeans who recalled (or imagined) the conditions of the American frontier:

All agreed that day and night, year in and year out, frontiersman's jaws were in constant every motion--"chew, chew, and chew; spit, spit and spit, all the blessed day and most of the night, "all moving their jaws rhythmically "as though they were some species of ruminating animal," all unrelentingly, mercilessly, spitting and spitting and spitting-that was the image of the typical frontiersman accepted by Europeans. Charles Dickens believed that they must expectorate in their dreams... Many had perfected such dexterity with tobacco juice that they stirred the reluctant admiration of their harshest critics who could only gape in wonder as they watched the brown stream arch in a perfect porabola into a distant cuspidor... "True," one observer noted, "they are good shots, and one can make sure to three square inches of the spot they aim at; still, when you are surrounded by shooters...you feel nervous..." The inevitable result of universal tobacco chewing was a blanket of dried brown juice that inundated all the West. Floors and boarding carpets homes and inns, houses, of stagecoaches, river steamboats, theaters, courtrooms, legislative chambers, even churches, were so filthy that one's boots were soiled with every step.<67>

Remarkably, many Americans were proud of this image, for it symbolized the freedom, self-sufficiency, space and solitude of the new nation. As Heimann suggests, the "chew" was popular until the frontier mentality finally gave way to cosmopolitan sophistication at the end of the century:

If the philosopher Hobbes was correct in describing life in the natural state as "solitary, nasty, brutish and short," then the passing of the chew signalized the arrival of civilization. In other words, the ascendancy of chawin' terbacker could not be assigned solely to the physical circumstances of the chewer; plenty of it was molared in crowded cities. Chew was supreme when the city was dominated by the frontier and when Americans gloried in being common men, in the ancient Latin sense of the **vulgus**. Toward the end of the nineteenth century, as the industrial revolution set in and the city came to dominate U.S. culture, Americans no longer played the prideful bumpkin but acted like urbane men of affairs. The quitting of the quid meant simply that men were no longer proud of their resemblance to animals.<68>

Heimann may just as well have said that Americans had been proud of their resemblance to the "spittin' savage," for indeed, manufacturers were quick to affirm the connection of tobacco with often included depictions of both Indians and in their advertisements (see Plate 8.4).<69> Retailers, meanwhile, lured customers by placing life-sized wooden statues of Indians outside their tobacco shops. <70> This tobacco industry equivalent of the barber's pole was, perhaps, the most potent weapon in the arsenal of those myth-makers who were promoting an association of tobacco It has been estimated that, at one point in with Amerindians. the U.S., the population of these "cigar store Indians" was half that of living native peoples.<71>

Not to be forgotten, however, was another interest group: the religious moralists, often from New England, who were quick to deny the association of tobacco-use with civilized behavior, and even more ready to emphasize any connection with savagery. Characteristic of these was Orin Fowler, whose **Disquisition on the Evils of Using Tobacco, and the Necessity of Immediate and Entire Reformation** (Boston, 1842)<72> opens thus:

We pity the poor Chinese, who stupifies body and mind with opium, and the wretched Hindoo, who is under a similar slavery to his favorite plant, the Betel; but we present the humiliating spectacle of an enlightened and christian nation, wasting annually more than twenty-five millions of dollars, and destroying the health and the lives of thousands, by a practice not at all less degrading than that of the Chinese or Hindoo. $\langle 73 \rangle$ 

Not surprisingly, Fowler was definite that the "loathsome weed" had originated with the ignoble savage.<74> Besides, if the plant had any worthwhile qualities, God would not have deprived civilized peoples of it for the long period preceding the discovery of the New World:

...it appears that it was unknown to all the civilized world, till within three hundred years; and that even now, all the polished and enlightened portion of community abroad--and we add, a very respectable portion at home--have no fellowship with the filthy weed... Either an important article of the vegetable kingdom, lay hid from the civilized world nearly six thousand years; or since its discovery, the lovers of tobacco have formed an entirely erroneous opinion of its properties... though it was not made in vain, if the world had remained ignorant of it six thousand years longer, no cause of regret would have been occasioned.<75>

#### Victorian image-makers

While Euro-Americans were transformed into ruminating Indians (who, ironically, are only marginally known for this mode of tobacco consumption), Indians were being transformed into Euro-Americans. In the 1830s Catlin painted an Assiniboine chief in full native ceremonial garb on his way to Washington. On the return trip the same native chief was decked out in a European-style regimental uniform; a cigar had replaced the calumet (see Plate 8.5).<76>

The tensions caused by this synethnicity, at a time when

intellectuals were attempting to divorce civilization from savagery, made tobacco-use an ambiguous and hence powerful Nowhere was this more true than in England, where symbol. pipe-smoking had been a national recreation for over two centuries.<77> Early Victorian days saw a continued devotion to the pipe, though the adoption of cigar-smoking made tobacco-use an even more popular practice and led to the development of smoking-rooms, smoking-jackets and smoking-caps as veritable institutions. The replacement of clay pipes with briar versions by mid-century, and the rise of the cigarette after 1870 further enshrined tobacco-use in English social life.<78> Yet, the alleged racial superiority of the Anglo-Saxon in general, and the Victorian bourgeoisie in particular, made any association with the habits of lowly peoples awkwardly problematical. How could such great smokers as Carlyle, Tennyson, Thackeray, Dickens, Darwin and Huxley justify a savage custom within the realm of their social position? From the insecurities of the Victorian smoker emerged a powerful symbol, perhaps best summarized by Bulwer Lytton in 1841: "the man who smokes thirks like a sage. "<79>

The image of smoking as a symbol of English sophistication and profundity was tacitly present throughout the Victorian era, and literature produced in the penultimate decade of the century summed up the ideology of the period. In 1884 the twenty-year-old Arthur Machen published **The Anatomy of Tobacco** ---a curious work in which an effort was made to elevate the mundane smoking habit to a "fumifical philosophy," through a tiresome series of classical syllogisms.<80> In 1890 the dramatist and novelist James Barrie, who later created Peter Pan and became chancellor of Edinburgh University, wrote My Lady Nicotine, in which the compelling prose of this popular writer heralded the romantic essence of smoking.<81> These image-makers were influential in promoting tobacco-use, not merely as a habit, but as part of a bourgeois identity ingrained in the Victorian public consciousness. With such literary fortification the origins of the custom continued to be a matter of widespread fascination and inquiry for decades.

While many Americans could accept that both civilized Mound Builders and savage Indians smoked, some Englishmen could not bring themselves to admit that their favourite weed and pipe had originated in the land of savagery, and they set out to demonstrate a closer, and psychologically more comforting, historical connection with civilized behavior in the Old World. The most imaginative arguments used in support of an Old World autochthony or precolumbian presence of tobacco or smoking, were based on the recovery of "a pipe still smelling of tobacco" found in a wall predating Mohammed, the representation of a "smoking party" on a tomb-painting in Egypt and a pipe carefully extracted from the clenched teeth of a "Celtic" skeleton.<82> Then there was the usual assortment of clay pipes with Roman coins jammed in their bowls and the wonderful discovery of a carved fireplace lintel in a Scottish castle (dated 1510) sporting a fine fox smoking a pipe.<83>

While the pipe was regarded as deeply rooted in the British character (see Plate 8.6),<84> there was intense competition from other Old World quarters. Referring to the Turks, the Persians, and other Eastern nations, an anonymous contributor to **Harper's** observed that "we can not recall them to our minds without imagining the pipe;" indeed, without tobacco, they "seem to have been wanting in their true national characteristics."<85> The same writer admitted, however, that tobacco-use "is seen among all nations, and includes every class of people, from the most savage to the most refined."<86> Such ubiquity was embarassing to those who vied for the pipe as a symbol of ethnicity, but it also made it easier to deny a monogenic origin in favour of independent invention and parallel evolution.

Pseudo-archaeological evidence was often complimented with apocryphal tales slipped into arguments under the guise of authoritative discourse. It was, for example, a common practice to cite G. Sale's popular English translation of the Koran, which first appeared in 1734, but passed into numerous editions throughout the next century. Here, almost unbelievably, Mohammed is quoted as having prophesied that "in the latter days there shall be men bearing the name of Moslem, but who are not really such, and they shall smoke a certain weed which shall be called tobacco."<87>

By 1851 Walpole, who had travelled to Mosul, felt convinced that "nothing European, much less American, could possibly have crept into this remote district of the Old World, whose

inhabitants were living as their fathers had lived for ages. "<88> A diligent inquiry produced an ancient Arabic manuscript in which declared that Nimrod enjoyed tobacco. it was This was supplemented by an Assyrian cylinder in the British Museum that allegedly represented a king smoking. "Lovers of the weed," Walpole exclaimed, "may reasonably hope that the elucidation of the Assyrian history will show us Nimrod making kief over the chibouk. "<89> After all, one "can hardly suppose, that in the comparatively short space of time since the continent of America was discovered by us, the habit could have spread through Europe to the very utmost corners of Asia." Besides, some smoking techniques were so rudimentary that "Adam may have practiced this method, even in the days of his innocence. "<90>

# Daniel Wilson's response

The notion that smoking pipes, if not Nicotiana itself, had a precolumbian antiquity in Europe, received an unlikely stimulus through the publication of Daniel Wilson's The Archaeology and Prehistoric Annals of Scotland (London, 1851).<91> This work, which for unrelated reasons is now considered a landmark in the history of archaeology,<92> drew attention to Scottish Elfin pipes, English Fairy pipes and Irish Dane's pipes --all aparently found associated with Roman or other, prehistoric remains.<93> Unfortunately the author himself, had, at the time, been somewhat confused about the culture-chronological context of the finds, and the Annals were soon quoted or misquoted by an astonishing coterie of antiquarians eager to employ a distinguished authority in promoting the idea that Romans, Scythians, Celts and others smoked tobacco long before the Columbian era.

By 1853 Wilson had moved from Scotland to Toronto, where, despite a dearth of library resources, he still managed to keep up with archaeological developments in Europe. The same year J.C. Bruce published his second edition of the Roman Wall wherein he quoted from Wilson's Annals in support of the possibility that white clay pipes found near the wall of Hadrian dated from the Roman occupation of Northumberland. <94> Wilson was incensed and immediately sent the Society of Antiquaries of Newcastle-on-Tyne a "missive from the land of tobacco" in which he chastised Bruce for popularizing a quotation taken entirely out of context to the threat of his reputation.<95> At the same time, he published a 52-page "Bagatelle" titled Pipes and Tobacco: An Ethnographic Sketch (Toronto, 1857)<96> which was also sub-titled "notes on the narcotic usages and superstitions of the Old and New World."

A careful reading of his rather disorganized discussion reveals two main themes. First, the monograph was to serve as an affirmation of the precolumbian antiquity and Amerindian origin of smoking, <97> though Wilson felt inclined to follow botanical authorities in the assertion that **Nicotiana rustica**, but not the pipe, was native to Asia.<98> By now the works of Catlin, <99> Schoolcraft, <100> Morgan<101> and Squier and Davis<102> had been published and were still fresh on the minds of scholars. Wilson's perusal of these sources, as well as his own weekend excavations in the hinterlands of Ontario, <103> led him to

conclude that smoking devices could not possibly have been a recent introduction to the New World. Since archaeology had, however, not yet developed the chronological sensitivity necessary to build a temporally-diagnostic pipe typology, the precolumbian attributions were derived from a number of intuitively-based impressions.

If the numerous smoking implements found in American soil could not be dated to the satisfaction of European sceptics, then at least the ubiquitous presence of the pipe in post-contact Indian ritual would settle the matter. Here Wilson appealed to those influenced by the stereotypes first created by image-makers in the previous century. The pipe was the "special feature, or peculiar symbol" of the American Indian, in the same sense that other ethnic markers identified distinctive groups within the bourgeois taxonomy of "savage" peoples:

The cannibal New Zealander, the large footed Patagonian, the big lipped Babeen, the flat-headed Chinook, the woolly-haired Negro, the clucking Hottentot, and the boomerang-armed Australian, has each his special feature, or peculiar symbol, more or less fitly assigned to him; and not less, but more distinctly characteristic than any of these are the scalp war-trophy, and the peace-pipe of the American Indian,--the characteristics not of a tribe, or a nation, but of a whole continent. $\langle 104 \rangle$ 

By promoting this theme, Wilson sought to strip public consciousness from competing images, which he found to be "homely and prosaic:"

...though we associate the chibouk with the poetical reveries of the oriental day-dreamer, and the hookah with the pleasant fancies of the Anglo-Indian reposing in the shade of his bungaloose: nevertheless, the tobacco pipe constitutes the peculiar and most characteristic symbol of America, intimately interwoven with the rites and superstitions, and with the relics of ancient customs and historical traditions of the Aborigines of this New World.<105>

A scarce two years earlier H.W. Longfellow, the most popular American poet of the nineteenth century, had been inspired (by Schoolcraft's work on Indian tribes)<106> to write The Song of Hiawatha (Boston, 1855), <107> in which the calumet had a prominent, if incongruous, place in a curious syncretism of Algonquian/ Iroquoian spirituality. Wilson praised the renowned poet for having redeemed the pipe "from associations, not only prosaic, but even offensive. "<108> In so doing, the Scottish took prehistorian advantage of the temporary poetic revivification of a "savage" rapidly declining towards his late nineteenth-century ignobility.<109>

The second reason for publishing Pipes and Tobacco was to clarify Wilson's position on Roman smoking and to put an end to the alarming florescence of arm-chair scholars who were citing him as an authority on antique pipes. To the chagrin of both Wilson and Bruce, British antiquarians seemed more interested in the origins of smoking than in Roman archaeology and Scottish prehistory. It was observed that the passage on pipes taken from The Archaeology and Prehistoric Annals of Scotland, (110) and reproduced in The Roman Wall, (111) "had curiously enough, and vexatiously enough, been more quoted and translated, perhaps than any other." <112> While forgetting his own original ambiguity on the subject, Wilson blamed Bruce for taking from the Annals "just as much as sufficed to give a delicate flavor of possibility to the fancy, so pleasant to the mind of a genuine devotee of the

luxurious weed, that the tobacco-pipe is a classic institution:"

I doubt not but the learned Roman antiguary of Pons Aelia, in his zeal to provide the Tungrian Legionaries of old Borcovicus, or the Spanish Varduli of Bremenium, with the consolations of a pipe, to beguile their dreary outlook from that bleak Northumbrian outpost of Imperial civilization, most honestly and unwittingly overlooked whatever failed to square with the manifest fitness of so pleasant a conceit; nor did it ever occur to me to think of putting the old Tungrian's pipe out, by continuing the quotation, until now when, in the tardy access to British periodicals, I find myself quoted as an authority for the antiquity of the tobacco-pipe, --not only by those who, favouring such an opinion, are willing to count even the most lukewarm adherent on their side, but by others who treat me as Oliver Proudfoot, the bonnet maker, did his wooden soldan, which he set up merely for the pleasure of knocking it down... I must confess to a decided objection to being held responsible for opinions quoted only for the purpose of refutation, when as it would seem, these are read through such a refracting medium as the Roman spectacles of an antiquary, who may be assumed without any disparagement to be a little wall-eyed. <113>

Wilson's allusions to British serials referred to a plethora of articles on ancient smoking published in the Daily Mail, Illustrated Times, Chambers' Journal and other periodicals.<114> The misuse of his Annals in such high-profile forums was particularly irritating and Wilson could scarcely restrain his caustic humour:

I was somewhat surprised to find myself... figuring alongside of a singularly creditable array of chivalrous archaeologists, all knights of the ancient tobacco pipe, and ready to shiver a lance with any puny modern heretic who ventured to question that Julius Caesar smoked his merchaum at the passage of the Rhine, or that Herodotus partook of a Scythian peace-pipe when gathering the materials for the birth of History.<115>

Since only fifty copies of **Pipes and Tobacco** were printed in the sequestration of nineteenth-century Toronto, <116> Wilson's clarifications went virtually unnoticed until they were repeated in his popular **Prehistoric Man: Researches into the Origin of Civilisation in the Old and the New World** (Cambridge, 1862).<117> Although here the author unequivocally attributed dates no earlier than the sixteenth century to pipes found in Europe,<118> many "knights of the ancient tobacco pipe" refused to concede that the evidence was indubitable and clung to the story that the nicotian indulgence (to which most were presumably addicted) had indeed an honorable classical heritage. Associations with the "savage" of the New World were to be excised from the Victorian smoking parlor, for the Rousseauist image of the Native American was giving way to evolutionary progress.<119>

#### other debunkers

Aside from Wilson, the most important scholars who had something to contribute to the controversy were tobacco historians, of which the nineteenth century produced at least a dozen.<120> Of these, the Englishman F.W. Fairholt and the American E.R. Billings deserve special mention, since their voluminous writings became classic treatises.

Fairholt's Tobacco: Its History and Associations (London, 1859)<121> included a section on Indian pipes<122> which contained extensive quotations from the works of Squier and Davis,<123> Wilson<124> and Catlin.<125> As a Fellow of numerous antiquarian societies, the author was undoubtedly familiar with the on-going tobacco and pipe debates and certainly had a copy of Wilson's "bagatelle" at his disposal.<126> With reference to those antiquarians who "have not scrupled to do battle for vulgar tradition and have fought lustily for the Celtic and Danish origins of tobacco-pipes," Fairholt adverted to the numerous post-depositional disturbance processes whereby ancient and modern artifacts end up in the same stratigraphic context.<127> Without an archaeological sensitivity for such Processes, had a tobacco pipe "been found on Mount Ararat, it might have been affirmed to have been smoked by Noah."<128>

But the most striking negation of a precolumbian antiquity for the nicotian habit in the Old World did not come from what was preserved in the ground, but from what was absent in the annals of recorded history:

It is certain that the fumes of plants were used in medicine from a very early period; but the wild assertions deduced therefrom as to the early custom of tobacco smoking in the Old World, can only be classed among "the curiosities of literature," inasmuch as no one of these writers has attempted to explain the extraordinary fact of the total silence of all persons as to the custom in Europe, either in ancient or modern times. It is in fact not till long after its European advent, in comparatively modern times, that we meet with these assertions and conjectures which presuppose the monstrous improbability that the world had smoked on unwittingly for some three thousand years, and then accepted the "weed" from the aborigines of America as a new gift.<129>

The "monstrous improbability" was also extended to the Chinese, though Fairholt was, "from the nature of their policy, restricted from a proper investigation of the truth of much that they assert." <130> In his Tobacco: Its History, Varieties, Culture, Manufacture and Commerce (Hartford, Conn., 1875), <131> Billings was much more certain that the Chinese had invented the

tobacco pipe independently of the North American Indian.<132> He also concurred with other writers that non-nicotian herbs had been smoked in rudimentary clay and reed pipes in England centuries before the discovery of America, though the artifacts popularly known as fairy pipes, Dane's pipes, elfin pipes and Celtic pipes did not belong to the "pre-Raleigh period."<133>

Complementing such books were a plethora of articles on pipes and tobacco which began appearing with the rise of numerous antiquarian serials in the 1870s.<134> By now most North American scholars were committed to Wilson's idea that the pipe was indeed the ultimate symbol, not of British profundity, but of the "Red Indian." The **Canadian Antiquarian and Numismatic** Journal even incorporated a calumet (together with a beaver, a Roman coin and other symbols), as part of its official insignia. In 1875 R.W. McLachlan, writing on "Indian Stone Pipes" in this same periodical, perpetuated the stereotype:

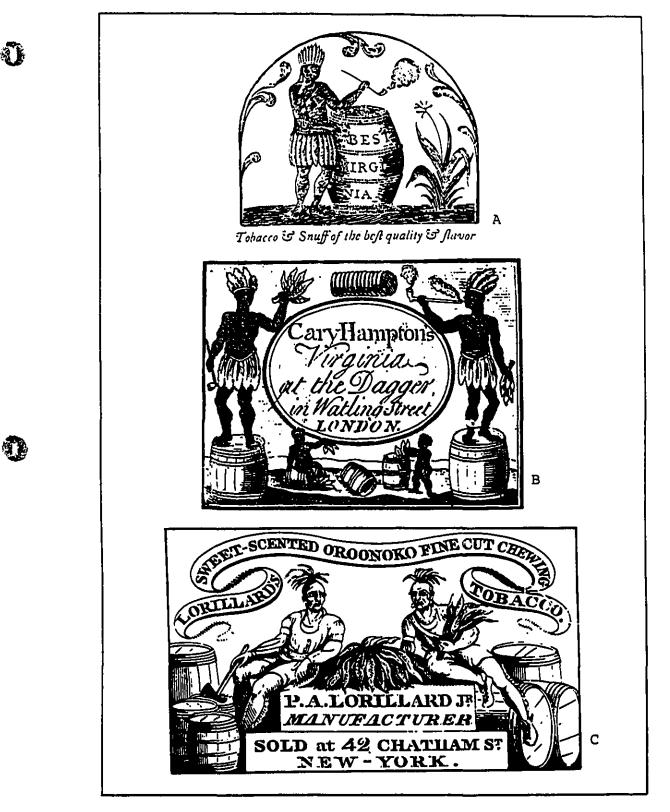
While Egypt has left us her mummies, Etruria her vases, Greece her sculptures, and Rome the trophies of her conquests, by the collection and study of which we can form some conception of the prevailing emotions and methods of action of the great races who have acted their part in the old world's history, let us not forget the peace pipe, and all the associations clustering around it regarding the fast fleeting Red races who have left their mark on this our new world.<135>

In an article published the following year in the popular science journal **Nature**, Charles C. Abbott argued that the Amerindian pipe offered "an exception to the assumed rule that the ruder antedate the more finished specimens" of primitive manufacture. Having observed that, in America, even the earliest

pipes were already of a fully established, polished stone or Neolithic technology, he concluded that "the custom of smoking was introduced or established after the red man had attained to the higher division of the Stone age; and that the first pipes were of perishable materials."<136> Indian pipes, which he felt were contemporaneous with those of the Mound Builders, showed no stylistic influence from the latter, while calumet-type pipes could not be traced to earlier and simpler forms and may have "originated **de novo.**"<137> Although based on limited samples and the usual confusion of ethnicity with race, Abbott's efforts did affirm the antiquity of the smoking complex among all "races" in America and promoted the possibility that Indian pipes were not merely later, degenerate forms of Mound Builder versions.

That smoking had been common in "Neolithic" America was reluctantly accepted, though Wilson's insistence that no parallel development had occurred in Europe continued to encounter widespread opposition. Even Edwin Barber, who in 1879 published two articles in **The American Antiquarian** defending Wilson's argument,<138> left the question open: "we have no positive proof that pipes were in use in Europe before the Columbian discovery of America," he concluded, "but if it can be shown that such was undoubtedly the case, it is reasonably certain that such objects were employed in medicinal remedies or for the purposes of fumigation."<139> How and why such a usage rapidly developed into a social recreation only **after** contact with Amerindians, who (it was generally accepted) smoked with a decided ritual restraint, was never explained.<140>

PLATE 8.4



English advertisements promoting nicotian products in the seventeenth and eighteenth centuries often took advantage of a popular association between Amerindians and Virginia tobacco (figures A and B). By the nineteenth century such an image was difficult to reconcile with the bourgeoisie notion of smoking as civilized behavior. Many Americans, however, did not find the association problematical and manufacturers of chewing tobacco continued the tradition (figure C).

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Figure A is George Catlin's illustration of *Wi-jun-jon* (an "Assineboin warrior") on his journey to Washington in the 1830s. Figure B shows the same individual on the way back to his people. A regimental uniform and cigar have replaced native dress and calumet. Synethnicity and transculturation disrupted the neat boundaries between "savagery" and "civi-lization."

в

THE BRITISH CHARACTER

Loce of Pipe-muking.





В

Figure A is a cartoon from Graham Laidler's *Pont* which lampooned the British predilection for pipe-smoking. Figure B is an 1875 Sambourne caricature of Charles Darwin as a "tree-climbing Anthropod" smoking a pipe. The image is a potent reminder of both a man and a habit caught in an intellectual limbo between savagery and civilisation. Figure C is an engraving from an 1881 photograph of T.H. Huxley, the distinguished nineteenth-century defender of Darwinism. The association of great thinkers with pipe-smoking contributed to the reputation of the habit as a symbol of profundity during this period.

С

## D) TROJAN PIPES AND BUDDHIST ELEPHANTS IN THE 1880S

#### the continuing interest

The penultimate decade of the nineteenth century saw an outpouring of contributions unprecedented on piper and tobacco.<141> Jean F. Marquis De Nadaillac, who was already known as the most prominent French populariser of the findings of American Archaeology, <142> entered the annals of tobacco history with Les Pipes et le Tabac: Materiaux pour l'Histoire Primitive et Naturelle (Paris, 1885). <143> This work did much to promote the antiquity and use of pipes and tobacco as a subject of By now the wealthy English antiquarian interest in Europe. William Bragge (who may have commissioned the completion of Catlin's pipe portfolio), <144> had amassed the largest and most diverse collection of smoking devices ever assembled. Much of this important ethnological and archaeological collection ended up in the British Museum and was complemented with tolerable provenience records. Bragge, moreover, compiled Bibliotheca Nicotiana (Birmingham, 1880)<145> which, to this point, had been the first effort to organize the voluminous literature on the subject.

Less ambitious contributions also reflected a growing interest during this decade. In **The American Anthropologist** Garrick Mallery noted that early English voyagers must have mimicked the peculiar mode of tobacco consumption, involving nasal exhalation, from the natives of North America, <146> while,

in Archaeologia, W.J. Hardy traced the seventeenth-century history of tobacco cultivation in England--a question that had "lately been before the public." <147> A.E. Douglass reported to readers of The American Antiquarian that he had found a human effigy pipe in Central America at a depth of twenty-five feet--evidence that appeared to justify "considering it an authentic pre-columbian relic. "<148> Based on а careful examination of a stone effigy pipe from a mound in Tennessee, W.K. Moorehead theorized that platform pipes once had long stems reminiscent of calumets, and hence, "similar customs to those now in vogue among our Indians existed when these pipes were made. "<149>

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A cogent paper by Edwin Barber, appearing in the American Naturalist, argued that the use of catlinite quarries (at Coteau des Prairies and other locations) for the manufacture of smoking pipes was of considerable antiquity. "It is within the range of possibility," he concluded, "that the aboriginal operations at the Great Pipestone quarry may be proved to have antedated the Spanish discovery of America by many centuries."<150> In another article Barber admitted that it may be "impossible to determine what was the earliest form of tobacco-pipe," though "the symmetrical and highly-finished specimens which the mounds have produced" must have been preceded by "rudely fashioned" devices made from perishable materials.<151>

In his popular **Primitive Industry** (Salem, Mass., 1881),<152> Abbott prefaced a lengthy chapter on pipes with a statement typifying the prevalent belief that an understanding of the evolution of tobacco-use was crucial to the reconstruction of culture history:

Nothing of all the handiwork, in stone or clay, possesses so great an interest, and recalls so vividly the early history of America, as the tobacco-pipe. Whether as the merest fragment of a pipe of clay, or as a carved and polished stone specimen, they bring back to us the image of the dusky warrior, gorgeous in feathers and vermilion, bearing with the dignity of a king his ever-present pipe.

The sorrowful history of the long series of broken treaties between the American Indian and the European settler is made up of promises and ceremonial smoking; but the clouds of the fragrant smoke and the white man's recollection of his promises were equally evanescent.

When, happily, we find an occasional pipe in our rambles, or, disturbing the ashes of some forgotten hero, we rifle the grave of this, the chiefest of his possessions, we are apt to think of it only as a mere "medium through which the narcotic influences of tobacco were imparted."

Smoking pipes, however, have other and more interesting significances, and are inseparably connected with the whole social system of American native races. To know the whole history of tobacco, of the custom of smoking, and of the origin of the pipe, would be to solve many of the most interesting problems of American ethnology.<153>

Abbott disputed the common opinion that fine-grained clay pipes had not been made by American Indians and pointed out that there existed "many grades of excellence" and that neither end of the continuum was "beyond the capabilities of the redman." <154>

William Beauchamp had, similarly, found pipes of various technologies in the same Iroquois graves, which seemed to imply that disparate styles and manufacturing techniques did not necessarily indicate ethnic or racial difference.<155> Beauchamp, Francic LaFlesche and Alice Fletcher also contributed important ethnographic reports on the symbolic role of pipes and tobacco in Iroquois and Omaha cultures.<156> The emphasis here, and in numerous other articles, was on description and classification rather than speculation. The result was a slow accretion of scientific evidence that tacitly eroded the hopes of those who still sought to minimize the association of tobacco-use with savages.

Ironically, the same Spencerian ideology that lent support to a racist disengagement of savagery and civilization, was also a suitable intellectual backdrop for the "comparative method," whereby the sociocultural systems of ancient Europe could be extrapolated from the better-documented technology, practices and institutions of "savage" survivals in America and elsewhere. Wilson, who, by the 1880s, had become President of the University of Toronto, was himself a proponent of this methodology, maintaining that the life-style of the North American Indian was in certain respects indicative of conditions in prehistoric Europe.<157> His faith in the doctrine of psychic unity and parallel evolution would have offered a convenient argument for the independent New and Old World invention of smoking devices, had not his archaeological intuition led him to postulate a post-columbian diffusion.

That the "comparative method" could support both sides of the pipe debates is suggested by the work of John William Dawson who served as principal of McGill University from 1855 to 1893. Much like Wilson, Dawson's interest in pipes and his conclusion that they were of precolumbian antiquity in America, was fueled by his personal excavation of smoking devices in prehistoric Indian sites.<158> The practice of smoking, he averred, "is one of the few habits which men calling themselves civilized have thought fit to borrow from these barbarous tribes."<159> Yet in his Fossil Men and Their Modern Representatives: An Attempt to Illustrate the Characters and Condition of Pre-Historic Men in Europe, By Those of the American Races (Montreal, 1880),<160> the idea of psychic unity as a progenitor of parallel evolution, as well as a fidelity to the "comparative method," resulted in a discussion wherein Dawson, unlike Wilson, was prepared to furnish Paleolithic Europeans and Trojans with peace pipes:

smoking should have prevailed That the usage of throughout America, and should have been connected with the religious and social institutions of all its tribes, and that it should not have existed in the old world till introduced from America, seems singular, yet the belief at one time entertained that the "elfin pipes" found in Britain indicate ancient usages of this kind, and that smoking is an old institution in Tartary and China, where one species of tobacco is native, seems now generally discredited. Still it is not impossible that there may be some foundation in fact for the conclusion of Pallas, who argues from the general use of tobacco by the Mongol tribes, the primitive and original forms of their pipes, and the similarity of their modes of using the plant to those of the Americans, that the custom must be indigenous among them. If so, it would not be surprising that even the Paleolithic man of Europe, in his dark cavern abodes, enjoyed the solace of the fragrant weed, smoked the calumet of peace with his former foes, and, like his American brethern, fancied that he saw spiritual beings... Archaeologists should keep this in view in searching for the relics of the Stone period.

Certain clay tubes, suspiciously resembling tobacco pipes, are figured among the remains obtained by Schliemann on the site of ancient Troy; and on the other hand, a figure of an owl's head, remarkably like those found in the ruins of Troy, occur on many Huron pipes.<161>

It should be noted that Dawson's reasons for entertaining the possibility of prehistoric Old World smoking differed from the racist proclamations of Victorian gentlemen who, as has been noted, sought to rid the philosophical pipe of its "savage" connotations, by assigning it a pedigree with roots in classical civilization. For Dawson, there was nothing savage about the Amerindian pipe, and, while he glorified the socio-political and religious usages of the calumet, he lamented that "from this high place it has descended among the civilized imitators of the red man to be merely the solace of their idle hours. "<162> In this he concurred with Wilson who also bemoaned the fact that Englishmen had "perpetuated into a common practice of mere sensual indulgence, what was once a solemn rite associated with the mysterious worship of the sacred enclosures and the altar-mounds of the Mississippi Valley." <163> The struggle for image could produce convenient rhetorical reversals: the cerebral Englishman of Machen and Barrie was occasionally obliged to trade places with Longfellow's Hiawatha.

Distinguished evolutionists committed to the comparative method, including Lubbock, Morgan, Frazer and Tylor, sprinkled their writings with descriptions of pipes and smoking.<164> But these were intended to illustrate more lofty ethnological questions, and the authors did not concern themselves with the raging controversy over the antiquity or original provenance of smoking. The silence from these quarters must be attributed to the indifference felt by some on a subject that Wilson admitted might superficially appear "insignificant and even puerile."<165> The image-makers obviously felt otherwise.

Meanwhile, the issue of a racial distinction between "Mound Builders" and "Indians" was bitterly contested and, predictably, smoking pipes continued to serve as prominent weapons in the arsenals of the myth-makers. According to Daniel Wilson, Squier and Davis had greatly overrated the artistic merits of Mound Builder effigies and this had prompted subsequent scholars to attribute an extra-continental origin for the smoking devices and the "race" that designed them. <166> Wilson, who had examined the mound pipes firsthand, felt the art represented "only a stage in advance of the imitative faculty so strikingly apparent in inferior similar, though specimens of modern Indian sculpture. <167> This he could assert with some certainty, for he had been impressed by the "curious imitative art" of Huron effigy pipes excavated on sites near Lake Simcoe, Ontario. <168> By minimizing the artistic difference, he sought to close the formidable gap in intellectual aptitude that Squier and Davis had created between Mound Builders and Indians. Indeed, "were those miniature works of art the sole memorials of the Mound Builders, there would be no reason for regarding them as other than ancestors of the forest tribes, among whom the artistic faculty had been developed, in all probability, along with other corresponding elements of incipient civilization. "<169>

Yet, for Wilson, there were two distinct and contemporaneous races in ancient America, <170> and, if the pipes failed to

suggest major intellectual distinctions, they did shed light on the origins of the intrusive Mound Builder race. There appeared no reason to postulate a migration from the Old World, though the presence of exotic, tropical birds and animals on the pipes certainly suggested a familiarity with, and probably a migration southern latitudes.<171> from, In support of this hypothesis Wilson the "striking resemblance" offered of Peruvian tobacco-mortars to Ohio mound pipes. <172> locating the By precursor of the mound pipe in a New World civilization, Wilson could keep the Mound Builders in America; by denying an Old World origin of a New World race, he could reaffirm tobacco smoking as autochthonous American institution. Although somewhat an circular, the argument made more sense than many of the competing speculations of the period.

Most writers in the 1880s continued to prefer the circular reasoning popularised by Squier and Davis. The Mound Builders were distinct from the American Indian partly because of the evidence afforded by a comparison of pipe technology and art. By the same token, an alleged racial superiority of the Mound Builder accounted for their sophisticated pipe effigies. If the Mound Builders were the original inhabitants of the North American continent and the Indians were incapable of independent invention, then important conclusions regarding the diffusion of the pipe could be deduced. J.E. Stevenson briefly alluded to the issue:

The Typical Mound Builder's pipes were different from any which the Indians possessed. The difference between them, is probably familiar to most of our

readers... Who taught the Mound Builders the use of the pipe will, I may safely say, never be known; but it is possible that the Indian learned this accomplishment from the Mound Builder, and it is a fact that the European learned from the Indian.<173>

Such a scenario the Victorian smoker could inhale with relief. If the pipe had originated in America after all, then at least the savage had been merely an intermediate vehicle in the diffusion of technology from one lofty civilzation to another.

### a bombshell from Davenport

Among the many competing theories about the Mound Builders, a number were inspired by what was popularly regarded as the most sensational archaeological discovery of nineteenth-century North America. In 1877-78 a German-speaking Lutheran minister named Jacob Gass excavated three slate and limestone tablets from a Hopewell burial mound near Davenport, Iowa. The inscriptions indubitably linked the Mound Builders with written language, Old World culture and elephants.<174> Equally sensational was the apparently independent discovery of two stone platform pipes, which, though characterstically Hopewell in design, had carved elephant effigies as bowls (see Plate 8.7).<175>

One of these specimens had ostensibly been found by a farmer in his cornfield in the 1870s. The farmer "did not care whether it was elephant or kangaroo" and was said to have smoked the pipe with indifference towards its archaeological implications.<176> Gass tried unsuccessfully to purchase the unusual artifact, but succeeded in obtaining permission to have casts and photographs

made for the Davenport Academy of Sciences. In the process the pipe was accidentally broken, and, since this rendered it unserviceable as a smoking device, the owner agreed to sell it to the Academy for a nominal monetary recompense. The second elephant pipe was excavated from a mound by another Lutheran minister named Adolf Blumer who happened to be a brother-in-law of Gass.<177>

The elephant pipes became a matter of intense debate during the 1880s. The existence of exotic animals on the effigy pipes of the Mound Builders had frequently been cited as evidence of a familiarity with, or a migration from, other regions. While the decipherment of the Davenport tablets led to the idea that the Mound Builders employed an Asian syllabic that recorded the Noachian deluge or, alternatively, that the Hittites had reached America,<178> the elephant pipes elicited another set of Either the Mound Builders had once a definite inferences. intercourse with the Old World, or their civilization was contemporaneous with an extinct proboscidean, such as the mastodon, and hence, was much older and further removed from the Amerindian occupation of the New World than had previously been thought.

Alarmed by the implications of these alleged discoveries, the Smithsonian Institution's Bureau of Ethnology, under the direction of John W. Powell, began a concerted program to establish **in situ** continuities in the American archaeological sequence and to debunk the 'lost race' myth of the Mound Builders.<179> The first major criticism came in the form of an article on "Animal Carvings from the Mounds of the Mississippi Valley," published by Henry Henshaw in the Second Annual Report of the Bureau of American Ethnology (1883).<180> From the outset Henshaw argued that the smoking pipe was evidence of a cultural, or at least racial, continuity in aboriginal America:

Among the more interesting objects left by the Mound-Builders, pipes occupy a prominent place. This is partly due to their number, pipes being among the more common articles unearthed by the labors of explorers, out more to the fact that in the construction of their pipes this people exhibited their greatest skill in the way of sculpture. In the minds those who hold that the Mound-Builders were the of ancestors of the present Indians, or, at least, that they were not necessarily of a different race, the superiority of their pipe sculpture over their other works of art excites no surprise, since, however prominent a place the pipe may have held in the affections of the Mound-Builders, it is certain that it has been an object of no less esteem and reverence among the Indians of history. Certainly no one among the Indians of institution, for so it may be called, was more firmly fixed by long usage among the North American Indians, or more characteristic of them, than the pipe, with all its varied uses and significance.

Perhaps the most characteristic artistic feature displayed in the pipe sculpture of the Mound-Builders, as has been well pointed out by Wilson, in his Prehistoric Man, is the tendency exhibited toward the imitation of natural objects, especially birds and animals, a remark, it may be said in passing, which applies with almost equal truth to the art productions generally of the present Indians throughout the length and breadth of North America.<181>

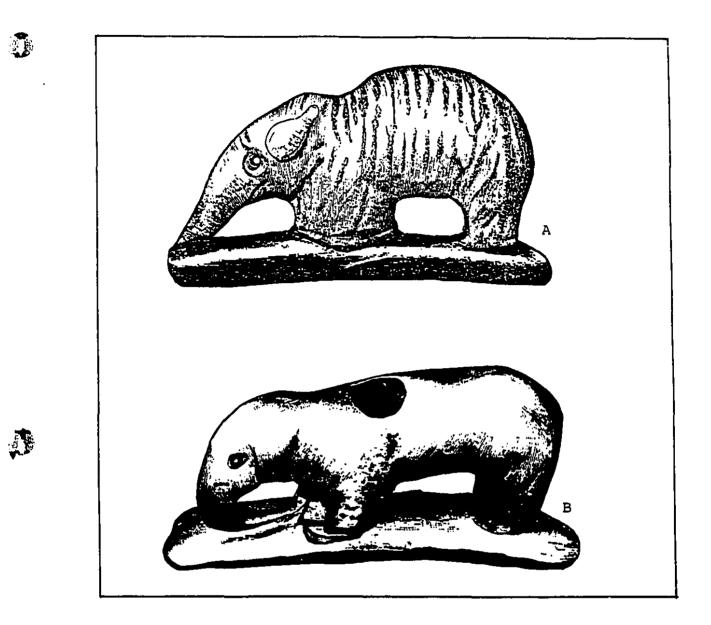
Henshaw, like Wilson, chastised Squier and Davis for having greatly overestimated the artistic accomplishments of the Mound Builders, and for having deceived readers into thinking that the savage Indian had a much inferior aptitude for the realistic representation of natural themes. <182> Yet, the critique went one significant step further. Most scholars, including Wilson, had argued that the existence of exotic creatures on Mound Builder pipes indicated a non-North American homeland of the ancient race. Upon detailed scrutiny Henshaw concluded that there were "no representations of birds or animals not indigenous to the Mississippi Valley," and that consequently, "the theories of origin for the Mound Builders suggested by the presence in the mounds of carvings of supposed foreign animals are without basis."<183> In other words, the faunal representations on the effigy pipes had been so poorly executed by the prehistoric artisans that, not only did the animals and birds have "no reason to feel complimented,"<184> but archaeologists had been duped into making absurd taxonomical misidentifications.

The elephant pipes begged a nagging question, for, despite the notable absence of tusks, even the most guarded interpretation still pointed to the coeval habitation of Mound Builder and mastodon. Henshaw alluded to the suspicious circumstances surrounding their initial discovery, and all but dismissed the pipes as archaeological frauds.<185>

As might be expected, this latter innuendo from Washington did not go over very well in Iowa. In 1885 Charles E. Putnam, president of the Davenport Academy of Sciences, published a scathing rebuttal in the form of a pamphlet entitled A Vindication of the Authenticity of the Elephant Pipes and Inscribed Tablets in the Museum of the Davenport Academy of Watural Sciences, from the Accusations of the Bureau of Lthnology of the Smithsonian Institution.<186> Here both Powell and Henshaw were accused of discrediting members of the Academy for the sake of promoting the preposterous idea that the lost race of Mound Builders were merely Indians.<187> Predictably, E.H. Davis (Squier's co-author) considered Putnam's pamphlets "a triumphant refutation of the accusations of Mr. Henshaw and the absurd theories of the Bureau of Ethnology in the Smithsonian Institution."<188> More surprising is the widespread sympathy Putnam managed to elicit from scholars across the country, who were eager to maintain America's heroic prehistory.<189>

Putnam's articulate defence of the authenticity of the Davenport elephant pipes went far to ensure that these artifacts remained a crucial corroboration of the Mound Builder myth. He, himself, believed that the specimens represented mastodons, and hence, suggested the remote antiquity of a race "of higher type and more advanced civilization" than the Indians. <190> Others saw the proboscidean effigies as evidence of Old World influence. For example, the same year that Putnam published the Vindication, Edward P. Vining wrote An Inglorious Columbus; or, Evidence that Hwui Shan and a Party of Buddhist Monks from Afghanistan Discovered America in the Fifth Century, A.D. (New York, 1885).<191> Among other things, Vining was impressed that "the elephant is in Asia the usual symbol of Buddha. (192) His inclusion of photo-engravings of the two Davenport pipes(193> was intended to lend support to the iconoclasm of a precolumbian discovery of America.

PLATE 8.7



The infamous Davenport "elephant" effigy pipes as they were commonly illustrated in the literature of the 1.7 nineteenth and early-twentieth century. These artifacts had an enormous influence on the development of many different myths about the origins of "Mound Builders" and the evolution of pipe-smoking. Although they had always been controversial, a generation was to pass before they were generally regarded as archaeological frauds. The elephant pipes had a similar role in the curious theory of Ignatius Donnelly, a prominent politician who ran twice for Vice-president of the United States. His popular book, of which at least fifty editions are extant, was first published in 1882 under the title, **Atlantis: the Antediluvian World.<194>** Here Donnelly asserted that the Mound Builders were descendants of the peoples who had once inhabited the fabled sunken civilization. The Davenport pipes were undoubtedly genuine, since, after all, "Plato tells us that the Atlanteans possessed great numbers of elephants."<195>

The debates in the late-1880s over the authenticity and significance of the Davenport discoveries raged on in the pages of such influential journals as the American Naturalist, American Antiquarian, Nature, Science, American Journal of Science, American Association for the Advancement of Science and Zeitschrift fur Ethnologie. <196> Some, like Cyrus Thomas, the director of archaeological explorations for the Bureau of Ethnology, intimated that the pipes and tablets were frauds.<197> Others, like Edwin Barber(198) and Max Uhle (the most outstanding nineteenth-century archaeologist in South America) dismissed Henshaw's criticisms and favoured Putnam's defence. <199> Still others, like Stephen Peet, the indefatigable editor of the American Antiquarian, wavered back and forth, until finally rejecting the tablets and accepting the pipes. <200> The latter were still taken seriously by some scholars well into the twentieth century.

In a brilliant piece of detective work published in 1970, revealed the details of the "Davenport Marshall McKusick Conspiracy." At least one of the inscribed tablets had originated as a roofing shingle from a house of prostitution, while the elephant pipes had been manufactured in the basement of the Davenport Academy of Sciences (probably by the janitor or another Academy member), and planted to the chagrin of unsuspecting archaeologists.<201> The episode illustrates the lengths to which members of a scientific organization would go in attributing a heroic past to a country with a savage reputation. It suggests once again that smoking devices had a significant role in the discourse of the predominant archaeological dilemma Given the strategic use of the Hopewell effigy of the century. pipe by previous myth-makers like Squier and Davis, it is not surprising that the Davenport conspirators employed this artifact class to help drop their bombshell.

E) RESEARCH AT THE END OF THE CENTURY, 1890-1899

### popular literature

As the nineteenth century drew to a close, an increasing proportion of the European and North American population was smoking, and periodicals such as the Canadian Cigar and Tobacco Journal began offering historical sketches on the use of the weed.<202> While these were often anecdotal and even fictionalized, other contributions were serious efforts to

illuminate the origins and subsequent transculturation of the Among these was an uncharacteristically balanced plant. and perceptive article by John Hawkins in an 1893 issue of Popular Science Monthly.<203> Hawkins noted that, for the main idea of the paper, he was indebted to "the late Sir Daniel Wilson, who many years ago investigated thoroughly the narcotic arts and superstitions of the Americans. <204> This indebtedness was reflected in his unwavering commitment to the autochthonous origin of the Amerindian pipe--a discussion that soon prompted an allusion to the problem of a habit shared by both savagery and civilisation:

Comparing the stone age of the New World with that of the Old, an important point of difference comes at once into view. The American race is distinguished in culture from all other savages by the possession and use of an implement to which nothing analogous is found among the prehistoric relics of the Eastern hemisphere. That implement is the tobacco pipe... The use of tobacco excited in the first Europeans who witnessed it feelings of astonishment and disgust. is to be believed, the Spanish ca If Montesquieu Spanish casuists of the fifteenth century offered to the public conscience, in extenuation of the enslavement of the Indians, the fact, among others, that they smoked tobacco. There is other evidence to show that the early explorers of the World regarded the custom of smoking as the New extremity of barbarism; nor have advocates of this view been lacking from that day to this. But, in spite of all objections, tobacco has extended its reign over the entire earth; it is an important source of revenue to che most enlightened of modern governments; it numbers among its devotees men of all races and of all ranks; it solaces the dreary life of the Eskimo and of the Central African savage; but a little while ago it furnished inspiration to the genius of one of the world's great poets. Concerning the adoption by civilized people of a barbarous custom like that under discussion much might be said ... < 205>

Expanding on Wilson's ruminations, Hawkins suggested that smoking first originated in the propensity of ecstatic shamanism for the seeking of visions and subsequently developed into a Amerindian practice where "every man became his general own seer."<206> While this has a surprisingly modern tone (and in some ways foreshadows my own research), <207> the idea that smoking produced "a state of ecstasy or delirium" and was associated with "the theory of animism," <208> would not have received enthusiastic acceptance, even with the parenthetical assurance that "the capacity of the Indian to withstand the of narcotics is much less that of effects than the European. "<209>

An anonymous contributor to a 1896 issue of MacMillan's Magazine observed that studies on the antiquity of smoking sprang from the tendency to link the present with the past and "recognize the unity of our race."

Needless then to say that it is no narrow spirit of mere curiosity that the wise men of Europe have devoted much labour and learning to the task of discovering if the habit of tobacco-smoking, now so common all over the world, existed in Eastern countries before the discovery of America by Columbus.

It is justly claimed for the subject that it possesses interest for a much larger class than professed ethnologists; that it is invested with an absorbing fascination for every earnest student of the history and habits of mankind.<210>

Yet the "wise men of Europe" had obviously engaged in a fatuous exercise, for, had the narcotic been widely known in the East, "the indefatigable Jesuits, who penetrated into almost every nook of the Old World likely to afford a see to Rome, would have made the discovery and noted the fact with their usual accuracy."<211> This did not, however, prevent the author from pointing out similarities in smoking habits between China and America: This identity of practice and habit points to a new link in the chain of evidence, connecting the inhabitants of the New World with the nations of Eastern Asia, more particularly with China.

Bearing on the ethnological aspect of the subject is the fact that pipes have been found on many different occasions in the ancient earth-mounds of Ohio, in the valley of the Mississippi, and in Mexico, some of which are carved in the form of human heads of an unmistakably Mongolian type...

The question, then, naturally arises, may not the Chinese and other half civilised nations of Asia, in their prehistoric migrations to the shores of America, have carried with them not only a knowledge of the tobacco-plant and its use, but also the seed of the plant?...After all, then, we find ourselves in presence of the not improbable hypothesis of an Eastern origin for the tobacco-plant and the habit of smoking its leaves. Let it be conceded that in this we have an instance, among many other, of the Chinaman's way of forestalling the rest of mankind; that it was he who long ages ago first planted in American soil the perennial weed which Europe to-day presents to him as a new indulgence discovered by Western enterprise.<212>

Once again Mound Builder effigy pipes were given a non-Amerindian origin and the smoking habit was firmly rooted in an Old World civilization.

Despite such efforts, few could deny that the vexatious American savage had had a role to play at least in the diffusion, if not the origin, of smoking. Yet, a tolerable distance could be introduced between the Indian and the European if one invoked the fashionable perspective of evolutionary theory to emphasize the subtle refinements in the mode of ingesting tobacco made since the original transculturation of the habit from the Americas to Europe. An effort to demonstrate that the cigarette was an evolutionary advance over primitive smoking devices was made in 1897 by a contributor to **Harper's Weekly** (subtitled "A Journal of Civilization").<213> Here, savagery and civilization were clearly demarcated by conjuring up contrasting imagery associated

#### with smoking methods:

.....

The study of evolution has caused particular attention to be paid to the steps by which man has advanced from the stage when he was a naked savage, living in rocky caves, to that degree of progress which is embodied in the cosmopolitan dweller along the boulevards of Paris or the other equivalent avenues in any great civilized capital of the world... To the savage, a satisfactory smoke once meant partial stupefaction produced by copious inhalations of stifling smoke rising from the damp leaf pressed down and smouldering upon hot coals. Come now to the latest method of smoking and we shall find something of a contrast: we shall see man coming from the opera, taking a few whiffs of light tobacco rolled into a tiny cigarette, and throwing it away when but one-third consumed...

It is not necessary to compare this later, most aesthetic method of enjoying tobacco with that of the savage in order to be convinced that evolution has brought about what may be called a **spiritualizing** of smoking.<214>

Gone was Wilson and Dawson's image of a degeneration from the "high place" smoking occupied in prehistoric America, to the "mere sensual indulgence" of civilized nations. Such an image simply fell in the face of the uni-directional inclinations of an evolutionary trajectory.

### anthropological contributions

While speculations on the origin of the tobacco habit continued in public discourse, American archaeologists were discovering and reporting on prehistoric smoking devices of all kinds. Max Uhle described a snuffing-tube found at Tiahuanaco,<215> Clarence Moore wrote of pipes found in Florida shell heaps,<216> George Patterson discussed the monitor pipe in Nova Scotia<217> and G.H. Perkins studied the "calumet" in the Champlain Valley.<218> On the ethnological side, Fletcher continued publishing on the role of the pipe in Omaha culture<219> and James Deans examined the native tobacco of the Queen Charlotte Haidas.<220> The latter contributor observed that "a great deal has been written of late concerning ancient tobacco pipes. Pictures of pipes of all sorts of shapes and sizes have been placed before the public."<221>

In the 1890s discussions and illustrations of prehistoric smoking devices were by no means confined to articles exclusively the subject. Books, such as Gates P. Thruston's The on Antiquities of Tennessee (Cincinnati, 1890), contained lengthy sections on pipes.<222> Thruston, like Wilson and Henshaw, was convinced that the pipe effiqy art of the Ohio Valley had been greatly exaggerated, and his many illustrations of specimens from Tennessee and adjacent states fortified the opinion that these were in no way inferior to the Ohio mound pipes. <223> Nor was it distinguish the "always possible to ancient from the comparatively modern types," especially since "pipe makers of historic tribes occasionally made pipes in excellence of carving and artistic merit not inferior to the genuine antiques."<224> Despite this, Thruston endeavored to classify pipe types in the order of their probable age, and set out to compare "ancient" specimens with those obtained through an informal ethnoarchaeological study among living Amerind artisans:

In investigating the arts of the ancient pipe makers, and thereby endeavoring to ascertain the status of the prehistoric tribes in the scale of civilization, we have for many years carefully observed the work of the pipe makers among the historic tribes. We have patiently watched the Dakota Indians when they were engaged in carving and polishing their fine catlinite pipes, generally with the aid of no better tools than common pocket knives. The art of pipe carving was one of the few prehistoric Indian arts that remained after the advent of the Europeans, and after the art of making pottery and flint implements had been forgotten. For purposes of comparison, we have collected specimens of the pipes of the Cherokees, and a number of modern tribes, and have arranged them upon a shelf in our cabinet beside the antique types. Contact with the whites and with European art has, of course, had its influence upon the carving of the historic Indians.

The theory that the mound building tribes belonged to a distinct and superior race, and that their arts and industries were very much in advance of the historic tribes, we think can not be established by comparing the ancient with the modern pipes, as some of the latter equal the best specimens of pipe carvings discovered in the mounds.<225>

This corroborated Henshaw's general impression and contributed to the mounting evidence that the Mound Builders were Amerindians.

Thruston also blasted a certain Judge Haywood, who had boldly proclaimed that tubular pipes had been trumpets, thus proving that the owners "must have been the Israelites of Judea." After exhausting his blowing powers, "without eliciting any satisfactory response in the way of music or noise," Thruston abandoned his experiment and discarded the hypothesis.<226> Despite such efforts at a scientific understanding of the evidence, he found no good reason to doubt the genuineness of the Davenport elephant pipes and offered them as evidence of the coeval existence of Indian and mammoth.<227>

Another work representative of this period was John MacLean's **Canadian Savage Folk** (Toronto, 1896) which contained the now consultudinal section devoted to the description and illustration of pipes.<228> MacLean admitted that smoking was probably of considerable antiquity in Europe, though "the use of tobacco among Europeans must be placed subsequent to the discovery of America by Columbus."<229> He reiterated Wilson's assertion that the white man had reduced smoking to a "recreative plane," from its "elevated position" among religious usages of the Mound Builders.<230> The latter were still a different people, though he felt a comparison of pipe styles with those of the Indians might bring about an understanding of the migrations and contact between the two races.<231>

As archaeological data poured into museums it became increasingly difficult to reconcile stylistic continuities in artifacts with alleged racial and cultural discontinuities between Indians and Mound Builders. Stephen Peet, the editor of The American Antiquarian, made a last-ditch effort to convince readers that the distinction should be maintained. In a series of articles he defended Squier and Davis from some of Henshaw's accusations pertaining to zoomorphic effigy pipe identifications, and made efforts to show that the Mound Builders accurately, and with great skill, represented "extra-limital" animals on their smoking devices.<232> Yet, even before Cyrus Thomas dealt his magisterial blow to the Mound Builder myth in 1894 (by culture-historical continuities demonstrating in the archaeological sequence), <233> Peet reluctantly acknowledged that the Indians may have been descendants of the Mound Builders. <234>

This admission, by a man who continued to uphold Squier and

Davis' arbitrary elevation of mound pipes to a superior level of artistic merit, gave the study of Amerind smoking devices a new twist. In a paper published in 1890 Peet systematically compared and contrasted the mound pipes of the Ohio Valley with Iroquoian pipes recovered in New York and Ontario. The former were taken as representative of prehistoric remains, while the latter, having (what he believed were) ample suggestions of European influence,<235> were assigned to the protohistoric or historic periods. The result resembled the degeneration theory against which Edward Tylor<236> and other evolutionists had fought so passionately:

The lesson is plain. The red man has declined, and the white man has advanced...

If the Mound-builder became the Indian, the red Indian is a poor specimen of what the Mound-builder was, for deterioration is written over his entire form, and his... tout ensemble furnish a mere travesty on the native grandeur which has passed away. We maintain that the Mound-builder was a better specimen of the Indian than the native Indian himself... if we place the prehistoric on one side and the historic or protohistoric on the other, making two classes of the relics, we are obliged to say that the two are very distinct and should be designated by two distinct terms, and we know no better terms than those we have adopted, namely, Mound-builder and Indian.<237>

Catlin had used a comparison of "ancient" and "modern" pipes to illustrate an evolutionary progression in Amerindian art and technology. Squier and Davis used such a comparison to demonstrate that ancient Mound Builders were a superior race. Henshaw and Thruston used the comparison to suggest that Indians and Mound Builders were the same. Now Peet employed a similar comparison of "prehistoric" and "historic" pipes to show that, while the Indians may have descended from the Mound Builders, there was a marked degeneration in the technology and art of their smoking devices. The use of identical archaeological materials to support such a diversity of **a priori** convictions was bound to create confusion and uncertainty in the literature on the history of smoking.

# David Boyle

The attractiveness of Amerindian pipes as miniature works of art and their prominence in both academic and popular discourse ensured these artifacts a valued place in the display cases of private antiquarian collectors.<238> Despite Barber's efforts to document the pipe types found in these widely-dispersed collections,<239> no conclusions could be drawn in the absence of detailed contextual records. Better documentation was available for both ethnological and archaeological pipe samples obtained by institutions such as the Smithsonian Bureau of Ethnology.<240>

Perhaps the most consistently detailed descriptions and illustrations of museum accessions published by any North American institution in the late-nineteenth century, were contained in appendices to the Annual Report of the Canadian Institute, later to become the Annual Archaeological Report for the Province of Ontario. Upon their inception in 1887, the reports were prepared almost single-handedly by David Boyle, who stepped into the shoes of Daniel Wilson as the most prominent Canadian archaeologist of the period.<241> In the twenty years between 1888 and 1908 Boyle published some 150 pages of descriptive notes on Amerindian pipes accessioned by the Canadian Institute and the Ontario Provincial Museum.<242> Although other classes of antiquities were also described and illustrated, an unusually large allotment of space was devoted to smoking devices, perhaps because Boyle himself was an avid pipe-smoker,<243> but also because Iroquoian effigy pipes appeared to be among the most compelling and visually-exciting artifacts found north of the Ohio Valley.

The annual reports were an immediate success and gave Ontario archaeology international recognition.<244> Frank Hamilton Cushing, the precocious young genius of American ethnology,<245> believed the Toronto specimens were "one of the collections of this continent," and wrote of a Huron effigy pipe that "both approaches and suggests the characteristic art of the Mound Builders."<246>

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It was the collection of pipes illustrated by Boyle in the 1888 Report of the Canadian Institute that was used by Peet in an effort to demonstrate that the Ontario Indian was a cultural degenerate, who had lost the artistic grandeur of the Mound Builders.<247> Yet, Boyle had been careful to avoid the traditional comparison, though he, too, employed ethnocentric adjectives in describing the artistic merits of Iroquoian smoking implements. The "tastefulness of design and treatment" of a Huron human effigy pipe were, for example, "suggestive of an aboriginal Michael Angelo."<248> While this implied a high

standard of artistic achievement, Peet labelled the same artifact a "French portrait," and argued that the Indians were certainly distinct from the Mound Builders since the latter managed to produce tolerable art in the absence of European influence.<249>

The fame of the Davenport elephant pipes compelled Boyle to obtain a cast of one for the Ontario Provincial Museum. He recalled that a similar specimen had ostensibly been "found" in Ontario but, since it could no longer be located, independent corroboration of the Iowa discoveries was still lacking. This did not preclude the possibility that the Davenport pipes were authentic, and Boyle offered local evidence for the contemporaneity of mammoth and Amerindian.<250>

the popularity of racial distinctions between Mound As Builders and Indians began to wane in the 1890s, the denial that native peoples had been responsible for the creation of Hopewell effigy pipes was replaced by the conviction that no elaborate smoking device of any technological or artistic sophistication could be attributed to the period prior to European contact. Here too, Boyle tactfully side-stepped the issue, only occasionally alluding to the possibility of European influence in some Iroquoian specimens, <251> and generally encouraging readers to draw their own conclusions. <252> He postulated an historical trajectory that saw the pipe being invented at a period significantly advanced over a stone age savagery and undergoing a series of identifiable evolutionary developments:

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that the production of these, and the practice of smoking, belong to a period long subsequent to that of pre-glacial or even co-glacial man, and to a condition of society far in advance of the paleolithic. When man became a smoker he ceased to be purely and simply a savage, for whether we connect the practice of smoking early man's with ideas of indulgence, or of superstition, it points, at all events, to a stage in his advancement when food quest had ceased to be his all-absorbing occupation, and when sentiment had begun to exercise its sway in ministering to what he was pleased to regard as his comfort, or for the purpose of appeasing the many spirits with which he peopled his surroundings.

The making of pipes also demanded a higher, though, perhaps, not more difficult degree of mechanical skill in the manipulation of clay or of stone than was involved in the act of chipping to produce a cutting edge. But, although for these reasons, it is quite plain that pipes came in long subsequent to the time when the rudest forms of stone implements were in use, it is, nevertheless, not very hard to distinguish the evolution of the former from what we consider their although most archaic to their most recent types, individual specimens occasionally are somewhat perplexing.<253>

The assertion that archaic and recent pipes were readily distinguishable did not translate into a coherent and archaeologically-useful culture-chronological typology, and was, in any case, partially contradicted by later remarks.<254>

While most archaeologists accepted that there had been an in situ origin and evolution of smoking in prehistoric North America, what remained unclear was how this development was expressed in the formal variability of the thousands of pipes recovered directly from the ground or collecting dust on museum Since there was still no sure method of distinguishing shelves. prehistoric from historic remains, the issue of how many pipe types were conceived after Europeans had brought their own technology and ideas to the New World remained a moot point. By

scholars, including Beauchamp,<255> many Peet, <256> now, Perkins(257) and Wilson, (258) had offered indications of European influence on many Amerindian pipes. Armed with such iconographic evidence other researchers set out to demonstrate that all but the most rudimentary smoking devices were inspired by the White man. If the pipe could no longer be rooted in a heroic past, with its great mound-building culture, at least its florescence into a myriad of artistic and technological refinements could be attributed to an historic contact with a sophisticated civilization. Before the century was out, the "savage" would yet again be denied credit for the design and manufacture of most of the pipes recovered from North American soil.

A) THE EARLY DECADES, 1899-1919

#### McGuire's monograph

The year 1899 saw the publication, by the Smithsonian Institution, of a work that remains the most widely cited source on the archaeology of pipes: Joseph D. McGuire's **Pipes and Smoking Customs of the American Aborigines.<1>** This was a 300-page culmination of several years of research, during which time the author recorded information on over 2,000 library cards. In response to later criticisms he proudly announced that, during the course of his studies, "every extract was used" and "nothing was surpressed."<2> Recent scholars have continued to find McGuire's contribution valuable as a general descriptive guide, though they justifiably ignore his revisionist conclusions.

By modern standards, McGuire's compilation and disorganized treatment of ethnohistoric sources leaves much to be desired. Inadequate and selective citation rendered the work useless as a literature review, while his archaeological analysis was based almost exclusively on the poorly-provenienced collections of the U.S. National Museum. Despite these drawbacks, the contribution was important for its methodological innovations. McGuire began organizing a large Amerindian pipe sample into а by morphological classification based primarily general on features, <3> and went on to plot the distribution of fifteen pipe types on continental base maps. The result was one of the first large-scale distributional studies of any artifact in American archaeology.<4>

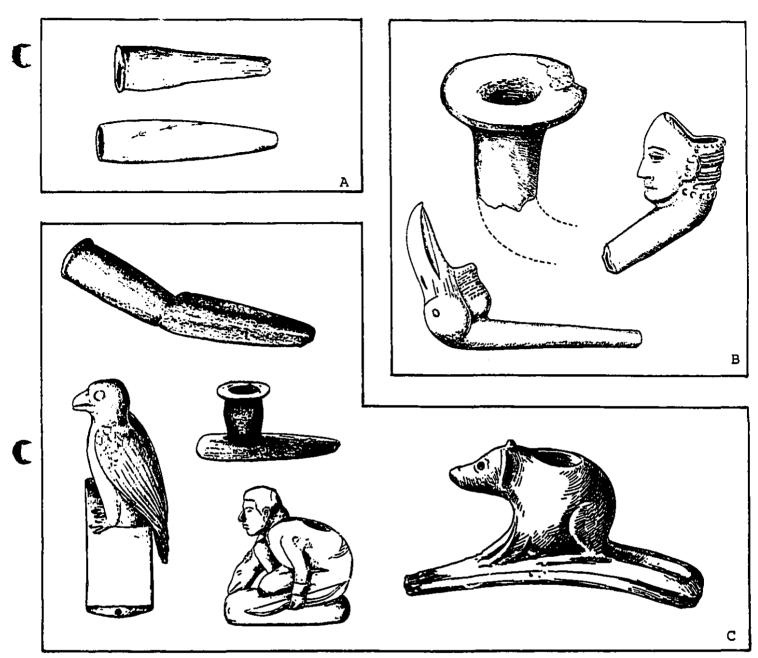
A perusal of ethnohistoric accounts compelled McGuire to concede that native peoples had already utilized the pipe at the time of European contact, <5> though he was often quick to point out that, "while smoking was probably indulged in, it was but to a limited extent until the whites, by the cultivation of tobacco popularized its use. "<6> The technological, stylistic and distributional study of smoking devices found in the U.S. National Museum was construed to support the conjecture of an exiguous and rudimentary tobacco-use in prehistoric America. While examples from fourteen of the pipe types were discovered in limited and contiguous areas with remarkable regularity, only one type was "found to be common practically to the whole Continent, and this type, a straight tube, is in form the most primitive of any. "<7> McGuire concluded that prehistoric Amerindians employed only this simple smoking implement, while all other types, which constituted a great majority of the specimens recovered from the ground, dated to the post-contact period (see Plate 9.1).<8>

How was such an argument conceivable, let alone defensible, particularly in light of the countless elaborate Hopewell and Iroquoian effigy pipes? The debunking of the Mound Builder myth by Cyrus Thomas(9) carried with it the implication that many of the mounds were built by identifiable living groups such as the Cherokees. McGuire took this to mean that the contents of many of the sepulchers dated to the post-contact period--an assumption supported by the alleged inclusion of European goods.<10> He deemed it a "doubtful proposition to attribute to the Indian the amount of artistic skill evidenced in the forms of the mound with access admitted that, pipes, <11> but to European technology and ideas, the modern Indian could produce equally sophisticated work.<12> Examining the mound pipes in great detail, McGuire believed he saw overwhelming evidence that these were manufactured with the aid of steel files, drills and other European implements, <13> and concluded that they "were the handiwork of fur traders and hunters catering to native trade demands. "<14>

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While agreeing with much of Henshaw's critique of the literature on mound effigy pipes, <15> McGuire found no reason to question the authenticity of the infamous Davenport frauds. <16> "The two elephants suggest," he averred, "an acquaintance with the animal." "The natural inference would be that this knowledge came from the whites, who we do know were well acquainted with the elephant, and as a consequence that the pipes were made after the European invasion of the country. <17>Here he was fortuitously correct, for there were indeed veritable file marks on these pipes, resulting from tools belonging to members of the Davenport Academy. One might imagine McGuire's surprise had he learned that the elephant effigies were scarcely twenty years  $old. \langle 18 \rangle$ 

PLATE 9.1



Selected illustrations from Joseph D. McGuire's *Pipes and Smoking Customs of The American Aborigines* (1899). McGuire believed that, of all the smoking devices found in North American soil, only the tubular pipes shown in figure A dated to the prehistoric period. He argued that the Iroquoian effigy pipes shown in figure B had evidence of European influence and that the trumpet type was based on a French musical instrument. The "monitor" and "mound builder" pipes depicted in figure C also suggested signs of contact with a European civilization. The treatment of the human figure was deemed "highly artistic and could no more be attributed to savage art than could a music box should one chance to be found in a mound.' McGuire's position on mound pipes was arrived at by adducing evidence from manufacturing methods, spatial distributions and the usual disengagement of savagery and civilization. The pipes, he argued:

have been examined closely for surface indications of tool marks, which were found in most instances, and suggest the presence of the metal file of the whites... The localities where these pipes are usually found corresponds with the route which Marquette and other French travelers appear to have followed down to the Mississippi and into the Ohio from Lake Erie, which is presumably the route well known to the fur traders who preceded the discoverers. The style of the carving on these pipes is certainly more of a civilized than of a savage character, and undoubtedly belongs to a much higher art than other primitive and ancient objects found on the North American continent, and does not correspond with what is known of the product of the Indians' primitive tools.<19>

The ancient and lost civilization, once thought to have produced the Hopewell effigy pipes,<20> was now a group of civilized and artistically-inclined European traders who ostensibly had been commissioned by savages to manufacture smoking devices with "totemic" effigies.

But what of the spectacular pipes described by Boyle(21) and other contributors? McGuire was "inclined to attribute no great age to any of these ornamented Iroqucian pipes, at least none which would antedate French influence, though it is of course admitted that the smoking habit was noted upon the first arrival of Europeans."<22> Citing evidence from Cartier, he noted that early explorers entertained native peoples with hunting horns, and argued that these European instruments inspired the morphological modification of Iroquoian pipes from an indigenous and primitive form, to the gracefully-curved trumpet type with a flaring bowl.<23> The features on effigy pipes had, moreover, clearly been copied from the headgear of colonial soldiers or from the sacred iconography of French churches.<24> With respect to overall design, they were "executed with a degree of skill more nearly akin to the higher European art than to that of savages"<25> and, indeed, the Iroquoian pipe deviated "from what would be expected of a people living in the purest savage state."<26> Only one conclusion was conceivable: virtually every smoking device found in the Iroquoian area derived its form entirely from the French, and dated to the late seventeenth or eighteenth century.<27>

# Boyle's response

Since the U.S. National Museum did not contain а representative sample of Iroquoian pipes, McGuire obtained much of his information from private New York collectors and illustrations supplied by Beauchamp and Boyle. Even before publication the latter had urged McGuire to adopt a more moderate position, <28> and it is therefore not surprising that Boyle immediately expressed his astonishment in a brief review contained in the Archaeological Report for 1899.<29>

Yet, the most objurgatory reaction was to come in an article on "Who Made the Effigy Stone Pipes" published by Boyle four years later.<30> Boyle found it absurd even to offer an argument that attributed all smoking-pipe forms, except the straight tube, to European influence. This, he felt, was "equivalent to the contention that those who had sense enough to contrive the simplest form of device, viz, --a straight tube, for the consumption of tobacco, were so utterly devoid of ingenuity, or of adaptability, or of taste, as to be unable to take another step" towards the development of an elbow form.<31> In response to the assertion that Iroquoian trumpet-shaped pipes owed their peculiar shape to а post-contact familiarity with brass wind-instruments, Boyle wondered why the flare found on Iroquoian pottery vessels could not have furnished the original idea.<32> He argued that some forms of pipes showed evidence of European influence, but rejected McGuire's synecdochial argument that all pipes of common form so originated.<33>

What seemed particularly offensive to Boyle was McGuire's libelous threat to "the intellectual reputation of the Indian"<34>:

Now and again, where the human face is attempted as a model, the work is so well done as to suggest at first sight the probable presence of a white man not far away, but closer examination compels one to admit, that after all, there is nothing in the work beyond the power of a bright savage of mature years.<35>

We should not be disposed to deny a pretty large amount of intellectuality to a race of people capable of **inventing** a birch-bark canoe, but perhaps it will yet be shown that no canoes existed until the natives of Guanahani or Watling Island, or some other place, had seen the pinnace in which Captain Colon rowed ashore to pay his respects to their chief.<36>

McGuire took advantage of Boyle's generous offer to publish a rejoinder in the same report. Here he disputed the existence of Iroquoian pottery resembling the shape of trumpet pipes,<37> and was at a loss to see what canoes had to do with the making of smoking devices.<38> In a fashion even more adamant than before, he reiterated the principal argument of his book:

...to my mind there is no stronger evidence presented anywhere of European influence than is shown in the Iroquoian pottery pipe. The paste from which it is made shows it, the hard burning of the clay strengthens the belief, while the modeling of the figures seen on many of them is typically European and, quite distinct from any clay modeling found elsewhere in America. The heads seen on these pipes are of European type, the heads of birds are treated according to European technic, while the figures often observed on the faces of the bowls are but copies of the sacred pictures in the Catholic churches.<39>

I am glad to say that mature deliberation convinces me of the correctness of my position originally expressed, and regret not to be able to agree with those who differ with me; one of us must be wrong, but which one is the query? $\langle 40 \rangle$ 

The McGuire-Boyle debate was not merely "a flittering flurry over Indian susceptibilities and capabilities," as Weber has more recently characterized it.<41> It was, rather, part of the more general nineteenth-century discourse on the differences between savagery and civilization, and was again a reflection of the liminal status of tobacco and pipes within an evolutionary ideology. Steeped in the intellectual tradition of Squier and Davis, <42> McGuire argued that the majority of pipes found in America suggested a sophistication only possible among "higher" states of human cultural development; savages were capable of attaining such states only after contact with civilization. Boyle, on the other hand, followed the precedent set by Henshaw, <43> and found no reason to elevate the technological or iconographic features of Amerindian pipes to a level beyond the capabilities of the savage.

It is important to recognize that even Boyle's argument maintained a fidelity to the usual disengagement of savagery and civilization. In a 1901 report he wrote that:

Primitive man was only deficient--not absolutely defective in originality. Somewhere among the folds of his brain there was that which, in at least a small degree, incited to originality or novelty in the form, adaptation and ornamentation of his weapons, tools and utensils...<44>

Yet, among northern tribes, "the greatest amount of originality was evinced by them in the making of their pipes," and since these represented the inventiveness of merely a few bright savages, the Indians "possessed the power of advancement only to a limited extent."<45> To Boyle, even some of the most striking examples of individual savage brilliance corresponded to "the efforts of a kindergarten pupil, or of any untaught child." To demonstrate this. Boyle consulted several Toronto-area kindergarten school teachers who supplied him with a number of drawings of human figures by four and five year-old children, and these were used to show the "resemblances and correspondences" with Indian art. Amerindian human effigy pipes, which McGuire believed were "akin to the higher European art," could, according have been easily replicated by white to Boyle, school children.<46>

## other contributors

McGuire prepared three articles on Amerindian pipes, <47> smoking<48> and tobacco, <49> for the Smithsonian Institution's Handbook of American Indians North of Mexico in which all previous speculations on the relative antiquity of different types of smoking devices were conspicuously absent. This is not surprising, since the principal argument of his monograph had managed to create more confusion than clarification. Scarcely a year after his debate with Boyle was published in 1904, two monographs on Indian pipes were produced in the U.S. which offered two entirely different reactions to McGuire's thesis.

One was written by Alfred F. Berlin, who had already received notoriety for having released a set of damaging letters relating to the alleged elephant pipe discoveries. <50> For Berlin, it was of utmost importance to weed out "fake" pipes, since "there is found no work of aboriginal art which so much commands the attention of the student of archaeology, and also of the general collector as do the smoking implements once used by the red American people." <51> He agreed with McGuire that most pipes showed evidence of European tool marks and had styles "more of a civilized than of a savage character. "<52> In support of the idea that "ornamented Iroquois pipes" were of no great age, and certainly influenced by the French, Berlin cited not only remarks made by McGuire and Beauchamp but, curiously, even their honorable critic, David Boyle.<53> "The belief is gaining ground," he argued, "that many of the fine aboriginal pipes found in North America were made immediately after the advent of the whites with steel tools. "<54>

The belief was **not** gaining ground in Wisconsin, where, coincidentally, George A. West had just published a 130-page monograph on the very subject.<55> West argued that most of the

typical Iroquois pottery pipes were likely precolumbian and not influenced by Europeans, <56> while, contrary to McGuire's assertions, many of the curved-based Mound Builder pipes were not found along traditional French trade routes, and almost certainly antedated contact with whites.<57> Most stone pipe types were employed in remote times, were later replaced by clay and bone specimens during "a period of decadence," and were again revived when the tools of Europeans facilitated their tedious production.<58> Such scenario offered а convenient а circumvention of the whole issue, since both a belief in the precolumbian antiquity of an elaborate pipe complex and evidence of European influence could be accommodated in the same model.

As contributors to the literature of this period, Boyle, McGuire, Berlin and West were among distinguished company. first two decades of the twentieth century, During the archaeological and ethnographic contributions exclusively on some aspect of the Amerindian pipe/tobacco/smoking complex flowed from prominent scholars including Alexander F. pens of the Chamberlain, George A. Dorsey, Gerard Fowke, J.N.B. Hewitt, W.H. E. Laidlaw, Robert Η. Lowie, Erland von Holmes, George Nordenskiold, Rowland B. Orr, George H. Pepper, Albert H. Sanford, S.C. Simms, Alanson Skinner and Harlan I. Smith.<59> Aside from Nordenskiold, who raised the issue of a precolumbian antiquity of the pipe in South America, <60> these researchers stayed clear of the debate and made little effort to go beyond descriptive accounts of native rituals or archaeological finds.

Meanwhile, a new crop of tobacco historians<61> had replaced Fairholt, Billings and their nineteenth-century colleagues.<62> Among these new scholars was W.A. Penn, whose work **The Soverane Herb** (London, 1901)<63> stressed that, despite all efforts to find the origins of smoking in Asia, and despite the oriental flavor of the habit, it was certainly and exclusively an Amerindian invention.

There is, indeed, no reasonable doubt that tobacco and smoking were unknown in Europe, Asia, or Africa until brought from the New World. From the West came the weed of glorious feature. It is strange that meditative, philosophic tobacco should come from the busy, active West; it seems far more like the offspring of the dreamy, poetic East.<64>

Although this was one of the strongest historical affirmations of precolumbian antiquity of the pipe in the New World, the a corroborating archaeological testimony was surprisingly weak. All Penn could offer was the Davenport "elephant" pipe which he, like most archaeologists, believed was "in reality the mastodon, smoking to have been practised by the earliest and shows inhabitants of America."<65> While such pipes were believed to date from the Pleistocene, Penn, like McGuire and many others, could not escape the shackles of a Eurocolonial bias, and maintained that it was "not until European influence began to be felt in America" that smoking devices were manufactured from a single piece of stone or clay. "Pre-European pipes," he argued, "invariably consist of two parts."<66>

Another important scholar of the period was C. Hartwich, a Swiss scientist, whose massive **Die Menschlichen Genussmittel** (Leipzig, 1911), <67> was a model of German thoroughness. Orazio Comes had, by this time, already established that there were no species of **Nicotiana** native to Asia,<68> though Hartwich conceded that *a* form of smoking pipe was probably indigenous to New Guinea and Java before the European introduction to the region.<69>

Hartwich believed that the great majority of pipes found in North America dated to the period before European contact. <70> As was the case with Penn, the weight of evidence boiled down to the Davenport elephants. Yet here, his lucid reasoning encountered a troubling snag in logic: if the "elephant" pipes were made by early Homo sapiens who had lived coevally with the mastodon, was their "savagery" sufficiently advanced to have even been capable of producing such fine sculptures in the first place?<71> This, indeed, had been one of the most disturbing dilemmas generated by the discovery that the Mound Builders had, after all, been McGuire automatically dated all savages. While signs of sophistication to the post-contact period, the Swiss scholar, unaffected by Boasian particularism, opted for the traditional comparative method of nineteenth-century evolutionism. He observed that Paleolithic man in Europe, who had rested on a similar evolutionary rung, had been quite capable of elaborate bone carving and cave painting, despite an overall inability to produce stone implements beyond chipped lithics. There appeared no reason to question the authenticity of the elephant then, pipes and he suggested they were evidence that Amerindians smoked non-nicotian substances as far back as the "Diluvium" period. <72>

If the "mound pipe," with its apertures connected at right

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angles, was the earliest form of smoking device, Hartwich needed to grapple with the simplistic evolutionary scenario postulated by McGuire. Right-angled pipes with vertical bowls on horizontal stem platforms were clearly not a European-influenced elaboration of the straight-tube forms. Yet, why would the relatively advanced platform pipe have preceded the morphologically-simpler tubular type in northeastern North America? Hartwich argued that fine-leaved, non-nicotian plants smoked in early times the necessitated vertical bowls to keep the substances in place. Only when the larger-leaved tobacco plant was adopted in later periods, could smoking be accomplished with cigar-shaped receptacles.<73> This imaginative explanation upset most of the developmental sequences offered by previous writers from Catlin to Boyle--most of whom had viewed the evolution of pipes strictly of relative degrees of technical in terms and artistic sophistication.<74>

### B) REVIVING AND DEFLATING THE MYTH, 1920-1940

# Leo Wiener's challenge

In the century since Caleb Atwater first traced an Amerindian effigy pipe to an Asian source, <75> the origins and development of tobacco-use and smoking devices was a subject of widespread inquiry by many of the brightest minds of the period. The results were contradictory at worst and inconclusive at best. No effort had been made to evaluate the many independent and competing ideas, or even to synthesize the diverse publications into a coherent review. The whole subject was, moreover, hopelessly mired in the discourse of nineteenth-century evolutionism. The main difficulty was that tobacco-use, perhaps more than any other transculturated phenomenon, disrupted the boundary between savagery and civilization.

Nevertheless, by 1920 there was at least some consensus that the homeland of the habit had been in America--only the evolutionary sequence, it was believed, needed to be ascertained. Unfortunately the chronological refinements required to corroborate this axiom were still wanting. Indeed, the most extensive monograph on the subject had concluded that all but one pipe type found in North America dated to the pre-contact period.<76> The stage was set for a final assault on the whole notion of an Amerindian invention of smoking.

The man who was to take advantage of the confusion and point out many of the archaeological weaknesses underlying the idea of an **in situ** precolumbian development of the pipe in America, was the Harvard philologist Leo Wiener. It is useful to review the Wiener story, since he, more than any other scholar, was responsible for the flurry of interest in the transculturation of tobacco by twentieth-century anthropology.

In 1920 Wiener published the first tome of his voluminous Africa and the Discovery of America, <77> which was principally devoted to the demonstration that words for tobacco in Amerind languages, smoking pipes and the Nicotiana genus itself were

unknown in the Americas, until they were imported from the Old World in the late fifteenth century by Black slaves. After an original diffusion from Persia to South America (via West Africa), pipes and tobacco were said to have been carried to Florida by Arawaks, Negroes and Europeans, where they were traded to enterprising Hurons who, in turn, carried them north (through Mound Builder territory) to Ontario and Quebec. <78> The path from Florida to the Great Lakes was strewn with archaeological Relying heavily on Squier, <79> vestiges of such a scenario. Thruston(80) and McGuire, (81) Wiener produced evidence for the existence of manatis, toucans, alligators and other tropical creatures depicted on Mound Builder smoking devices. These were supplemented with the two elephant effigy pipes which (unknown to Wiener) were, of course, forgeries sculpted in the basement of the Davenport Academy of Sciences. <82> The addition of a human effigy pipe with "unmistakably" negroid features completed the roster of corroborations, and provided undeniable proof that Iroquoians ultimately derived their pipes from Africa.<83>

While these were dauntless meanderings through unfamiliar disciplines, more sophisticated arguments emerged from Wiener's own expertise in historical linguistics. An esoteric treatment of Iroquoian and other native etymologies led to the "inevitable conclusion" that the tobacco pipe in America began its career as a Mandingo amulet.<84>

Wiener's fulminations spilled into several additional volumes published in subsequent years. Having 'proved' that

tobacco-use was not native to North America he went on to suggest an **in situ** development of smoking devices in the Old Wcrld:

...anthropology suffers from a neglect of the historical method. Only by overlooking the mediaeval alchemy could the origin of tobacco smoking have been placed in America. We shall soon see how the tobacco pipes and the tobacco-smoking develop from the alchemist's distilling cap.<85>

An effort to strengthen this imaginative hypothesis was made by illustrating a set of "ancient" (actually seventeenth-century) European pipes, and stressing their resemblance to clchemists' distilling caps (see Plate 9.2).<86> The author then directed an unparalleled criticism of archaeological methodology, "the most elusive and dangerous of all the sciences:"

Only when archaeological data are checked by historical and philological considerations is there the least chance of arriving at the truth. Where these fail us, archaeology is nothing more than guesswork, and the conclusions drawn from it are not worth the paper they are written on. In the case of tobacco, not a single authenticated archaeological datum has been brought forward in America to prove that in which even botany falters, while philology and history alone furnish us the unmistakable data for smoking and pipes in Europe, centuries and, possibly, milleniums before the discovery of America.<87>

#### response to Wiener

The impact of such scathing rhetoric was of sufficient magnitude to generate a lively response from the academic establishment. In a lengthy book review published in American Anthropologist, Roland Dixon blasted Wiener's inflamatory assertions under the banner of archaeology:

This unquestionably interesting but in many ways unfortunate volume presents the reviewer with something of a puzzle, for a careful reading leaves one in doubt as to whether the author really intended his work to be taken as a serious contribution, or has attempted to perpetrate a rather elaborate jest... There are few things which have been regarded as more typically American than tobacco and its use, and one must admire the courage of the author in declaring this generally accepted belief to be wholly wrong. But careful reading of the chapter in question leads only to amazement that anyone could, without the slightest regard for the facts of American archaeology and ethnology (with whose results in the last generation Professor Wiener appears to be wholly unacquainted) put forward so revolutionary a theory.<88>

Wiener's contribution further described Although was as "balderdash" and "hardly worthy of serious comment," it took seven pages of sustained invective before Dixon, in final exhaustion, admitted that it was "neither necessary nor profitable to bring forward further criticism. "<89>

Yet Wiener was not so readily dispensed with. In a lengthy rejoinder published in the same journal, he systematically analysed every specific charge made against him, though he was quick to point out that he wished:

most emphatically to protest against Professor Dixon's unique method of attacking my book, Africa and the Discovery of America. I do not refer to his inability to accept my views, but to the manner in which he represents them to readers of the Anthropologist. I decline to answer in the same abusive language as that used by him...<90>

In an unprecedented deviation from traditional editorial practices, the editors of American Anthropologist (who at the time were John Swanton, Robert Lowie and Frank Speck) allowed the battle to continue with subsequent rejoinders, in which a variety of scholars protracted the debate. Dixon felt particularly obliged to issue a three-page rebuttal:

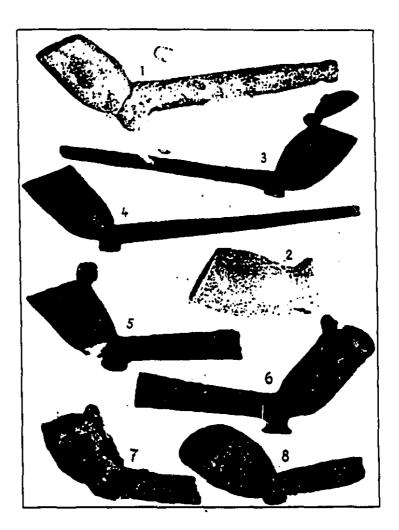


Plate showing "ancient pipes" from Leo Wiener's Africa and the Discovery of America (1920-22). Since Wiener refused to acknowledge that Amerindians invented pipes, he sought to demonstrate that these smoking devices were part of an *in situ*, precolumbian development in Europe. By inverting the examples shown he saw a morphological similarity with a medieval distillation apparatus and argued for an origin from this source.

Ordinarily I should be quite content to leave the verdict as to the value of the book, the validity of my criticisms, and the adequacy of Professor Wiener's reply to any anthropologists who cared to waste their time over the task. But (and I regret to be obliged to speak thus plainly) the disingenuousness of Professor Wiener's criticisms and the fact that he has stooped to the employment both of **suggestio falsi** and **suppressio veri** practically force me to make a brief answer.<91>

Having "followed with the keenest inderest the details of the match between the two able wrestlers, Professor Wiener and Dixon," the sub-arctic ethnologist Adrien Morice offered a six-page contribution in which he expressed the conviction that "the first of the two contestants has indeed a hard proposition on hand if he really wants to convert people to his way of thinking."<92>

The debate was by no means confined to the Discussion and Correspondence sections of American Anthropologist, but resulted in a number of major research articles. Dixon sensed that a mere critical review of the objectionable tome may not have been sufficient to overcome the attractiveness of Wiener's elegant syllogisms, and thus published a thirty-page article intended as an investigation of Amerindian words for tobacco, "with a view of showing their native rather than foreign origin. "<93> A second major article produced in response to Wiener was W.A. Setchell's "Aboriginal Tobaccos," which, like Dixon's paper, has remained a classic in the field. Leaving the archaeological and philological discussions to the tender mercies of more qualified critics, Setchell concentrated on the botanical evidence, since Wiener seemed "not at all aware that there is any complexity to this side of the question he attempts to settle so readily and so

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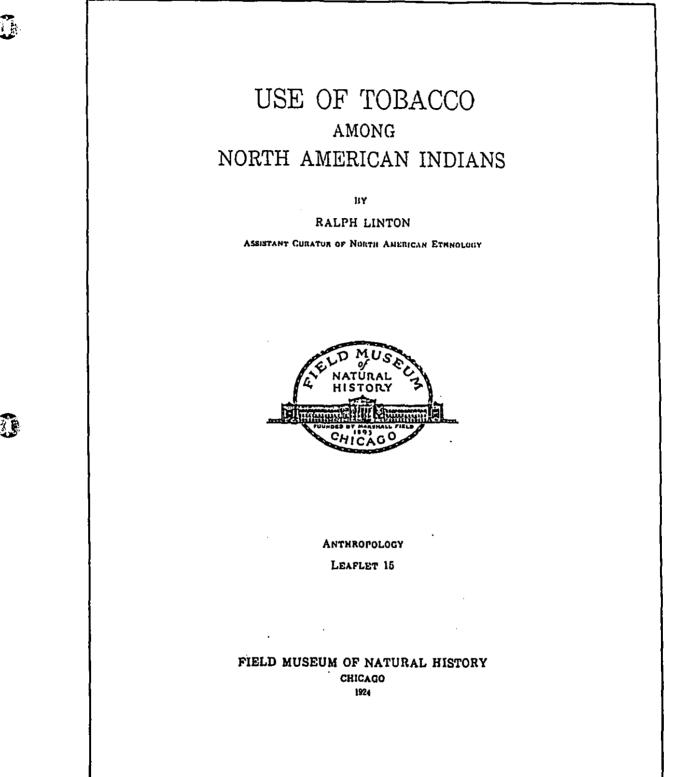
smugly.~<94> what In must be of one the earliest archaeobotanical studies of a specific research problem, Dixon and Stetson combined resources to produce yet another article, after it had "occurred to the writers that definite evidence in the matter might be secured by the analysis of the dottles remaining in ancient pipes."<95> Although the results of the experiments proved inconclusive, the paper was meant to promote further research in the scientific verification of precolumbian tobacco-use, or put in another way, to refute the African origins of an Amerindian custom.

contributions (totalling nearly After publishing seven eighty pages) in the years 1920-23, the American Anthropologist no longer provided a forum for the tobacco debates. By 1924 the scene had shifted to the Field Museum of Natural History where officials, clearly disturbed by the vulnerability of an anthropological axiom, commissioned a series of anthropology monographs (modestly termed "leaflets"), which were intended to educate the public about a general academic consensus that Nicotiana was indeed an Indian weed (see Plate 9.3). The first, which was prepared by Ralph Linton, surveyed the use of tobacco among North American Indians, <96> while the second, by J. Alden Mason, covered Mexico and South America. <97> An additional four monographs examined the diffusion and use of tobacco in other areas of the world; <98> of these, Berthold Laufer, the curator of anthropology, personally authored two and supervised the rest.

Though hastily compiled and poorly referenced, the Leaflets

made an impression through arguments from authority and quickly became valued reference works on the shelves of scholars' libraries. The only serious challenge to these papers came from a distinguished botanist, in response to a claim made by Albert Lewis in the third Leaflet that aborigines in New Guinea had made use of an indigenous tobacco for centuries.<99> Once again controversy raged in the pages of American Anthropologist, which resulted in a further four contributions on the subject. <100> Berthold Laufer, as general editor of the Leaflets, felt obliged to defend his colleague, though he was quick to point out that the Melanesian case was an anomaly with little relevance to a post-Columbian diffusion of the Amerindian tobacco-habit. "No one who has read these six leaflets will accuse me or even suspect me of being an anti-American heretic," he wrote, "for I have strictly upheld and, I venture to hope, have also proved the introduction of both Nicotiana tabacum and N. rustica from America into Asia, Europe, and Africa. "<101>

Under Laufer's direction, the Field Museum had managed to publish 207 pages of text and 30 plates in an exercise Dixon once called mere "supererogation," <102> but which was obviously a defense against anti-American, nicotian "heresy." Perhaps in hopes that the offensive philologist would fade into obscurity, the anthropologists avoided any reference to Wiener's iconoclasm, though Linton alluded to "the attempts of various authors" to deny Amerindians credit for having introduced "one of the most important gifts" of the New World to the Old.<103>



Title page of the first Field Museum Anthropology Leaflet devoted to tobacco. This, combined with five other contributions on the subject, was intended to dissuade followers of Leo Wiener and to lend credence to the anthropological axiom that Nicotiana and pipes originated with the American Indians. Although some of these "leaflets" were 60-page research monographs, they were sold to the public for 10 to 25 cents per copy. The campaign was, however, not wholly successful in debunking the myth of an Old World origin of the habit.

This was no esoteric piffle of merely academic interest. World War I had brought tobacco into the American consciousness as never before. In a plea reminiscent of George Washington's request, <104> General Pershing had cabled the White House with the news that "tobacco is as indispensable as the daily ration; we must have thousands of tons of it without delay. "<105> So important had been the weed to the war effort that there was talk of reinterpreting the Espionage Act of 1917 to cover reformers and ministers who attacked smoking.<106> Throughout the roaring twenties the "fag" seemed a permanent fixture on the lips of men and women alike. American anthropology was quick to remind the world of the prominent place of native peoples in the historic development of this habit. Recently rescued from the savage state he had occupied in Spencerian evolutionism, the newly constructed Boasian Indian emerged with a plethora of academic supporters who were eager to issue credit where credit seemed due.

Faced by such a barrage of opposition, from a list of scholars that reads like a "who's who" in the second generation of American academic anthropology, the tenacious Wiener turned to Europe in search of sympathetic ears. In what was clearly a response to Dixon, <107> he presented a paper on the philological history of tobacco in America at the 1924 International Congress of Americanists in Gothenburg, Sweden. The article provided evidence from Wiener's idiosyncratic historical linguistics that appeared to corroborate a diffusion of native words for tobacco from the Atlantic periphery into the interior of North America.<108>

Remarkably, the European reaction to Wiener was issued with as much vehemency as in America. Negatively-toned articles began appearing in the Gottingischen Gelehrten Anzeigen, the Vienna-based Anthropos(109) and the Berlin-based Zeitschrift für Ethnologie.(110) German scholars were particularly incensed and Wiener was criticised with a potent verbosity that stretched the limits of acceptable amenities:

Wo Wiener auf Erörterungen ethnologischer Fragen eingeht, wird es meistens ganz besonders schlimm... seine ungeheure Leichtfertigkeit und seinen Mangel an wissenschaftlichem Gewissen ist die Art. ...nicht eine einzige von Wiener's umstürzlerischen Behauptungen, nicht ein einziger seiner zur eigenen Zufriedenheit beigebrachten Beweise ist für mich annehmbar.<111>

Günther Stahl, whose own doctoral dissertation on the antiquity of tobacco-use in South America was threatened by Wiener's elaborate edifice,<112> expressed his annoyance with the claim that American archaeology was built on sand, and suggested that Wiener's own research methods "represented a step backwards."<113>

American and European scholars would never have expended efforts on hundreds of pages of rebuttal, had Wiener simply been a 1920s version of Eric von Däniken. Wiener's attestations (if not his formidable academic credentials)<114> posed a serious threat, for they flowed with the tide of the then popular diffusionist explanations of cultural continuity. After all, this was an era which saw G.E. Smith's heliolithic theory and

W.J. Perry's widely read The Children of the Sun(115> -- both with their conclusion that many cultural traits thoughout the world had their origins in an inherent Egyptian inventiveness. the Vienna-based kulturkreis school and the Moreover, "culture-area" diffusionists in America were bound to find, in Wiener's approach, an acceptable methodology.<116> The issue was not about theories of culture per se, for, despite a Boasian suspicion and even contempt of hyper-diffusionism, Wiener's opponents employed similar explanations in their own defence. The vexed point was the direction taken by, what Fisher aptly termed, "the odyssey of tobacco."<117>

It is not surprising that Africa and the Discovery of America was regarded as yet another veiled attempt to deny the creative and inventive disposition of the Amerindian, nor that students of Boas took Wiener's assault personally. A few months before Wiener's first volume appeared in 1920, the American Museum of Natural History published Robert Lowie's classic monograph The Tobacco Society of the Crow Indians. <118> With typically Boasian thoroughness and an unswerving fidelity to an emic viewpoint, Lowie had documented the prominent role in Crow ceremonial life of a plant that unquestionably had roots deep in Plains Indian prehistory. If Wiener's postulates were accepted, such detailed ethnographic accounts of tobacco ceremonialism would, in one embarassing stroke, have changed from descriptions of "traditional" native life to studies of post-Columbian acculturation, and would have been cited as examples of Old World contributions to the New.

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### other contributors

Aside from the many articles prepared in response to Wiener's theory, a plethora of other archaeological and ethnographic cont tions on various aspects of the Amerindian pipe/tobacco/smoking complex were offered to readers in the 1920s.<119> As usual, many of these papers were written by eminent scholars including A.V. Kidder, M.H. Saville, A. Skinner, W.S. Webb, M. Gilmore, W. Wildschut and Kaj Birket-Smith. In an article published in Ethnologische Studien Birket-Smith agreed with McGuire that the tubular pipe was the oldest form of smoking device in America, but was unconvinced by the popular idea that its precursor had been the cigar:

...it seems most natural .to me to regard the oldest tubular pipe simply as the sucking tube of the medicine-men, as is still the case among the above mentioned tribes in California and Mexico. Later on the pipe has branched off as a separate implement, following its own lines of development, and in its new shape it has spread both to the north and south... <The drinking or sucking tube> acquired a ritual character; but being united with the tobacco it got, as it were, renewed vital power, and together with that it was able to conquer the world.<120>

The recognition that ethnographic analogy might shed light on the origins, development and use of pipes in prehistoric America was also the basis of a 1928 thesis on **California Indian Pipes** prepared by W.M. Walker and supervised by A.L. Kroeber and R.H. Lowie.<121>

The combined weight of these anthropological labors was still insufficient to convince a significant portion of the general public that the Amerindian smoking complex had had no precolumbian connection with the Old World. In a decade that witnessed a peculiar obsession with diffusionist explanations for the origins of many cultural traits, it is not surprising that even reputable authorities could be cited in defense of the myth. In **This Smoking World** (New York, 1927)<122> A.E. Hamilton observed that "there are anthropologists who, finding curious resemblances between the stone carvings of men smoking pipes on the walls of Maya temples, and similar suggestions recorded on Egyptian monoliths, infer that the custom of smoking pipes was inherited by the Mayas from an older Oriental civilzation."<123>

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The confusion generated by such authorities was greatly exacerbated by the fact that the message of the Field Museum public information campaign was drowned out by the most popular work on the subject written in the twentieth century: Alfred Dunhill's **The Pipe Book** (London, 1924).<124> The author maintained that Amerindians originally obtained tobacco:

from an alien source--namely, from those brown-skinned men, sun-worshippers and builders of great stone monuments, who filtered eastwards half round the world from their home on the Mediterranean Sea during the fifteen thousand years that preceded the birth of Christ. Some of their direct descendants are to be found in the East Indies to this day, and, according to Dr. Kruyt, the Dutch anthropologist, it is almost certain that these people made use of tobacco, probably in connection with their worship, more than two thousand years ago.<125>

Dunhill also appeared favorably impressed with Wiener's suggestion that some pipes originated in Africa, <126> though he did not commit himself to the concomitant assumption that the Amerindian smoking complex owed its inspiration entirely to the Old World. The mound pipes had developed from tubular smoking devices, and the elephant effigy pointed, not to great antiquity but, rather, to Amerindian visits in distant regions.<127> Since neither Elephas maximus nor Loxodonta africana were native to the New World, the implication was that native peoples made extensive trans-oceanic voyages.

By the 1930s such diffusionist explanations were on the wane. Archaeologists and ethnologists continued their steady accumulation of evidence(128) and Wiener was forgotten. Two enormous research programs during this decade were particularly instrumental in deflating the myth of an Old World origin of tobacco or pipes.

The first of these was conducted by George West, who had decided to expand his more limited investigation of native pipes in Wisconsin, <129> to a study of continental scope. The result his two-volume Tobacco, Pipes and Smoking Customs of the was American Indians (1934).<130> Much of this work simply reiterated McGuire, <131> from whom the author quoted extensively. Much like his predecessor, West plotted the spatial distribution of approximately twenty pipe types on continental base maps. <132> Each type was described in detail, though McGuire's simple line drawings were replaced by a fresh representative sample, illustrated through 250 photographic plates.<133> While West concluded that tubular pipes were the earliest forms, <134> he concurred with most archaeologists who by now had accepted that Hopewell, Iroquoian, and other right-angled smoking devices developed long before European contact. <135> The result was a

more extensive and up-dated version of the McGuire volume, without the Euro-colonial biases of the previous century.<136>

Meanwhile, tobacco historians had replaced the myth of an Old World origin of tobacco with vague allusions to the Antilles, Central America and Mexico possible homelands.<137> as Amerindians in North America were said to have learned to smoke from the Aztecs, Arawaks, or Mayas.<138> In defence of this theory it became popular to cite and illustrate a smoker depicted on a Maya temple at Palenque, in the Chiapas region of Mexico (see Plate 9.4).<139> In his History of Smoking (1931)<140> Count Corti made no effort to link the Maya evidence with the tobacco complex found in North America in historic times. Robert Fisher (Odyssey of Tobacco, 1939) <141> simply admitted that the history of smoking during the fourteen hundred years after Palenque was "a closed book."<142>

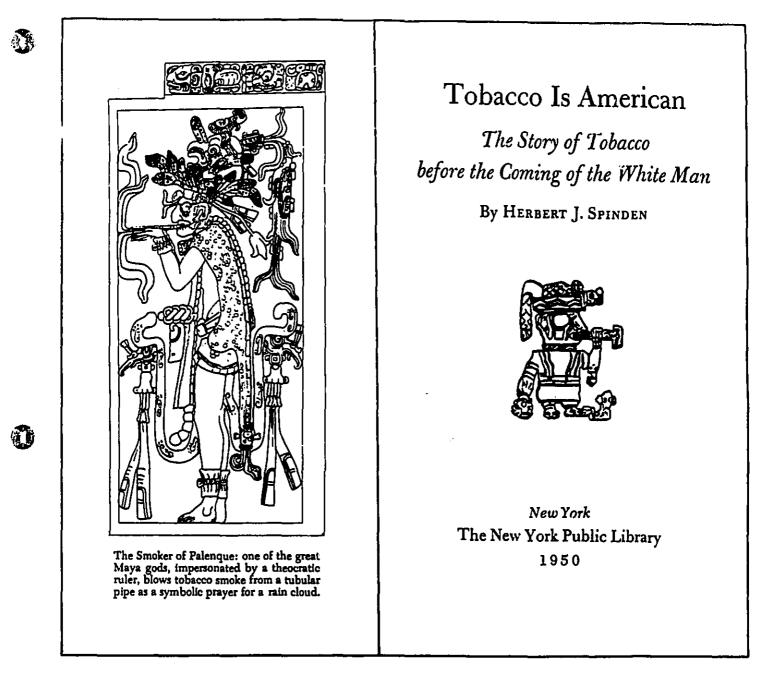
Aside from West's monograph<143> the second important work of the 1930s was the first two volumes of Jerome E. Brooks' monumental Tobacco: Its History Illustrated by the Books, Manuscripts and Engravings in the Library of George Arents, Jr. <144> With great erudition, Brooks challenged the "chorus of doubt that the original habitat of tobacco was in the Americas. "<145> Employing a staff of researchers who meticulously translated and described the contents of the unparalleled Arents collection, Brooks affirmed the complete absence of any mention of tobacco or smoking in the precolumbian, European and Asian literature.<146> While the homeland of smoking was placed in the

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Americas with considerable certainty, <147> when it came to the development and spread of the complex in the precolumbian New World, "the subject is vast and much of it still conjectural." <148>

. The efforts of the Field Museum in the 1920s, and of George West and Jerome Brooks in the 1930s, made further attempts to deny native peoples of the New World credit for inventing the custom of smoking inconceivable. The thousands of articles and books on the Amerindian pipe/tobacco/smoking complex published after 1940 no longer debated the issue. <149> The certitude of the new era was perhaps best exemplified by the concise title of a book authored by the eminent Maya scholar Herbert J. Spinden: Tobacco is American. <150> Since that time, however, some popular on smoking have continued to leave the impression that books pipes were known in Europe before the discovery of the New World. Georges Herment, for example, simply states that the Celts smoked iron pipes and that a smoker was depicted on a fresco at Pompeii. <151> More recently Carl Ehwa has argued that pipes were used in Bronze-Age Crete, <152> while Richard Hacker asserts that the Romans smoked. <153> That such vestiges of nineteenth-century thought have survived into the 1980s suggests the powerful influence and appeal of the previous myth.

PLATE 9.4



Frontispiece and title page of Spinden's *Tobacco is American* (1950). The "Smoker of Palenque" became one of the most frequently reproduced illustrations in twentieth-century works written by authors who wished to affirm a precolumbian antiquity of tobacco in the New World. Although Spinden recognized that the tubular pipe was likely older than the fifth-century date of this relief, many writers have since indicated that the smoking habit originated in Maya civilization.

## C) CONSPECTUS

The transculturation of the pipe/tobacco/smoking complex during the colonial period was a momentous event in world history. It played a significant role in the contact of cultures, the establishment of a European foothold on the North American continent, the flourishing of a global mercantile system and the development of new social practices and behaviors in the Old World. Reduced to the simplest pragmatic expression, it created hundreds of millions of smokers.

The legacy of transculturation has, almost by definition, involved the disruption of boundaries. During the colonial period these disruptions facilitated communication between natives and newcomers on economic, socio-political and ideological levels. By the first decade of the seventeenth century, passing the pipe and giving tobacco had become part of the non-verbal semiotics of Euro-Amerindian culture contact. Smoking, a habit by now prevalent on both sides, went far to mediate the formidable differences between Amerindians and Europeans. At first, the indigenous North American tobacco was desired by Europeans. Then, the Portuguese colonial product became a valued commodity among Amerindians; At the same time, pipes manufactured by natives and newcomers were produced to suit each others' specifications. English and French traders scrambled to meet the demand.

Yet, Nicotiana was not only good to smoke, but was also good to "think" (to paraphrase an old structuralist adage). The appropriation of a "savage" custom by a society believing itself to be civilized and inherently superior, led to an uncomfortable cognitive dissonance and, soon, tobacco and pipes were given an exceptional prominence in both public and academic discourse. By the nineteenth century Europe was busily mapping out the boundaries between savagery, barbarism and civilization, and creating a corpus of imagery associated with a taxonomy of racial and cultural classifications. When the categories were linked in a single evolutionary trajectory, tobacco-use was not merely placed in a temporally-intermediate position; it was, SO to speak, caught in an ambiguous conceptual chasm between savagery and civilization. Like the shaded region of a Venn diagram, the habit was common to two spheres.

While the missionaries of the seventeenth century had already experienced the difficult moral decisions involving a habit shared by both Christians and "pagans," the disruption of conceptual boundaries became even more important during the nineteenth-century campaign to bring order to past and present If nineteenth-century ideas about the cultural complexity. origin, evolution and diffusion of the pipe/tobacco/smoking complex were a reflection of the more general intellectual climate, then this literature review has provided a microcosmic summary of a highly varied set of models and speculations Sometimes one is even compelled to prevalent at the time. recognize that the nicotian literature was not only a reflection of fashionable models, but actively contributed to the formation of ideas on the place of savagery and civilization in

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Euro-colonial thought.

In perusing the voluminous published record one is struck by the manner in which the same archaeological and historical evidence was adduced in support of different and even antithetic conclusions (see Plate 9.5). This was partly a function of the many **a priori** convictions, myths and images which required corroborating evidence, even at the expense of scientific rigor.

Rampant addiction in Europe, Asia and North America led to the use of tobacco in the forming of national images or ethnic During the first half of the nineteenth century identities. American frontiersmen were, for example, often proud of their association with the land of savagery and hence, manufacturers and retailers found it profitable to emphasize a connection between tobacco-use and Amerindians. In Victorian England, however, smoking was often imbued with romantic, classical and philosophical connotations. Others found it even more appropriate to associate the habit with the dreamy and exotic orient. Speculations on the history of tobacco could seldom be separated from the struggle for these images.

Since the Anglo-Saxon was doing most of the speculating and much of the writing, one image achieved particular prominence: the cerebral gentleman smoking serenely and meditatively in an area of his Victorian mansion built especially for this activity. The pipe, and later the cigarette, became the ultimate symbols of sophistication, profundity and civilization. It is not

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surprising that, when, between puffs on a pipe, intellectuals put pen to paper, a history emerged in which tobacco was given an honorable pedigree, firmly rooted in an Old World civilization.

At times the "savage" was denied any role in either the origin or diffusion of the pipe/tobacco/smoking complex. Most often he was granted a minor role as a secondary vehicle in the diffusion of the complex from one lofty civilization to another. This meant that the North American Indian was regularly squeezed (spatially and temporally) between Asians and Europeans, or between a vaguely identified race of Mound Builders and Europeans. When it came placing artistically to or technologically-sophisticated smoking devices in a culturechronological framework, the "savage" was inevitably denied credit for his labors and usually lost out to either a preceding or succeeding civilization.

Such historical reconstructions would, parenthetically, have been corroborated by the nineteenth-century explorations of the Canadian sub-arctic. Here, the occurrence of native peoples who had little or no prior contact with Europeans, and who, coincidentally, were among the few who had **not** smoked in prehistory, would have given the newcomers the sense that **civilization** was responsible for the diffusion of tobacco. Morice describes the occasion when the Carriers first beheld the operation of smoking during a visit by Simon Fraser in 1806:

On landing, Fraser's men, to impress the natives with a proper idea of their wonderful resources, fired a volley with their guns, whereupon the whole crowd of Carriers fell prostrate to the ground. To allay their fears and make friends, tobacco was offered them, which, on being tested, was found too bitter and thrown away. Then, to show its use, the crew lighted their pipes and, at the sight of the smoke issuing from their mouths, the people began to whisper that they must come from the land of the ghosts, since they were still full of the fire wherewith they had been cremated.<154>

When the first European arrived on Great Slave Lake he attempted to offer the usual introductory tobacco gift to the indigenous population; this was followed by a scene reminiscent of the first European exposure to smoking in the sixteenth century:

'Ah! you naturally don't know it. It is called **tabac**.' Having said so he gave to every one a pipe and some tobacco, and taught them how to smoke. But as soon as they had smoked: 'Ah! how bad it is!,' they said. They all set about spitting, grimacing and whining, and it happened that some even vomited.<155>

The intellectual history of tobacco could be reversed precisely because the transculturation of smoking involved bi-directional routes of diffusion.

While the denial of an autochthonous origin and evolution of the in the land of flourished pipe savagery within nineteeth-century evolutionism and 1920s diffusionism, the affirmation of such origins clung to the tattered vestiges of the 'Noble Savage.' The cerebral Englishman and Longfellow's Hiawatha were contrasting images, each contributing to a different interpretation of the archaeological and historical record, while simultaneously dependent on fortification from that record. As the smoking pipe was shot back and forth like a ball on the billiard table of nineteenth and early twentieth-century thought, it is not surprising that image-makers could find archaeological support for almost any idea they wished to

promote. Tobacco had disrupted boundaries and this very ambiguity made it a powerful weapon.

Ironically, the vehemency and persistence of those who sought to deny Amerindians credit for the invention of smoking led to a backlash inflicted by supporters of a counter-myth. It cannot be denied that tobacco-use had had an important role in North American native life. Yet, in an effort to debunk a previous myth, the anthropological establishment had, by 1940, managed to exaggerate this role to the point where, as Clark Wissler noted, the pipe is "one of the first things that come into the popular mind when Indians are mentioned. "<156> When it came to the pipe/tobacco/smoking complex, native peoples did not need to initiate a revitalization movement to strengthen its role in ethnic identity; academic and popular myth-makers had already ensured that the continuity from prehistory to the end of the colonial period would also extend through to the twentieth century.

This study has suggested that the paradigm influencing research on relations between Europeans and Amerindians, which has often been characterized as "acculturation," must be tempered with a consideration of the behaviors and cultural productions, which brought natives and newcomers together without the technological and ideological genocide often associated with culture contact. Even if the transculturation of pipes, tobacco and smoking is considered an anomalous deviation from an historical tendency, it must be recognised as an immensely important deviation, and not be ignored by social scientists, who, as Wolf complains, often persist in seeing cultures as integrated and bounded systems, set off against one another, rather than interrelated in the same historical trajectories.<157>

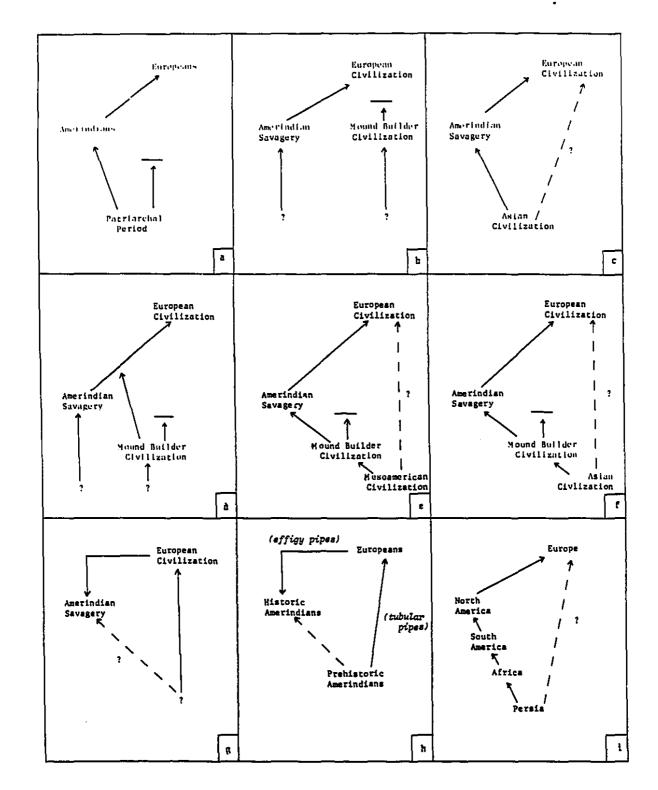
Nineteenth-century thinkers understood that tobacco use was an important disruptor of racial boundaries. Yet, in an era when it was fashionable to separate "savagery" from "civilization," any shared traits created intellectual discomfort. Today, at a time when we are striving for academic and public respect for other cultures, when the indigenous peoples of North America are becoming politically active as never before and when governments are seeking to reconcile differences, we find television pictures of our politicians, and even the Pope, smoking "peace pipes" with native leaders. While smoking has been stripped of most of its positive connotations, we may hope that the ritual of passing the pipe will continue, not only as a vestige of an ancient tradition, but as a reminder that it has played a powerful role in the contact of peoples and in the intellectual dissolution of cultural boundaries.

It seems we have generated many new questions, particularly concerning the differences and continuities between the prehistoric and historic use of tobacco among native peoples. Yet, now that the history of tobacco in the period of Euro-Amerindian culture contact is more clearly understood, and the early historical sources are thoroughly evaluated, the new questions may be placed in perspective. It is anticipated that the broader Amerindian Pipe/Tobacco/Smoking Project, of which this dissertation was a tangential offshoot, will benefit from this literature review, and will employ it as a stepping-stone to the analysis of tobacco in the life of prehistoric native peoples.

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PLATE 9:5

Examples of models used to explain the presence of the pipe/ tobacco/smoking complex in Europe. The arrows indicate direction of diffusion. The habit was most often rooted in an ancient civilisation and Amerindians were often given a secondary role in the invention of smoking devices and the transculturation of tobacco.



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THE TRANSCULTURATION OF THE AMERINDIAN PIPE/TOBACCO/SMOKING COMPLEX AND ITS IMPACT ON THE INTELLECTUAL BOUNDARIES BETWEEN "SAVAGERY" AND CIVILIZATION, "1535-1935

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VOLUME II (NOTES AND BIBLIOGRAPHY)

NOTE

All citations are identified by the six-digit accession code found in the Pipe/Tobacco/Smoking Project Library. Sources may be accessed by locating the code in the bibliography, which lists only those references cited in the text. Volume and page numbers are separated from the code by a colon. If no page numbers are shown, the citation is a primary or general source and "passim" should be assumed.

- 1. 185270:865.
- 2. 500000; 500500.
- 3. See Anthony Wallace's seminal article on the subject (503360). The degree to which numerous scholars have uncritically accepted the curious conclusion of this essay is puzzling given Wallace's haphazard treatment of the Jesuit Relations (a primary source requiring a good understanding of missionary ideology) and his failure to contextualize Iroquoian beliefs within the wider realm of Amerindian shamanism. A complete reformulation of Iroquoian dream and soul theory has been completed but is still in manuscript form.
- 4. e.g., 089437:38-51; 110250; 152900; 220290; 220300; 353000:73-74; 405700:44-53; 521500; 521700; 521830:133-148.
- 5. 500630.
- 6. see 479558:7-8.
- 7. 152400:ix; 152800:2-3; 254480.
- 8. see 048700:xi.
- 9. see Trigger's (479530; 479555) remarks on this problem.
- 10. 543800:19.
- 11. 479530:3.
- 12. 477000; 479000; 479530; 479550; 479555; 479560.
- 13. see 478500:663-666; 479550:418-420.
- 14. 477000; 479530; 479550; 479555; 479560.
- 15. 068810.
- 16. 007500.
- 17. 253300.
- 18. Not all scholars view "acculturation" as denoting a unilinear process; see for example, Axtell (010580:286).
- 19. 350000:102.
- 20. see Malinowski's introduction to Ortiz's Cuban Counterpoint (350000:xi).

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- 21. 184755:523.
- 22. 221615:59.
- 23. 010580:302-327.
- 24. 247560:5.
- 25. 350000:200.
- 26. 350000:183.
- 27. Numerous commentators have been impressed by this fact; see 005310:2; 011050:106; 016500:7; 026305:94; 103000:1-2; 119000:11,114,326; 267500:65; 291400:17; 306730:6; 312973:506; 350000:47; 368450:55-56; 409740:47,76,147; 417230:48; 418980:17; 499000:381; 528200:6,47-48.
- 28. 503660:164.
- 29. 409740:76.
- 30. quoted in 195600:34 and 350000:194.
- In 1924 Laufer observed that the Yami of Botel Tobago (35 31. miles east of Formosa) are the only Asian people who do not smoke tobacco (267400:18). Ortiz claimed that "there are lands that do not eat bread and where wheat is unknown, but none that are unacquainted with tobacco or do not know how Hartwich (188640:17) and Black smoke" (350000:251). to (021800:477) have made similar comments. As is the case with any trait shared by most or all cultures, tobacco has functioned to unite many peoples in a common bond. This in Europe, shortly after was already evident the introduction of the plant. As Fairholt relates:

In the middle of the seventeenth century, tobacco formed the subject of a curious ballet at Lisbon... The scene was laid in the Island of Tobago, the supposed native place of tobacco, and a troop of its inhabitants were introduced chanting in celebration of the good fortune of people to whom the gods had granted a plant so precious... The third and last scene introduced the consumers of the herb, and a general dance, in which all mixed together, and offered pinches from each other's snuff-boxes. The smokers of all nations, in appropriate costume, joined the dance, to indicate the reunion of all peoples and creeds under the powerful influence of tobacco; the natives leaping among them all till the curtain fell (119000:119; see also 170750:8).

Boorsch says this "ballet" was called **Tobacco** and was presented at the court of Christine, duchess of Savoy, in Turin in 1650 (028670:512).

The only book-length work claiming to be a comprehensive survey of the world diffusion of tobacco is one authored by Robert Fisher in 1939 (122200). Several researchers have provided maps showing the world-wide diffusion of tobacco and pipes (eg.: 050650:I:147,154; 188640:59; 418980:19).

General references discussing the spread of tobacco include: 026305:92; 050650:I:41-43; 050700:32-35; 074600; 076500:65; 086700:7; 109000:21; 122200; 188700:106; 291500:121-123; 350000:47; 409740:78; 418980; 423500:142; 481300:165; 511400:8-9; 511500:34.

General references discussing the spread and use of pipes around the world include: 005310:11-12; 185250:54-73; 247700:34; 368450:48-56,158-160.

General references on the introduction and use of tobacco and pipes in northern and central Europe (including Russia) include: 010600:25; 026305:90-91; 050650:II:276-278; 074600; 076500:97-120; 122200:59,62-64; 152950:48; 188640:58-74 247700:62-64; 267500; 375633:20-25; 513000:44; 542000:41; 542005:63.

General references on the introduction and use of tobacco and pipes in Greece, Turkey, Levant, Persia, Abyssinia and Arabia include: 002900:11-13; 010600:25; II:177; 076970:63-78; 026305:90-91; 050650:I:540; 119000:204-207; 122200:37-38, 54-57; 081600:143; 188640:84-93; 205170:389; 267400; 280250:304; 291400:21-23; 312973:506; 375633:46-49; 405850:266; 405870:151; 496700:231; 513000:44.

General references on the introduction and use of in Asia and Oceania and pipes include: tobacco 002900:11-13; 005380:295; 010650; 026305:90-91;048500:209, 212-213; 050650:I:10,72,146-149; II:116-120; IV:248-249; 050700:144; 076500:144-148; 076970:4-16,80; 081600:113; 103000:102-132; 103200:61-62; 119000:212-213; 119400; 122200:41-51,64, 67; 131820:419; 152950:48-50;170650:484-492; 170750:25-27; 170790:648; 179500; 179700; 185250:203; 188640:23-26, 93-118; 194200; 195600:25-26;199500:107-112, 117-141; 205170:389; 215230; 223350:282; 267800; 280300; 280400; 247700:48-55; 267400; 291100; 291400:21-23; 291500:303-314; 284500:61; 312500; 312700; 312973:506; 350000:225; 312290:21; 368450:36,157-158; 375633:50-83; 395500; 409740:80; 421000:275-278; 504000:85; 528200:7-9; 417340:42; 542000:41; 542005:63.

General references on the introduction and use of tobacco and pipes in Africa include: 002900:11-13; 005310:10; 008000:11-12; 026305:90-91; 048500:209,211; 050650:I:72,149-151,154,485-487; II:97-98,118; III:201-204; IV:437-438; 103000:133-203; 103200:66-72; 119000:207-212; 122200:34-41; 152950:48-50; 170750:14-16; 170930:455-456,459,462; 179450:19; 185250:206; 188640:74-84; 195600:25; 247700:43-47,70,fig.III; 267700; 291400:23-24; 291500:314-320; 350000:193-197; 354500; 375633:26-45; 381210:163-172; 382600:28-29; 405850:266; 420900; 420910; 421000; 503200; 503992:94,96; 504000:85; 511500:35,361; 521000:I:175-177; II:127-134, 186-190; 528200:48.

Although a thorough survey of the world-wide diffusion of tobacco and pipes lies outside the scope of the present work, in these sources may be found intriguing analogs with the spread of the habit from America to western Europe.

- 32. See plate 2.4.
- 33. 152945 quoted in 466499:iii and 466505:116.
- 34. 466499:1-2; 466505:116. For similar comments by others see 008000:47-48; 050650:III:476; 050700:5; 188700:105; 497000:10; 511500:55
- 35. 368450:217-218.
- 36. The original owner and benefactor of this collection, George Arents, has been honored through the naming of the tobacco species **Nicotiana arentsii** (050650:IV:472-473).
- 37. The original set was compiled and edited under the direction of Jerome Brooks (050650) while the supplement was the work of Dickson and O'Neil (086500). In a review, Hatch suggested that "as a bibliographical endeavor it ranks as one of the most accurate and elaborate contributions on a restricted subject in the English language" (188700:113). A catalogue on a much more modest scale had been attempted by Bragge in 1880 (see 046740).
- 38. 294500.
- 39. 381200.
- 40. 489450.
- 41. 294600.
- 42. 528200:20; see also 528250:II:43.
- 43. While chapters Eight and Nine provide a summary of the debates, this fascinating literature may also be accessed by consulting the following primary sources: 005300; 005320:128; 005360:292; 005310:5-6; 005380; 005430; 005780:1,3; 005790:1-2; 010600:4-5; 011060:1-8; 011070:117-122; 026305:88; 005470:249; 005990:11-12; 010600:4-5; 021300:86-87,111-112,164-167; 026300:18-19; 050650:I:4-13; IV:25-27,257-258; 050700:7-10; 064600:1429-1430; 068700; 071200:6-8; 076500:21-26; 076970:4-16; 079500:95-96; 081600:142; 086750:71;

103000:25,34-37; 103200:1-3; 109000:16; 109100:14; 119000:43-44,152-160; 119400; 122200:1-2; 152950:48; 179450:1-2; 179900:431; 170750:2; 183670:366-367; 185250:79,198-199; 188640:17-26; 197100:1,11-12,64-65; 215110:350; 199500:95-116; 231000:99; 241450:3; 247700:19; 258000:II:79-82; 272500:53,58; 291400:5-8,11; 291500:67-68, 308,322; 292300:257-258; 308000:361-363, 453; 350000:104-105; 368450:18-23,147-148; 322600:4-5; 408400:29; 418980:17; 452500:569-582; 381500:173; 497000:4; 501400:4-6; 454100:1-2; 460482:9-10 513000:35; 521000:I:102ff.; 504500:13-14; 511500:30-33; II:85ff.; 528200:6-9,13ff.; 542000:41; 542005:62-63; 543000:381; see also the lengthy bibliography given by Walker (503230:242-243).

Sassoon and Yellen discovered in Tanzania what they described as stone "pipe bowls" that date from 400 to 800 B.C. Blum notes that "if these interpretations are substantiated, they will introduce a new dimension into the history of smoking" (026305:87).

We are reminded here of similar claims that were made about maize as early 1724 by Lafitau (258000:II:47n) and as late as a 1971 article by Jeffreys (220550:291). Although the latter was published in the prestigious **Current Anthropology**, the idea of an Old World origin of maize has not been well received (see 108640:335; 272500:19-20; 355170:9-11).

- Questions have been raised regarding the 1. 064235. In the context of the present authorship of this work. discussion, however, it does not matter whether Cartier himself, or another member of his crew, penned the account. For the modern English translation see 020500. Bowen intimates that the first references to tobacco by French writers are found in a translation of Peter Martyr's famous passage on cohobba snuffing (029250:351). It has, however, been a matter of some dispute whether this reference describes the use of Nicotiana. MacInnes believes that although Cartier was the first Frenchman to describe tobacco he was probably not the first of his countrymen to observe it (291400:18). Brooks infers from Cartier's account that the mariner had never encountered tobacco before, despite repeated contact with sailors returned from the New World (050650:I:209). Morison adds that Cartier's surprise at smoking indicates that it had not yet reached France (315700:428).
- Among the many sources that quote and/or discuss Cartier's 2. 005300; tobacco account are the following: 002900:10; 009010:98; 010930:74; 013440:178-179; 009000:3; 029250:351; 020500:183-185 021300:39-40; 021450:53-56; 050650:I:20,209-211; 050700:18-19; 058600:68; 068700; 071260:116; 076500:49-50; 077500:158; 078300:37: 079500:93; 086300:115-116; 087000:181-182; 103000:37-38;116600:421-422; 103200:6; 109000:19,147; 108643:15; 122200:17-18; 152950:22; 170750:17; 179450:5,121; 185250:200; 195600:16; 197100:67; 247700:56; 279000:II:177;III:25; 280250:289; 291400:12-13; 296950:289-290; 298000:158-159;291500:69-70; 315700:418; 308000:492; 322600:5-6; 368000:33; 371480:2; 377600:I:319; 368450:9-10; 377800:23: 386500:441-442; 417020:11; 423500:130; 465000:18; 469200:11; 477000:I:193; 465500:14; 481100:28-29; 503230:25; 503992:95; 504500:16-17; 505000:6-7; 521000:I:135-136; 511500:27; 513000:54-55; 533500:76. The translations vary in accuracy; one of the most imaginative is given by Martyn (296300:5). Marc Lescarbot repeatedly chastised F. de Belleforest (a voluminous writer of the sixteenth century) whose inaccurate paraphrasing of Cartier's account left the impression that the description was of some kind of pepper (279000:II:176-177; III:253; 279020:299). George T. Hunt was similarly incensed with Benjamin Sulte who insisted that Cartier became ill at Hochelaga on a pipe of Virginia tobacco (213000:17,18n).
- 3. 020500:183-185.

4. 521000:I:136.

- 5. 521000:I:137.
- 6. 521000:I:146,167.
- 7. 521000:I:178.
- Two of the most prominent critics of Wiener's discussion of the Cartier passage were Roland B. Dixon (087000:181) and Elise Richter (386500:441-442). See also Chapter Nine.
- 9. Dickason notes that one Guarani Indian was taken to France in 1505 and seven more in 1509 (086200:209). Although English, Portuguese, Norman and Breton fishermen and traders were in contact with Amerindians on the eastern seabord of North America in the early sixteenth century (479560:124-129), there is no documentary evidence that tobacco was taken back to Europe during this period. See also Chapter Three.
- 10. 007500:104-105. Dickason speaks of a different festivity (held in 1550 or 1551) in which Amerindians also participated, but no mention is made of smoking (see 086200:21,203,212).
- 11. 007500:106-107.
- 12. 011870; see also 029250:352n; only six recorded copies are known (086500:I:18-19).
- 13. Barré is perhaps better known for his prominent role in the 1562 Ribault expedition that sought a French outpost on the modern shorelines of Florida. He became second commander of the garrison and constructed a map of the area (377500:242-243; 377600:II:283-284).
- 14. see note 30.
- 15. 076500:51-52; 086300:116-117; 086500:I:18-19; 195600:13; 465000:27; 465500:28.
- 16. 469155; see also 086500:I:31; 050650:I:217-221. There are also several other French (1558,1982), Italian (1561,1583,1584) and English (1568,1971) editions. The Canadian section has been freshly translated and published in a recent compendium of Thevet's work on North American material (417020).
- 17. Our plate is based on 417100:55. This illustration is also reproduced in 050650:I:219; 064600:1435; 086300:120; 195600:13; 272500:55; 280453:4; 382600:3; 109000:19; 521700:xxvi. It is discussed 452492:85 but not illustrated in 050700:194; 336030:293; 021450:54; 350000:290-291; 405700:47; 449500:42; 450500:434; 452490:317; 452500:574; 503992:95.

- 18. Our plate is based on 050650:I:268. This illustration is also reproduced in 086200:185; 219500:13; 291400:plate IV; 423500:fig.4; 521000:I:132. It is discussed but not illustrated in 021450:54; 050700:194; 350000:290-291.
- 19. 002900:10; 021450:54; 050650:I:217-221; 050700:194; 068700; 076500:52; 086300:119; 086500:I:31; 152950:21; 195600:14; 231000:104; 247700:60; 267500:48-49; 291400:18-20; 291500:72; 350000:159-160; 417000:139-140; 417340:15; 423500:133-134; 452492:84; 521000:I:131-133.
- 20. 231000:104.
- 21. see page 39ff.
- 22. 050650:I:218-219; 050700:31-32; 076500:52; 086300:119-120; 111700:38; 122200:16; 195600:13-14; 267500:1; 291400:19-20; 291500:72; 423500:134; see also 157500:202.
- 23. 122200:16.
- 24. 247700:60.
- 25. 417020:xxv,xxxii-xxxiii,159.
- 26. 417020:xviii,xxxii-xxxiii.
- 27. 417020:xxii,xxv.
- 28. 417020:10-11. The quotation comes from the Canadian section of Thevet's **Singularitez** (1557). The equivalent passage in his **Cosmographie** (1575) is different in a number of respects:

They also use a certain fine seed, like that of marjoram, which however comes from a quite large plant named Theniot. This plant is much esteemed among them; they gather it in piles and dry it in the sun, and then when it is dry they pulverize it and put it in little leather sacks. It is with this powder that they often perfume themselves all day, placing it in a cornet; and lighting the other end they inhale its smoke so that it comes out of their eyes and all the other conduits of their face, saying it lengthens their life. Differing from their use of this powder our natives of the Antarctic (Brazil) take Petun in a Palm-leaf, for the pleasure they obtain from smelling a good odor: and I can assure you from having tried it, how good it is for purging the heart (417020:47-48).

see also: 008000:63; 086300:120-121; 050650:I:219-220; 377800:29-30; 423500:134-135.

- 29. 081770.
- 30. 081773:23-24,70-71; see also 008000:6; 050650:I:280-283; 076400:211; 220290:9; 258000:II:84-85; 336030:293,296; 386500:443; 452490:317; 452500:574; 521000:I:133n-134n; 521700:452. For examples of the use of the term petun see page 111.
- **31.** 050650:I:282; 086300:127-128; 350000:292; 521000:I:132-134; 452492:84-85.
- 32. 050650:I:282-283; 195600:14.
- 33. 086300:125-128.
- 34. 377500:244-259; 377600:II:317ff.
- 35. 005010:16; after attacking the French from land Menéndez separated the survivors along religious lines and slaughtered all non-Catholic heretics (377500:257-261; see also 377600:II:391ff).
- 36. Dickson notes that Le Moyne de Morgues made his paintings after leaving America (086300:134n).
- 37. 081582.
- 38. This illustration is reproduced and more fully discussed in Chapter Six, page 259 and Plate 6.1.
- 39. 086300:130; for a less than literal translation see 005010:37.
- 40. 179870; see also 086500:II:97.
- 41. 050650:I:45,240~241; 377600:II:367; see also: 005990:14; 021300:38; 058600:125-126; 076500:68; 078300:49-50; 086300:129; 103000:38-40; 109000:25; 122200:20; 195600:17; 199500:149; 219450:84-85; 229500:280-281; 267500:1,4,100; 291400:27-28; 291500:78-79; 308000:411; 315700:428; 322600:5; 371400:v; 405500:5; 421000:286; 521000:I:139-140; 529000:III:60-61. It is not known whether these Frenchmen learned the habit of smoking in Florida or during earlier contact with Amerindians in Brazil (521000:I:140).
- 42. 122200:20-21.
- 43. 122200:17-18; Herment, without supporting evidence, says that Cartier claimed to have introduced tobacco into the north of France in 1542 (197100:67-68). Gondolff affirms

that this had indeed been the case, though Brooks believes "this patriotic assumption is of very doubtful validity" (050650:I:20n).

- 44. 469155.
- 45. Despite this, Rublowski makes the puzzling pronouncement that tobacco was smoked in France in 1540 (409740:78). His date for the introduction into England (i.e.: 1550) is also too early (cf. pp.34-37 above).
- 46. 469156.
- 47. 008000:64; 029250:360-362; 050650:I:36,266-271;IV:397; 086300:124; **086500:I:31;** 122200:18; 197100:66-67; 231010:592; 267500:48-49; 291400:18;291500:73; 503230:28; 350000:240; 423500:136-137; 464800:fol.C3; 52100:I:132-133. Taylor (468000:110-111) erroneously attributes this claim to statements made in Thevet's Les Singularitez in 1557.
- 021450:53-55; 029250:351; 050650:I:23,270; 48. 005790:2; 050700:46-47; 076500:51-52,269; 078300:38-39; 122200:18; 179900:430; 188640:62; 188700:106; 152950:46; **195600:13,14,267; 195800:162-163; 247700:60; 291400:18;** 291500:73-74; 308000:444; 315700:428; 350000:159; 375600:3; 423500:132; 449500:40-41; 454100:14; 466505:121; 467800:42; 46800:110-111; 469250:88; 496700:231; 503992:95; 501400:9; 503230:27; 513360:152; 521000:II:126,151; 529000:IV:32 cf. 421000:276,277. Emboden makes the unsubstantiated claim that, while Thevet may have introduced tobacco into France in 1556, he only familiarized the French court with its use in 1579 (111700:38). Among the reputable scholars who appear to support Thevet's claim are Schlesinger and Stabler (417020:xxxvi). Brooks believes "the plants tended by Thevet in Angouleme flourished quietly and were to remain secluded until challenged by a new arrival" (050650:I:23).
- 49. 474350.
- 50. 076500:52; Thevet's fellow colonist, Jean de Lery, also disapproved of his claim (050650:I:280-283; 291500:74). See also remarks made by Jacques de Thou not long after Thevet's death (086500:I:31; 417020:xvii, xxxiii-xxxv). In 1622 Neander called it "an old wives story" (050650:II:87).
- 51. 050650:I:269 cf. 291500:73-74.
- 52. 005990:12; 021300:81-82,84; 021450:54; 029250:352; 064601:1438; 050700:47; 068880:1009; 076500:55; 086300:68; 117500; 119000:45; 131820:419; 188640:62; 195600:267; 199500:75; 205170:388-389; 195800:162; 219200:11; 241450:4; 247700:60; 267500:49; 272500:55;

291400:18; 291500:73-74; 313500:fol.43; 322600:4; 368450:12-13; 423500:135; 449500:x-xi; 466499:4; 503230:28; 511500:33. Barbeau states that Nicot experimented with tobacco in 1530 (011050:109), though this may be a misprint. Josselyn assumed that Nicot was, himself, Portuguese (223735:60).

- 53. 029250:352; 050650:I:234n; 111700:38; 118350; 199500:75; 219450:83; 247700:60; 267500:49; 291500:73; 313500:fol.43; 324200; 468000:112.
- 54. 021300:84; In 1704 Michael Bernhard Valentini even made the curious claim that Nicot learned of the healing power of tobacco "from his servants in India" (in 086500:X:572).
- 55. 086300:76; 086500:I:43. The error first occurred in the 1577 English translation of Liébault appended to the famous work by Monardes (313500). In Surflet's (1600) English translation of Liébault, Nicot received the plant from a "gentleman keeper...of the monuments and worthie places" (050650:I:287).
- 56. 010850:2140; 021300:81-82; 050650:I:23,234n; 118350; 119000:45; 122200:15; 197100:67; 199500:75; 215110:350; 247700:60; 267500:49; 284500:61; 324200; 368450:12-13,42; 375600:3; 423500:135; 441500:5.
- 57. 029250:352; 050600:23-24; 050650:I:23,234n,287; 076500:54-55; 108700:50-51; 122200:15,19; 188640:62; 195600:21; 197100:67; 247700:60; 267500:49; 405700:2; 466499:4; 496700:231.
- 58. 086300:51,68,75.
- 59. The exceptions are Brongers (050600:23-24), Dickson (086300:7) and Walker (503230:28).
- 010600:6; 010850:2143; 021300:81-82,84; 60. 008000:64; 021450:55; 050700:47; 029250:352; 050650:1:31,36,270-271; 029230.02 064601:1438; 0/0300:45; 119000:45; 1 105. 1 078300:38; 109000:20; 117500; 119000... 162-63; 188700:106; 223735:6 111700:38,39; 122200:15,19; 152950:46; 188640:62-63; 195600:14-15,267;195800:162; 199500:75; 223735:60; 247700:61; 267500:4-5,49,51-52; 291400:20n; 291500:73-74;368450:12-13; 449500:xi-xii,40-41; 313500:fol. 43; 468000:112; 503992:95; 511500:33. Opler goes so far as to say that Nicot obtained tobacco "as a gift from friends in Florida" (337800:32). Hedrick further confuses the literature with his claim that Nicot's tobacco "came into his hands from far-away Mexico" (194800:30), while another surmises it came from Portugal via Spain and Mexico (005560:285). المشافرة المتركب الم

61. 086300.

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- 62. 133800:17. Aside from Fournier and Dickson, MacInnes also appears to doubt that Nicot introduced **N. rustica** from Florida when, in a footnote, he says that "definite proof of this is not forthcoming" (291400:20n).
- 63. It should be noted that many sixteenth-century writers used terms such as Florida, Brazil and Peru very loosely and thus reference to these areas does not imply current political boundaries (086300:77; 377600:IV:108). There is no evidence of Portuguese activity in northeastern North America in the period from the 1520s to the 1560s. Between 1562 and 1574 the Barcelos and Corte Real families were in the Maritimes and Labrador region (377600:IV:183-187) but there is no evidence of tobacco having been encountered. In any case, these activities post-date the Nicot 'introduction.'
- 64. 469156; guoted in 050650:I:269 and 423500:136-137.
- 65. 050650:I:260; 081760; 081763; 086300:78-79; 109000:21; 195600:25,267; 267500:55; 375600:3; 503230:27. Fisher, who has written on the introduction of tobacco into Portugal (122200:14-16), notes that by 1555 smoking was a common practice among the Portuguese colonists in Brazil. Tobacco farming may be described as an industry in the home country by 1575-80 (050650:I:83) and, by 1586, Portugal is said to have had "whole plantations" of tobacco (280250:301).
- 66. 078300:33; 189370:8; 308000:445; 308024:768; 322600:4; 371480:2; 405700:6; 423500:130; 441500:4; 454100:14; 513000:33; 542000:41.
- 67. 322600:4. Koskowski believes Juan Ponce de Leon introduced tobacco into Portugual in 1515 (247700:56). Van Lancker assumed that the discoverer of Florida brought tobacco to Portugal as early as 1512, and that the plant was first cultivated there as late as 1558 (496700:231). This is most certainly an error for Ponce de Leon only reached the New World in 1513. Contrary to Dickson's assertion (see 086300:107), his ships did make land on both the east and west coasts of the Florida peninsula (see 377500:140-141), although she is correct in noting the lack of evidence that Ponce de Leon saw tobacco (much less brought it back to Europe).
- 68. 086300:65,78-79; 086500:I:37-38; 152950:46; 503230:27; 503660:163; It was Damiao de Goes himself, who, in 1566, noted that Luis de Goes first brought tobacco from Brazil to Portugal (081670). Edinger asserts that Nicot's tobacco came from Huguenot refugees in Brazil but supplies no evidence for this (108700:51).
- 69. eg.: 111700:39; 417020:xxxvi; 449500:xi-xii, 40-41; 513000:34.

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- 70. 050700:47.
- 71. 267500:51-52; see also 468000:111.
- 72. 078300:38.
- 73. 291500:74. Hartwich claims that **Thevetia** was, in fact, used as a term for tobacco in France (188640:63).
- 74. 267500:51.
- 75. This was noted in his Latin edition of Monardes (081760; 081763; see also 050650:I:260; 086300:79 and note 85 below.
- 76. 417020:xxxvi.
- 77. The introduction of tobacco into Spain remains shrouded in mystery (122200:11; 267500:55) and most historians have been resigned to duplicating the obvious errors and unsubstantiated speculation of previous scholarship. The most persistent tradition is that Francisco Hernández (also known as Fernández) brought tobacco to Spain and Portugal sometime between 1558 and 1560 (see 005520:539; 005560:285; 005310:3; 010900:23; 021300:81; 050100:14; 050650:I:23,528; 050700:47; 119000:45; 152950:46; 179450:5; 185250:200; 205170:388; 219200:11; 241450:3; 247700:56; 272500:55; 280250:291; 291500:75; 308000:444; 312400:12; 368450:12; 375300:105; 405870:149; 502000:6; 511500:33; 512960:52; 513000:380).

Not only are there several sixteenth-century Spanish explorers with the name Hernández (or Fernández) but it is equally unclear where the dates for the alleged importation originated. It is possible that 1558 has been selected by many authors as an arbitrary date for the introduction of tobacco into Spain and Portugal since the plant had been available to Nicot a short time thereafter (086300:80). Whether a Hernández was involved or not, 1558 is clearly much too late since the Spaniards were already distributing the plant in Europe five years earlier (see our discussion on page 86). Corti (076500:51), Robicsek (405700:38) and (503230:27) all say that tobacco was being Walker recommended for its healing properties by a professor at the University of Salamanca in 1543, although they cite no primary sources to support this. As we will see, it was not until 1571, when Monardes popularized this idea, that Spaniards enthusiastically accepted tobacco as a panacea (see pages 42-47 above). We must concur with Holmes that the responsibility for introducing tobacco into Spain must be placed on "the Spanish sailors and sea captains who early came to the West Indies and whose names are unsung by history" (205170:389).

78. 089465.

- 79. A Dutch edition of 1554 was translated into French by Charles de L'Ecluse and titled **Histoire des Plantes** (Antwerp, 1557). Here tobacco was again identified as "Yellow Henbane" (086500:1:22-25).
- Our plate is based on 050600:20. The illustration is also 80. reproduced in 050650:1:213; 086300:40; 197170:11. It is discussed but not illustrated in: 008000:1; 021450:55; 050600:17; 050650:I:23; 064601:1436; 086300:34; 291500:71-72,75; 405700:6; 449500:40; 152950:47; 466499:11; 503230:28. From the availability of the plant to Dodoens' artist Robicsek infers that N. rustica was being cultivated in 1554 (405700:6). Other early illustrations of tobacco may be found in: 008600:1; 029250:354; 050650:I: 222,253-254,258,262,285,294,399; II:88; 086500:I:plate 24; IV:plates 80,87; 272500:56; 280430:366.
- 81. 086300:45-46; 086500:II:68-69. In addition to these illustrations De L'Obel also reproduced Dodoens' woodcut of "Yellow Henbane" (N. rustica) and published all three in his Plantarum seu stirpium historia (081782). This reference should not be confused with the earlier work he co-authored with Pierre Pena (referred to in our text on page 41).
- 82. 103200:8; 179450:6; 188700:107; 195800:165; 291400:27; 350000:222; 368450:25,58-61; see also: 050650:I:43-69; 185250:202; 247700:56-64; 267500:3-21; 291500:76-87; 350000:220-224. Three captains named Middleton, Price and Koet are often credited with the introduction of tobacco into England (005990:12-13; 011060:7; 119000:50-51; 122200:24; 199500:148; 291500:78; 368450:57; 503230:30). Walker insists that the earliest reference to smoking in England involves a Bristol sailor in 1556 (503230:30,452). Walker's source is, however, unreliable and lacks sixteenth-century documentary support. It is possible that it is a garbled version of the popular (albeit equally erroneous) story that sailors returning from Virginia in 1586 were the first to smoke in England.
- 83. See page 29.
- 84. 005990:13-14; 011050:111; 011060:7; 021300:85; 026305:89; 050650:I:239;II:171; 050700:61; 064601:1441; 071200:13; 078300:41,49-50; 086300:129,131; 086500:II:97,III:99; 109000:27; 119000:51; 119200:187; 122200:22,25-26; 152950:22,47; 179450:6; 185250:201; 195600:17,35,267; 197170:1; 199500:148-149; 205170:389; 215110:350; 219450:84,86; 223735:60,176; 241450:4-5; 247700:57; 267500:4-6; 279500:188; 291500:79,83; 315700:428,486,668; 368450:14; 371900:184; 405500:4-5; 405700:8; 418980:18; 466499:10; 468000:113; 496700:231; 501400:10; 503230:30; 504500:19; 511500:33; 513000:34.

In his Annales (London, 1615) John Stow was one of the first to report the bringing of tobacco to England by John Hawkins in 1565 (086500:IV:177). As Sparke's observations were only published in 1589, one of the first accounts of tobacco available to English readers was the 1568 Hacket translation of Thevet's Les Singularitez (179470; see also 008000:63; 021450:54; 050650:I:230-231; 291400:18-19,28; 291500:72; 423500:135). Shaw argues that Hawkins introduced England not only to tobacco, but also the pipe, which was modeled after native versions such as the one illustrated by Le Moyne de Morgues (421000:293-295). In his catalogue of British plants Louden states that both principal species of tobacco were imported into Britain in 1570 (284500:61).

- 85. see 503230:30,32,244.
- 86. 219500. This important work is more fully discussed below.
- 87. 005990:13; 011060:7; 050650:46,403; 050700:61; 076500:78; 108700:51; 119000:82n; 199500:155-156; 219430:13-14; 219450:100; 219500:14; 267500:11; 291400:32; 291500:79,103; 350000:224-225; 368450:16-17.
- 88. 005990:13; 050650:1:46,403; 050700:61; 076500:69; 119000:82n; 122200:23,27; 195600:36; 199500:155-156; 291500:79,103; 304800:282; 368450:16-17; 466900:248.
- 89. 377500:323-327; 377600:III:282. For a discussion of Amerindians brought to Europe in the sixteenth century see 086200:203ff.
- 90. 076500:69; also 048500:209. Since we have been unable to verify this assertion in the documentary evidence at our disposal, we must assume this was a conjecture on the part of Corti.
- 91. 291500:190. This idea eventually led to the creation of "cigar store Indians" (see 542000:38; 542005:59-60 and our discussion in Chapter Nine).
- 92. 050650:I:46.
- 93. 185795.
- 94. The sections of this important passage which are omitted from our text are as follows: There is an herbe which is sowed apart by it

There is an herbe which is sowed apart by it selfe, and is called by the inhabitants Uppowoc: in the West Indies it hath divers names, according to the severall places and countreys where it groweth and is used: the Spanyards generally call it Tabacco. The leaves thereof being dried and brought into pouder, they use to take the fume or smoake thereof...

This Uppowoc is of so precious estimation amongst them, that they thinke their gods marvellously delighted therewith: are whereupon sometime they make hallowed fires, and cast some of the pouder therin for a sacrifice: being in a storm upon the waters, to pacifie their gods, they cast some up into the aire and into the water: so a weare for fish being newly set up, they cast some therein and into the aire: also after an escape of danger, they cast some into the aire likewise: but all done with strange gestures, stamping, sometime dancing, clapping of hands, holding up of hands, and staring up into the heavens, uttering therewithall, and chattering strange words and noises (377600:III:145-146).

- 95. 377600:III:146; see also: 008000:10; 050650:I:314; 078485:76; 099900:23; 122200:27; 185800:16; 258000:II:83-84; 196770:120-121; 267500:2; 308000:445,547-548; 308024:767; 315700:667~668; 368450:15; 371900:238; 377480:344-346; 377810:163-164; 371400:vi; 422030:147-148; 454465:19; 503230:31,244; 408370:52; 521000:I:141-143; 556750:124-125.
- 96. 050650:I:314-315; 377500:331,334; 377810:163; 405500:5; 529000:III:113.
- 97. 050650:I:315; 291500:81; 377500:334-337; 405500:5.
- 98. 005250; 005310:3; 005470:249; 005520:539; 005560:285; 005990:13,15-16; 007500:290; 009013:124-125; 011060:7; 050100:13; 050650:1:45-47,314-315; 026305:89; II:156; 050700:61; 050800:3; 078300:41; 099900:22-23; 100000:346; 103000:206; 119000:2,50; 122200:23,27; 134700:11; **152950:47; 179450:7; 185250:201;** 189370:8; 194800:30; 195600:36; 196770:120; 197100:68; 199500:147; 215110:350; 219450:86; 223735:60,179; 247700:57-58; 267500:9-10; 272500:57; 291500:77,81; 296980:135; 304800:282; 308000:411,446; 308024:768; 312400:12; 312973:506; 368450:15,17; 322600:4; 371480:2 375300:106; 377820:110-111; 382600:13; 405500:5; 405700:8; 405870:150; 408370:14,51; 412000:392; 417340:16; 441500:5-6; 454100:15; 454465:20-21; 423500:140; 465000:13; 465500:5; 466499:8-9; 466900:138,248-249; 469250:88; 511500:33-34; 502000:6; 512960:52; 513000:34-35,38; 528200:21; 529000:III:60n. There is some evidence that Drake, himself, may have brought tobacco in his cargoes, either in 1573 or 1586. Unlike the N. rustica brought by Lane and Hariot, Drake's tobacco was presumably N. tabacum (009013:124-125; 050650:I:315; 050700:61;

197170:1; 291500:81; 503230:29-30). Virtually all authorities on the subject have failed to recall that the participants of the Roanoke voyage of 1585 traded tobacco from the Spanish of Hispaniola **before** they even saw Virginia (377600:III:285). Unless the Spanish product had run out before the return voyage to Europe we must assume that both species of tobacco were reintroduced into England in 1586.

- 99. 422030:147n,432-434; see also 086500:III:99; 371900:238. Hariot's own notes and papers are filled with references to tobacco. There are also indications that he had converted many of his Elizabethan countrymen to the habit (377480:345n; 377490:276; 377810.164; 422030:147n,209,382).
- 100. 050100:13; 011060:7; 011900:106; 021300:42,47; 279500:188; 078300:41; 100000:113n; 111700:37; 134700:11; **280250:301; 296300:2; 308000:443; 312973:506; 350000:75;** 417350:4; 423500:140; 466900:136; 468000:106; 496700:231. In an extraordinary blunder, Carl Ehwa has recently stated that Raleigh was "a volunteer with French Hugenot explorers of Florida" and thus "had ample opportunity to see and imitate the practice of smoking" (109000:16).
- 101. 005990:13,15-16; 050650:I:47; 179450:7; 185250:201; 247700:57-58; 405870:150.
- 102. 011050:109-111; 050700:63-64; 103000:40; 179900:431; 223735:176; 291500:83; 368450:14,17; 377810:164; 409650:18; 422030:168n; 454465:21; 466499:7-8; 503230:31-32; 556700:30. Quinn suggests that Hariot, the returned colonists and Raleigh may have anticipated that tobacco was a potentially lucrative colonial export crop and hence popularized smoking (377480:346n; 377500:338). This seems a little far-fetched.
- 103. In their efforts to find colonial sources for the introduction of tobacco into England, most historians fail to recognize that the plant could just as easily have come from France.
- 104. 050650:IV:397; 086000:IV:154-155; 119000:46n; 188640:63; 195600:22; 195800:162; 267500:53; 368450:12-13; 496700:232; 503230:28.
- 105. It is from this appelation that Nicotiana and Nicotine were derived. 010850:2140; 050560:817; 050650:I:31;IV:399; 050700:37n; 078485:76; 086700:6; 102210:I:108; 108700:51; 109000:20; 119000:45-46; 122200:19; 134700:11; 152950:46; 168900:204; 170750:5; 174300:241; 179450:5-6; 179900:430; 188640:63; 188700:106; 189370:8; 194800:30; 195600:21; 195800:162; 219450:86; 231000:102; 241450:4; 247700:66; 267500:50; 272500:55; 284500:61; 291500:73;

308024:768; 308000:444-445; 312400:12; 312973:506; 350000:244; 368450:12-13; 313500:fol.42-43; 375300:106; 375600:3; 377820:110; 382600:19; 405700:2; 405870:150; 409740:78; 412000:392; 417350:3; 449500:xi; 454100:15; 465000:9; 465500:1; 466499:4; 466505:118-119; 466900:iv; 468000:112-113; 481300:166; 496700:232; 501400:5; 502000:6-7; 504500:17-18; 511400:8; 511500:33; 512960:52; 513000:34,380; 513360:152. Le Strange erroneously attributes the generic name Nicotiana to Monardes who is alleged to have first used it "in honor of his friend Jean Nicot" (279500:188 cf. 313490). This is probably because he was unaware that Frampton's translation of Monardes also included Liebault's narrative.

- 106. 328600; see also 020000:I:78n; 050700:37n; 086500:II:61-62; 111700:38; 267500:145-146; 503230.
- 107. see note 30.
- 108. 007500:262; 021300:83-84; 021450:54; 050700:125; 076500:57-58; 078300:40; 086300:151-152; 117500; 267500:52; 291500:74; 368450:12-13.
- 109. 021450:54; 050700:37-38,125; 064601:1438; 076500:58; 086300:151; 086500:IV:154-155; 119000:45; 134700:11; 188640:63; 197100:67; 231010:591; 247700:66; 267500:53; 291500:73; 313500:fol.43; 350000:74,241 368450:12-13; 423500:135; 466505:121; 496700:232; 503230:28.
- 005790:3; 110. 005520:539; 007500:262; 009000:3; 009010:99; 021450:54; 050650:I:30-31; 050100:14; 010900:23; 064601:1438-1439; 076500:56-58;050700:125; 068700; 078485:76; 086700:6; 111700:38; 119000:45,239; 122200:19; 170750:5; 134700:11; 179900:430-431; 185250:200; 189370:8; 188640:63; 197100:67-68; 199500:38,78; 215110:350; 231000:102; 247700:60; 241450:4; 267500:49-50,53; 280250:291-292; 291400:18; 291500:73,163; 308000:377; 308024:768; 312400:12; 368450:13,35,259; 350000:74,241; 375300:105; 375600:3; 377820:110; 382600:19; 405500:4; 405700:2; 405870:149-150; 409740:78; 423500:135; 441500:5; 464800:fol.C3; 449500:xi; 466505:121; 468000:112; 469250:88-89; 501400:5; 504500:18; 511500:33; 513000:34.
- 111. 119000:239-240; 122200:19; 199500:77-78; 247700:60-61; 267500:145-146; 291500:74,163; 36450:259-260; 375600:3. Given the Nicot/Thevet controversy it is interesting that the latter was not only the Royal Cosmographer to Henry II, Francis, Charles and Henry III, but was Catherine de Medici's chaplain as well (417020:xxii). It is likely that the Royal Cosmographer (Thevet) frequently encountered the Royal Archivist (Nicot), particularly since both had close ties with the court.

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- 112. 005310:3; 020000:I:78n; 021300:81-82; 021450:54; 029000:372; 029250:355; 050650:I:31,253-255; IV:396-398; 076500:59-60; 078300:39; 086500:IV:154-155; 119000:45,239-240; 122200:19; 134700:11; 185250:200; 188640:63; 231010:592; 241450:4; 247700:66; 267500:53; 280250:291-292; 291500:73; 308000:377; 308024:768; 313500:fol.42; 368450:12-13; 375600:3; 423500:135; 441500:5; 464800:fol.C3; 466499:4; 466505:121; 496700:232; 503230:28; 504500:18; 513000:34.
- 113. 078300:40-41.
- 114. 076500:59-60; 086300:92-93; 231010:592; 503230:27-28. This does not preclude the probability that the Spanish snuffed in the sixteenth century and introduced the practice to Europe from Colombia (see 382750:231-232; 503630:52).
- 115. An edition also appeared in 1570 (see 086300:72; 050650:I:232-237).
- 116. 117500. This is an expanded version of a 1564 edition which, in turn, was based on Estienne's prototype Praedium Rusticum (Paris, 1554). Neither of the earlier editions contain information on tobacco (086500:I:17-18). Although Estienne died in 1564 and the section on Nicotiane was written by Liébault, some researchers persist with attributing the tobacco passage to the former, even in editions as late as 1583 (e.g., 131820:419; 469250:88).
- 117. 009000:3; 009010:99; 021300:83-84; 021450:53-56; 029250:351-352; 050650:I:236; 050700:38-40; 064601:1439; 076500:60,109; 078300:35-36; 086300:71-75; 103200:7; 131820:419; 199500:74-79; 220290:8; 229700:158-159; 231010:591; 267500:50; 291500:74; 449500:x1; 466499:4; 468000:113; 496700:233; 521000:II:152-158.
- 118. 021450:55; 050650:I:232; 076500:60; 219450:83; 267500:50; 291500:74; 313500:fol.43.
- 119. 117500 translated in 086300:72-75. A different translation may be found in 050650:I:232-237.
- 120. 064601:1439.
- 121. 219450:82-84; 313500:fol.42-45. Unfortunately for Liébault, Frampton failed to indicate the original author and many readers thought it was the work of Monardes (050650:I:232).
- 122. 357800.
- 123. Our plate is based on 405700:fig.2. Singer described the depiction as "a negroe's head smoking a truly terrible

cigar" (423500:138), while Mackenzie saw "a juggler balancing a reeking cornucopia on his chin" (291500:77). Heimann suggests De l'Obel may have attempted to describe the rolled cigar and tube pipe as a single form (195600:18,35-36,40). The same illustration is found in the 1576 and 1605 editions of the work. Liebault included this woodcut in the 1574 edition of the Maison rustique (086500:I:45). Frampton included it in his translation of Monardes (313500:fol.35). Stahl wrongly attributes the cut to Oviedo (452492:82). The flowers were reprinted, together with another illustration derived from De L'Obel's **Plantarum** (see 081782 and note 56) in Sweert's **Florilegium** (Frankfurt-on-the-Main, 1612) (086500:IV:164). Modern reprints of the woodcut in the 1571 Adversaria are illustrated and/or discussed in: 021450:56; 050600:18; 050650:I:239-240; 050700:frontispiece; 050800:5; 064600:1427; 075500:fig.12; 077500:158; 086300:45; 086500:1:27; 103000:39-40; 108700:49; 109000:13; 119000.16;170750:18;195600:18,35-36,40;241450:4;272500:56;279500:188; 197170:11; 291500:77; 350000:291-292; 382600:frontispiece (this is a rather fanciful reproduction of the original); 405700:fig.2; 423500:fig.5; 449500:41; 452492:82; 469200:11.

- 124. 117500.
- 125. 117500 translated in 086300:44-45; see also: 008000:1-2; 021450:56; 029250:353; 050650:I:240; 109000:28; 122200:25; 157500:199,202; 179450:6; 185250:201; 291500:77; 350000:291; 386500:445-446; 423500:138-139; 504500:19 It is believed that de l'Obel was the author of most of this work; the role of Pierre Pena is not fully understood.
- 126. 086300:40n,46.
- 127. 466100:833.
- 128. 466100:836.
- 129. 313490; see also: 050650:I:245-250. Various authors have attributed Monardes' discussion of tobacco to both extant and non-existent works of earlier dates, including 1511 (496700:233), 1557 (111700:38), 1565 (231010:592) and 1569 (279500:188). Although Monardes published works on plants from the West Indies in 1565 and 1569, in neither of these is tobacco mentioned. Only in 1571 (after Liébault's Maison rustique and Pena and De L'Obel's Adversaria were published) did Monardes speak of the plant (see 086300:81-82).
- 130. Since Seville was the centre for all trade with Spanish America, Monardes was in an ideal position to obtain news and seeds of plants (414850:819). He, himself, never

visited the New World (267500:55-56).

- 131. Five years after Monardes' discussion Joseph Duchesne wrote Traitte de la cure...des arcubusades (Geneva, 1576). This French treatise on the treatment of gunshot wounds included a recipe for an unguent of petun (086500:II:66-67) which may have been employed by the French as first aid in their clashes with Amerindians in the seventeenth century.
- 050650:I:32-33,248; 132. 064601:1439-1440; 076500:58-59; 078485:74; 131820:419; 086300:84-87; 219450:81-82; 231000:102; 272500:54; 231010:592; 279500:188; 296500:15; 308000:375-377; 308024:767,769; 291400:16-17; 313500:fol.34-41; 414850:819; 313490; 417340:15; 513000:34,48,84,105,131; 496700:234; 499000:381; 521000:II:158~176.
- 133. 086300:88; see also page 33.
- 134. 008000:24; 009000:3; 009010:99; 021450:53-56; 050650:I:32,246; 050700:38-40; 064601:1439; 076500:59; 267500:151; 291500:75; 350000:244; 423500:137.
- 135. 291500:75. Another plant that received an extraordinary reputation through Monardes' work was sassafras. Demand was soon so high that sailing expeditions were despatched to America to bring back the root. Until 1622 Virginia colonists are said to have exported sassafras in quantities equal to that of tobacco (119750:517; see also 377600:II:576-579).
- 136. 050700:38.
- 137. 081760; see also 050650:I:260; 086300:82-83; 231000:102; 272500:56; 386500:445n-446n; 466100:838-839. The Latin edition was also republished in 1579, 1582, 1593 and 1605 (081763).
- 138. 313500.
- 139. 267500:118; 466100:836.
- 140. 313500:fol.33 cf. our plate 2.2b. It must also be recalled that Liébault's section on tobacco was included in this translation (see 050650:I:276; 466499:6 and page 41 above). Our plate is based on 050650:I:277. See also 279500:188; 377480:345n; 423500:137.
- 141. 008000:25.
- 142. 267500:22; 466499:4,6; see also 247700:77.
- 143. 073900; see also 086300:83; 086500:II:75-76.

144. 170630.

- 145. 008000:24; 021450:56; 029250; 050650:I:252-256; 076500:59-60; 086300:91-92; 131810:304; 131820:419; 229700:158; 231010:592; 267500:149; 423500:137-138; 496700:233. Our plate is based on 050650:I:252. It is also reproduced in 029250:350.
- 146. 050650:I:253-255; 076500:59.
- 147. Laufer (267500:53) claims the booklet was entirely copied from Monardes. It is clear, however, that most of it came from Liébault (029250:363n; 050650:I:253).
- 148. 086300:93; see also 131820:419.
- 149. 029250:360-362.
- 150. 064601:1439.
- 151. 117500.
- 152. 086300:93.
  - 153. 118350; see also 008000:26; 011060:7; 021450:57; 029250:362-363; 050650:I:301; 064601:1440; 086300:77; 086700:6,15; 229700:158-159; 231010:592; 308000:365,621,643; 375700:148; 496700:233. Our plate is based on 050650:I:301.
  - 154. In 1938 Bowen noted that "a dissertation on tobacco in French literature is being prepared at Harvard by Eaton Leith" (029250:353n). This work is not listed in Marin's compilation of theses on tobacco and we have been unable to track it down through alternate means. French scholars who have dealt with French tobacco history include 074600; 170753; 170754.
  - 155. 084120. Other editions were published in 1603,1605,1608 and 1615.
  - 156. 086500:III:142-143.
  - 157. 084070.
  - 158. quoted in 086500:IV:155-156.
  - 159. 496700:234.
  - 160. 350000:199-201; see also: 026305:94; 542000:43; 542005:64.
  - 161. 076500:104.
  - **162.** 005300; 021450:62; 029250:362; 050600:26;

050650:II:85-91; 064600:1433; 064601:1442; 076500:104-105; 170850:21; 267500:52; 308000:404; 308024:769; 423500:125,134; 496700:233.

- 163. 324200. Our plate is based on 050650:II:86.
- 164. 324210; see also 050600:26.
- 165. 469700; see also 050650:II:108-112.
- 166. 199500:84.
- 167. 292800; see also 050650:II:279-281; 076500:166.
- 168. 120630; see also 050650:II:312.
- 169. 422190.
- 170. 008000:44; 050650:II:344.
- 171. 356030; see also 050650:II:378-380.
- 172. 050650:II:378-380; 064601:1447.
- 173. 008000:71; 010870; 050650:II:388-389. This work was retitled **Histoire du tabac** and issued in 1677 under the name Jean Royer de Prade (084050).
- 174. 050700:131; 076500:166; 119000:248.
- 175. 404850.
- 176. 064601:1448.
- 177. 423500:140n.
- 178. 054410.
- 179. 050650:III:16-17; 119000:247-248. Our plate is based on 050650:II:342,388; III:16.
- 180. 005300; 009000:4; 009010:99; 029250:359; 050700:41; 103200:7; 119000:242; 119750:514; 199500:79; 291400:15; 337800:32; 350000:74,200-201; 368450:12-13,28; 405500:4; 417350:3; 423500:125; 469250:88-89.
- 181. 064601:1442; 086300:81; 195600:20.
- 182. 005990:12; 291500:88.
- 183. 009000:5; 009010:100; 050650:I:34; 050700:41; 368450:31.
- 184. 068700; 071200:62; 086700:6; 170750:5; 205170:388-389; 219450:86; 219500:12; 231000:101; 247700:74; 267500:55;

313500:fol.34; 350000:198-199; 449500:x-xi; 503992:94; 511500:21.

- 185. 086300:57-60; see also 086700:6.
- 186. see page 22 above.
- 187. Interestingly, at one point tobacco-smoking was believed to have been a cause of scurvy (086500:VII:369). Chewing tobacco was also practised by sailors as a preventative against scurvy (368450:28).
- 188. see pages 24 and 26.
- 189. 417020:48.
- 190. see page 29.
- **191.** 050700:37; 086300:76; **103200:7**; **199500:77-78**; **247700:60**.
- 192. 377600:III:145; see also 050650:I:314. The remaining text may be found on page 36 and note 94.
- 193. e.g., see comments by Vogel, who made an extensive study of Amerindian medical theory (499000:380-381,383). It has also been suggested that Europeans confused tobacco with a genuinely remedial Amerindian plant (050700:36; 064601:1436).
- 194. 405500:4.
- 195. 009000:2; 009010:98; 050650:I:29,206,236,470n; see also: 188700:106. Brooks admits that there were therapeutic uses of tobacco among the Indians but these "were insignificant in relation to the adoption of the plant as a luxury or for ritualistic purposes" (050650:I:6n).
- 196. quoted in 423500:136; see also 050650:I:269; 050700:36. Singer says "Thevet's error in denying that the Indians attribute any medicinal or staying qualities to tobacco is amply demonstrated by his own writing and by other authors" (423500:137).
- **197.** 021300:83-85; 050700:38,40; 064601:1440; 231000:111.
- 198. 050700:40.
- 199. 152945 quoted in 119000:240 and 368450:259-260.
- 200. 050650:I:160; 050700:134; 188640:63.
- 201. 404850 quoted in 050650:II:399 and 064601:1449.
- 202. See 086300:99-104 for a synopsis of late sixteenth-century

views on this. See also: 005990:75-78; 008000:33-34; 010900:125-126; 050650:I:33,160n,336; II:271-273,375-377; III:134-135; 050700:39-40,163-164; 064601:1446-1447; 071200:60-61; 076500:99-100,166-169; 119000:168-169,252; 122200:74; 170750:6; 179450:13; 185250:207; 189370:8; 199500:74,84-85; 205170:389; 215110:351; 231000:105-106; 247700:38,75-76,270; 267500:44-45; 272500:57; 279500:189; 291500:155-158; 304800:285; 306700:33; 308000:363,624; 350000:243; 368450:78; 382500:101-102; 417340:20; 423500:141-142; 454100:3; 511500:88; 513000:41-42; 528200:21-22.

- 203. 414400; 086300:100; 086500:II:56. Another edition was published in 1572. The author's name is also spelled "Sarrasin".
- 204. 050650:I:336; 069300; 086300:101; 229700:159.
- 205. 008000:33; 050650:II:271-273; 076500:99-100; 231000:105; 291500:155.
- 206. 005990:75-78; 050650:I:160n; 103200:16; 119000:119-120; 179450:13; 215110:351; 247560:5; 267500:44-45; 291500:157; 306700:33; 368450:78,304; 382500:101; see also: 008000:34; 050650:II:375-377; 405700:39.
- 207. e.g., 086300:102; 086500:VII:349;IX:509.
- 208. 005595; 005990:77; 050650:I:160n; 064601:1450; 050700:39; 215110:351; 231000:106; 267500:45; 279500:189; 291500:157; 306700:33; 308000:363; 368450:80; 405700:39; 417340:20; 513000:41-42. A certain Tom Rogers declared, years after the 1665 plague, that he never was whipped so much in his life as he was one morning for not smoking (005990:77).
- 209. quoted in 119000:116-117 and 291500:157-158. See also: 185250:207; 199500:180; 247700:59; 368450:79; 382500:137.
- 210. 005595; 108700:53; 368450:78.
- 211. 005990:78; 010620:4; 011060:3; 119000:168-169; 231000:106; 308000:453; 513000:42.
- 212. Our plate is based on 050650:III:134-135.
- 213. 060550.
- 214. 050700:163-164; 086500:X:634-635. Byrd (who was the brother-in-law of Robert Beverley) appears to have had economic motivations since he, himself, owned 179,000 acres of Virginia tobacco land. O'Neil notes that "the pamphlet was an excellent method to increase the sale of Virginia

tobacco, the author's prime concern" (086500:X:635). Earlier plague tracts had less dubious motives and appear to have been based solely on therapeutic considerations.

- 215. 050650:I:31; 050700:39; 064601:1442; 119000:48; 195800:163; 231000:102; 247700:74-77; 306700:31-32; 308000:363; 350000:242; 368450:28-29; 405700:39; 464800:fol.C1-C3; 513000:33.
- 216. 050650:IV:397-399; 086300:44; 086500:IV:154-155; 119000:46; 157500:202; 188640:63; 231010:591; 247700:66; 272500:57; 308024:768; 368450:12-13; 405870:150; 466505:118,120; 496700:232.
- 217. see pages 24 and 26.
- 218. 086300:65; 086500:I:38; 109000:25; 195600:9; 466499:4; 469250:89. In Chronica do Felicissimo Rei dom Emanuel (Lisbon, 1566-67) Damiao de Goes wrote cf "fumo which some call Betum and I will call the holy herb, because of its powerful virtue in wonderful ways, of which I have had experience, principally in desparate cases: for ulcerated abscesses, fistulas, sores, inveterate polyps and many other ailments" (quoted in 086500:I:38).
- 219. quoted in 219450:116.
- 220. 231000:102-103; Miller (312869:9) and Quinn (377810:434-435) also discuss the humoral theory of bodily disorders.
- 221. 064601:1456; 086300:103; 231000:105. As late as 1721 tobacco ointment was still seen as "one of the best in the dispensatory" (296980:136; 499000:44).
- 222. 219500.
- 223. 064601:1456.
- 224. 231000:104.
- 225. 195600:34; 503230:27.
- 226. Heimann is evidently referring to Thevet's alleged plantings in his home town (see page 30 above). Even if Thevet had been telling the truth, his **Angoumoisine herb** would only have been a curiosity and, as we have noted, it had no impact whatsoever on French socio-economic life in the late 1550s. Curtis (078300:33) and Robicsek (405700:6) also say that tobacco was planted in France before 1560.
- 227. 050650:I:36; 050700:47; 247700:60; 267500:49.
- 228. 357800.

- 229. quoted in 050650:I:239 and 086300:44; see also 267500:9; 291400:28,75; 371400:v; 423500:138-139. Charles de L'Ecluse noted in 1574 that, in France, tobacco "is sedulously cultivated not so much for the sake of ornament, as for its remarkable faculties, especially by certain noble matrons who are enthusiastic botanists" (quoted in 050650:I:260).
- 230. 328605.
- 231. quoted in 086500:II:63. This contradicts Billings' claim that the cultivation of tobacco did not begin in France till 1626 (021300:82).
- 232. 078300:33; Brongers notes that tobacco was grown on a large scale in the province of Utrecht in 1615 (050600:71).
- 233. 050600:19-20; 050650:I:52; II:91; 071200:36; 122200:21,53; 195600:186; 267500:57-58; 382600:16.
- 234. 291500:158.
- 235. 291400:33-34; 291500:99; 503230:32.
- 236. 280250:305; 375600:3.
- 237. 272500:55; 375600:11; 454100:14.
- 238. 050650:I:22,44.
- 050650:I:69; 050700:75; 076500:100,102; 239. 026305:90; 103000:231; 103200:13,75; 122200:63; 231000:104; 267500:58; 272500:57; 291500:106,148; 247700:62; 382600:81; 454100:15; 481300:166. Our plates illustrate seventeenth-century smokers from various European countries. Plate 2.9 is based on 050650:I:303 and 086500:V:plate108. Plate 2.10 is based on 272500:57; 119000:68-69 and 076500:102.
- 240. 021300:42; 122200:53.
- 241. 267500:115; see Chapter Three, page 86 for a further discussion on the role of Spain in the transculturation of tobacco.
- 242. 021300:81-82,112; cf. note 231.
- 243. 291400:24.
- 244. 375600:4.
- 245. 008000:70; 050650:I:157; 021300:218-219; 050700:125; 119000:239; 122200:19; 179900:430-431; 197100:67-68; 199500:38; 231000:107; 267500:50; 291500:74,163;

368450:35,259; 468000:112; 497000:6; 504500:18 and pages 39-40 above.

- 246. 021300:219n; 050650:I:157; 076500:59-60; 086300:92-93; 188700:108; 441500:8; 503230:45.
- 247. 021300:218-219,222; 076500:149-150; 119000:243-244; 503230:37.
- 248. 008000:93; 050650:I:144; II:442; 076500:270; 197100:71; 291500:152. The import duty was 30 sous per pound.
- 249. 050650:II:442; 076500:149-150; 291500:152; 375600:4-5,12,13.
- 250. 375600:11; see also Best (018650:171-182) for the English experience.
- 251. 414850:825.
- 252. 375600:6-7.
- 253. 076500:150.
- 254. 375600:6.
- 255. 007500:258-259; 071200:41; 076500:150; 119000:121-122; 185250:205; 197100:55,72; 247700:61; 267500:54; 291400:24; 304800:285; 368450:35; 375600:6-7; 503230:45; 511500:39; 513000:37.

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- 256. 185250:205. Some say this was because Louis was himself a tobacco-user (179450:12; 197100:2).
- 257. 076500:179-186.
- 258. 375600:6.
- 259. 375600:6.
- 260. 050650:I:158; 050700:126; 071200:23n; 119000:243-244; cf. Herment's statement that Louis was a snuff-taker (197100:82).
- 261. 021300:218-219,222; 078300; 119000:243-244; 199500:309; 280250:293.
- 262. 050650:I:158; 050700:219; 119000:124,257; 368450:260-261; 382600:24-25; tobacco snuffing was so much a part of aristocratic life that its decline in France has been linked to the French Revolution (050700:146; 195800:168; 291500:163).
- 263. 021300:218-219; 119000:244; 368450:260-261.

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- This anecdote is also noted in 005310:5; 264. 199500:38. 064601:1454; 021300:220; 050650:I:156; 076500:186; 119000:243-244; 122200:19-20; 197100:83; 368450:261; 441500:8-9. Many authors erroneously state that it was than Fagon his assistant) who (rather took the absent-minded pinch during the oratory.
- 265. 076500:180-181.
- 266. 005530:81; 050650:I:158; 076500:183; 119000:69,243-244; 197100:3; 199500:175; 247700:88; 291500:155,163; 350000:15; 382500:8-9; 496700:237. This may have been mere gossip.
- 267. 084050. This was a reissue of the work published in 1668 under the name Baillard (010870).
- 268. 076500:166.
- 269. 197100:2.
- 270. guoted in 375600:7-8.
- 271. 050650:1:69,157-158; 076500:187; 122200:21; 197100:3; 368450:41-42.
- 272. 007500:262; 021300:122; 050650:I:144; II:440,443; 050700:107; 076500:160-161; 119000:322; 185250:207; 197100:56,72; 247700:61; 267500:54; 291500:154-155; 368450:41; 375600:8-9,17ff.
- 273. 291500:154-155.
- 274. translated in 086500:1X:486-491.
- 275. 086500:IX:486-491.
- 276. 050650:I:144; 050700:107; 076500:18,205; Corti illustrates an example of a death warrant issued for this offense (076500:fig.50).
- 277. 069300; see also 009000:5; 009010:100; 021450:58; 064601:1440-1441; 086300:98; 229700:153-159; 291500:90; 466499:14; 496700:233. This remained an anonymous work until Robert Kane identified the author in 1931 (229700).
- 278. 050650:I:332; 086300:98; 229700:158-159. Pipes continued to be associated with England to the degree that Pont depicted the typical British character with a cabinet filled with hundreds of pipes (258630:16).
- 279. quoted in 229700:159; see also 377480:345n.
- 280. 229700:159.

- 281. 050650:I:332-337. In the Dutch edition of 1623 (069310) this representation was much improved and reengraved. Of this latter illustration Brooks says:
  - The excellent engraving on the title had its prototype in that which adorned the English edition but is far superior to it in detail. It displays the usual paraphernalia of a "tobacconist": lying before him is a roll of tobacco, then called "cane," "carrotte," etc., with it is a knife used for shredding and the trencher upon which that operation was performed. The pipe was undoubtedly based on a Dutch model, as the bowl seems slightly larger than those of early seventeenth-century English pipes (050650:II:96-97).

Our plate is based on 050650:I:333 and 050650:II:96. The Chute illustrations are also reproduced in: 050600:80; 109000:206-207; 119000:57; 170750:9; 179450:3; 241450:7; 368450:title.

- 282. General references include: 005990:passim; 050700:60-74; 071200:14-33; 076500:72-96; 122200:72-80; 199500:157-165; 247700:57-59; 291400:2-4,32ff.; 368450:32-34; 371400:v-xiv; 375300:109-113.
- 283. 005990:25; 050650:I:43.
- 284. 005990:48-49; 050650:I:53-55; 086300:190; 109000:29; 119000:53-54; 291500:94-95; 368450:62-64; 382500:119-120.
- 285. 011900:105-106; also quoted in 185250:139.
- 286. 292970:22; 368450:78.
- 287. Aside from the bibliographic contributions of Brooks (050650), the doctoral dissertations by Dickson (086300) and Tanner (466499) contain useful syntheses of the literature of the period. The role of tobacco in English literature is also discussed in the following: 005310:4-5; 008000:36-52; 021450:58-62; 050700:72-74; 071200:14-33; 119000:47ff.; 219450:91-94,113-120; 267500:22ff.; 291500:89ff.; 368450:217-235; 511500:55-96; 528200:9-13.
- 288. 466499:3,125. Many scholars (eg.: 005630) have been puzzled over the apparent lack of allusions to smoking in Shakespeare's works, despite the flurry of interest in the habit during the playwright's life. Virtually every famous contemporary (including Bacon) had something to say on the topic.
- 289. 371400; see also 008000:52; 018650:172; 021450:60; 050650:I:381-385; 304800:285.

- 290. 293950; see also 008000:52; 021450:60; 050650:I:385-389.
- 291. 016700; see also 050650:I:389-392; 064601:1444; 229700:156; 304800:284-285; 306740:24-25. Our plate is based on 050650:I:382,386,389.
- 292. 219430; 219450; 219500; see also 050650:I:401-407; 076500:88-89.
- 293. 152945; see also 021450:60; 048500:210; 050650:1:477-481; 267500:128,139; 306740:22; 496700:233.
- 294. 011640; see also 021450:61; 050650:I:512-516; 064601:1441; 229700:159; 267500:15-16,32,37; 496700:233. Our plate is based on 050650:I:402,478,511.
- 295. 081400; see also 018650:173; 021450:61; 267500. Brooks calls this mingling of hysteria and pedantry "the most naively absurd anti-tobacco tract produced" (050650:II:10).
- 296. in 050650:II:9-13.
- 297. 464500; see also 011060:7; 021450:61; 050650:II:31-34; 375730:51.
- 298. 047500; see also 021450:58; 050650:II:37-41; 229700:153; 306740:22; 375700:147.
- 299. 496840; see also 011060:7; 021450:62; 050650:II:80-83; 267500:129. Our plate is based on 050650:II:11,32,80.
- 300. 050650:II:155-156.
- 301. 118360.
- 302. 118350; see plate 2.5.
- 303. in 021450:57; parts also quoted in 050650:II:337-338 and 119000:114-115. One is reminded here of George Alsop's exclamation in **A Character of the Province of Maryland** (005045) published in 1666:

If Trade should once cease, the Custom-house would soon miss her hundreds and thousands Hogs-heads of Tobacco, that use to be throng in her every year, as well as the Grocers would in their Ware-houses and Boxes, the Gentry and Commonalty in their Pipes, the Physician in his Drugs and Medicinal Compositions: The (leering) Waiters for want of employment, might (like so many Diogenes) intomb themselves in their empty casks, and rouling themselves off the Key into the Thames, there wander up and down from tide to tide in contemplation of Aristotles unresolved curiosity, until the rottenness of their circular habitation give them a **Quietus est**, and fairly surrender them up into the custody of those who both for the profession, disposition and nature, lay as near claim to them, as if they both tumbled in one belly, and for name they jump alike, being according to the original translation both Sharkes. (183530:362)

The several hundred thousand annually employed in, or supported by, the raising, manufacturing and retailing of tobacco in eighteenth-century England (408100:121) has grown to an army of 1.8 million persons employed in the EEC in 1982 (375800:147). Tobacco taxes account for 23,205 million dollars, or 4.5 percent of all European governments' tax revenues (375800:147 based on 1982 figures).

- 304. 384100. This oft-quoted statistic is discussed or mentioned in: 005990:43-44; 008000:55; 021300:101; 026305:89; 050700:82; 050650:I:537; 119000:75-77; 170750:2; **189370:8**; **219450:117**; **247700:58**; **267500:16-17**; 272500:57; 291500:92; 291400:47-48; 279500:188; 368450:69; 371400:vii-viii; 405300:4; 405700:8; 417340:17; 417350:4; 466499:20; 468000:102; 503230:38-39; 513000:39; 542000:41; see also comments in 122200:30. Walker observes that "whatever exaggerations there may be in these reports, it seems clear the early C17 saw a rapid spread in the availability of tobacco and in its smoking" (503230:38-39).
- 305. 005990:45.
- 306. 086500:VII:338. In light of this, Quinn and Quinn's statement that Nicotiana rustica "was not greatly appreciated in England" (377814:163) is puzzling. Good summaries of English domestic tobacco cultivation in the seventeenth century may be found in 050650:I:113-119; 185750; 291400; 291500:129-147; 503230:33-42. In 1967 30-40 pounds of seventeenth-century tobacco were recovered during the demolition of a house in Colchester. According to Walker, the remains were identified as Nicotiana rustica (503230:39).
- 307. 050650:IV:396; 086500:IV:154-155. John Gerard's **The Herbal** (London, 1597) was the first to give a detailed account of **N. rustica** in England (see 157500 and 050650:I:345-348).
- 308. 050650:I:45,315; 050700:49; 291400:75-76; 291500:90,93. Brooks suggests the first crops "were probably supervised by some of the returned colonists, who adopted the Indian methods of cultivation" (050650:I:315; also 050700:49). There is evidence that Raleigh preferred N. rustica and thus helped popularize its use (050650:II:236-237;

267500:12; 291500:83). It must be recalled that sixteenth-century Englishmen also had access to Nicotiana tabacum (see notes 92 and 99).

- 309. 291400:154-157; see also Bennett's (c.1620) A Treatise Touching the Importation of Tobacco out of Spaine (017300).
- 310. 291400:77-78,154-157.
- 311. 464800; see also 050650:II:3-7; 291400:77-78; 291500:131; 503230:37.
- 312. 464800:fol.B1. In his Nepenthes, or the vertues of Tabacco (011640) Barclay insisted that West Indian tobacco was good and dismissed the N. rustica growing in England (see 291500:118-119).
- 313. The history of English colonial tobacco plantations is more fully discussed in Chapter Four.
- 314. 195600:42.
- 315. 291500:132-133.
- 316. 050650:II:64-66.
- 317. 291400:79-92; 503230:37-42. In 1640 John Parkinson noted that N. rustica "is more commonly growing in every country garden" (291500:83-84).
- 318. 291400:97,102,125; 503230:40. This was the case despite the cheap and readily available Virginian product. In 1670 Charles Ii authorised the destruction of domestic tobacco crops by having regiments of horses gallop over the plants (417340:19).
- 319. 291400:123-124.
- 320. 291400:127.
- 321. 050650:I:78; 185250:206; 247700:62; 291400:24-25; 291500:161; 350000:232; 368450:38; 481300:166; 497000:18.
- 322. 050650:II:276; see also 008000:13; 513000:43.

323. 005300; 005310:4; 005520:539; 018650:173; 026300:12; 048500:212; 050650:I:75; 050700:77-78; 026305:90; 076500:140-141; 071200:41; 076970:34; 108700:52; 109000:30; 119000:78n,193; 122200:59; 131876:568; 152950:48; 179900:432; 197100:69; 185250:205; **199500:166; 247700:85; 267500:59; 280250:304;** 291400:25;375300:108; 375500:17-13; 409740:79; 368450:37; 423500:140n; 454100:4; 460482:10; 496700:235; 497000:17; 501400:12; 513000:43. Fisher says the Russian prohibition "had spiritual support, thanks to the conveniently manufactured tradition that it was with the fumes of tobacco, rather than with wine, that the devil had made Noah drunk" (122200:59; see also 185250:205).

- 324. 050650:I:75-77; 423500:140-141; see also: 375500:18.
- 325. 008000:12; 050650:I:73-75,539-541; 103200:14; 109000:30; 119000:79; 152950:48; 179900:432; 199500:165-166; 304800:285; 350000:47; 501400:12. Brooks (050650:I:539-541) and Ortiz (350000:47) imply that these seventeenth-century prohibitions occurred under Murad III. Since this Sultan died in 1595, both authors are likely incorrect.
- 326. Murad IV (also known as Amurath IV) was Sultan from age eleven in 1623 until he died of alcoholism in 1640 (cf. Brooks' claim (050650:I:540) that it was opium that terminated his career).
- 026300:12; 327. 005310:4; 048500:212; 050650:I:75,541; 050700:76-77; 071200:27; 076500:135-139: 086500:VI:297-298; 108700:52; 179900:432; 189370:8; 195600:26; **197100:55,70; 247700:63; 267500:62-63;** 280250:304; **291500:124-125;** 368450:37; 409740:80; 417340:18-19; 454100:4; 460482:10; 465000:14; 465500:6; 496700:237; 513000:44. These actions have erroneously been dated to 1620, 1623 and 1719 (005520:539; 026305:90; 280250:304). It is also said that Mohammed IV (reigned 1648-1687) beheaded smokers (050650:II:508).
- 328. 122200:55-56. Aside from the fact that tobacco appeared not to be sanctioned in the Koran (050650:I:71), it was believed the habit might render people infertile and reduce a man's fighting ability (247700:85; 497000:18).
- 329. 050650:I:75; II:198-200,353; 185250:177,233; 197100:70; 199500:165; 247700:86; 368450:37; 513000:44. These cruelties are, perhaps, expected from a man who is said to have executed, for various reasons, his own son and blinded his father, brothers and two other sons. Some writers suggest that, despite his wrath against tobacco the Shah himself occasionally smoked (291500:125-126; 368450:40).
- 330. 050650:I:75; II:460; 122200:57; 185250:205; 247700:86; 291500:126. Hamilton (without supporting evidence) says Shah Abbas II rescinded all previous laws against tobacco use (185250:206).
- 331. 050650:I:71; 122200:42; 170650:484; 179900:432; 189370:8; 291500:126.

332. 026305:91; 050650:I:73; 050700:76; 064601:1444;

103200:14; 109000:30; 111700:33; 122200:49; 170790:649-650; 195800:166; 215230:36; 247700:86; 267400:3; 291500:122; 350000:225; 501400:12. Two additional edicts are dated 1640 and 1643 (170790:649-650).

- 333. 170790:650.
- 334. 170790:651-652.
- 335. 018690:301; 122200:46; 185250:203; 454100:4.
- 336. quoted in 199500:126.
- 337. Goodrich gives a concise (albeit often inaccurate) list of the dates of the various prohibitions (170790:655-656). Arciniegas refers to these debates as the "tobacco wars" (007500:258-261).
- 338. 050650:I:73,541; 050700:79; 109000:30; 195600:38.
- 339. 018650:174; 021800:477; 050700:78; 109000:29; 122200:vii-viii,ix; 280250:302; 291400:26; 350000:201; 409740:80. Penn says "neither the anathemas of Popes, the decrees of Princes, the warnings of physicians, the wit of fools, nor the wisdom of scholars could subdue tobacco" (368450:40).
- 340. 170790:656.
- 341. 219500:36. This oft-quoted passage is also found in: 005310:4; 005520:539; 005990:57; 021300:96-97,102; 028700:4; 050650:I:57; 021900:88; 050700:71; 064601:1443; 076500:83; 103200:12; 108700:51; 109000:45; 185250:145,202; 122200:29; 170750:8; 119000:81; 189370:8; 195800:166; 199500:154; 215110:350; 219430:32; 219450:112; 267500:29; 291500:108; 308000:461; 322600:6; 350000:224; 336200:xv; 368450:220-221; 405500:6; 412000:392; 454100:2-3; 460482:10; 468000:101; 496700:235; **497000:11; 499000:382; 501400:11; 511500:38; 513000:38;** 528200:6; 528250:II:5.
- 342. 050650:I:57-59; see also 292000:26-27; 503230:33.
- 343. 005990:37-38; 008000:75; 050650:I:60,450-453; 076500:84-88; 119000:80-81; 122200:29-30; 291500:113-114; 350000;244; 368450:71-72; 466499:17-18. It is said that James I did try a pipeful of tobacco after a shower of rain drove him into a pig sty during a hunting expedition (466499:18).
- 344. 050650:I:59.
- 345. see page 78 above and 008000:86-87.

- 346. 291400:131. The degree to which tobacco became important to European economics is suggested by the fact that it was the second largest source of income for Portugal during the eighteenth century (086500:X:615).
- 347. 002900:26-27; 009000:9; 009010:104; 050650:I:77,404n; 050700:108; 076500:149-186; 179900:432; 188700:107; 199500:166-167; 195800:167; 280250:304-305; 291500:155; 350000:192; 375500:18; 409740:80-81; 454100:5; **496700:237; 499000:382; 501400:13; 542000:43.**

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348. 018650:180.

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- 1. see page 32 and Chapter Two notes 65-68.
- 2. 086300:78n; 109000:21; 195600:25; 503230:27.
- 3. 009013:124; 050650:I:19, 82; 050700:30; 122200:11, 12; 139370:8; 195600:12, 25, 31, 267; 205170:388, 389; 279500:188; 291500:67, 75; 350000:284-285. Although most authorities give 1534 or 1535 for the earliest plantations in the New World, a number of earlier dates including 1528 (409740:79), 1529 (291500:301), 1530 (152950:22-23), and 1531 (501400:10) have entered the literature. For a brief discussion of the introduction of tobacco into Spain see Chapter Two, note 77.
- 4. 050650:I:20n. Without citing evidence, Scott and Scott say that the Spanish settlers were already heavy smokers by 1527 (417340:15).
- 5. 009013:124; 050650:I:82-83; 152950:22-23; 188700:107; 205170:388-389.
- 6. 050650:I:84; 195600:41; 291500:99. A more detailed discussion of early Spanish trade of tobacco to England may be found in 350000:302-307. Ortiz notes that by 1614 Spanish colonial tobacco was most often shipped directly to Seville, "under penalty of death" for smuggling it elsewhere (350000:230).
- 7. see Chapter Two, pages 77-78.
- A reprinting of sources as well as a summary and discussion of these early European contacts with Amerindians of Northeastern North America may be found in Quinn (377500; 377600; 377800). See also Hoffman's important analysis of the documentary sources for the 1497-1550 period (203480).
- 9. 046560:32; 377950:183.
- 10. 018520:116. Berlin also suggests that Verrazano made it as far north as Newfoundland.
- 11. 377600:I:284n.
- 12. 315700:298. Axtell also refers to this incident (which occurred somewhere south of New York harbor) but wisely makes no effort to identify the "burning sticks" (010580:10-11).
- 13. 086300:114; 377600:I:286.

- 14. In their enthusiasm to find an early reference to tobacco, both Dickson and McGuire also jump to the premature conclusion that Verrazzano's allusion to fire-curing referred to a therapeutic use of tobacco smoke (086300:114-115; 308000:415-416).
- 15. 060800.
- 16. 377600:II:44. For an alternate rendition see 050650:I:20; 086300:107; 521000:II:177. McGuire also gives a slightly different translation and acds that what Cabeza de Vaca says of smoking "is quite unsatisfactory" (308000:411). Ehwa is definite that the explorer was referring to tobacco (109000:20), while Erichsen-Brown believes it was peyote (116600:421).
- 17. see our discussion in Chapter Two, pages 21-22.
- 18. see our discussion in Chapter Two.
- 19. 308000:411; 521000:I:139.
- 20. 023000:760; 086200:18.
- 21. 086300:108; 308000:377; 308022:603; 308024:767; 377600:I:441; 513000:85,131. In a marginal note to his translation of Alarcon's narrative Richard Hakluyt added "Pipes and bagges of Tabacco." See also the Italian version by Ramusio translated in Dickson (086300:108). Alarcon's description of "certain little long bagges...full of the powder of a certaine herbe, whereof they make a certaine beverage" (521000:I:140-141) has been the subject of some dispute. Originally Wiener had felt "not certain that Alarcon here described tobacco" but he later recanted and admitted that the bags were like the tobacco pouches of the Canadian Indians, "in each case in imitation of the African amulet, as which the tobacco served the Mandingo Negroes, the first to come to the shores of America" (521000:I:141,189; 521300:93). Dixon referred to Wiener's treatment of this passage as "one of the vagaries which fill the pages of this extraordinary chapter" (087000:183).
- 22. see 377600.
- 23. see 377600; 377800.
- 24. 377600:III:341.
- 25. see Chapter Two, page 27 and Plate 6.1 The drawing and observations are from the Laudonnière expedition of 1564-65.
- 26. There is an apocryphal tradition that Drake received tobacco from the California Indians in 1579, though this

remains doubtful (see discussion on pages 124-125).

- 27. see 377600 and 377800.
- 28. see 377600.
- 29. 377600:V:379. To my knowledge this source has never been cited by historians of tobacco.
- 30. 086300:31-32.
- 31. see 377600:III:265-339; 377810:285.
- 32. see Chapter Two, pages 35-36.
- 33. 377600:III:285.
- 34. See Chapter Two, page 36 and note 94.
- 35. 377600:III:318-319. John White's account was printed by Hakluyt (179870) in 1589. Another case of Englishmen looting Amerindian habitations for tobacco is given by Strachey in 1610.(377600:V:297).
- 36. See Plate 6.2.
- 37. 377600:IV:120.
- 38. 355350:49.
- 39. It is doubtful, in any case, that the Basques had at their disposal enough tobacco to buy so many skins and peltry.
- 40. see Chapter Two, pages 69ff.
- 41. see Chapter Two, notes 289-293.
- 42. 050150. The expedition had been sent not only to explore and trade but to obtain sassafras--a root which, together with tobacco, had been popularized by Monardes as a powerful medicinal agent.
- 43. 058600:333; 280050:I:34-35; 377600:III:349; 377814:150; 556750:139; see also 131500:67; 371900:267; 375100:30; 377814:94; 409950:161; 561110:188n: In a list of commodities seen in the country, Brereton again mentions "Tabacco, excellent sweet and strong" (377814:160). Quinn and Quinn claim that this Nicotiana rustica "was not greatly appreciated in England" (377814:163) but we have suggested the contrary (see Chapter Two, page 77).

44. 280050:I:40; 377600:III:351; 556750:143.

45. Archer's narrative was first printed in 1625 in Volume IV

of Purchas' Pilgrimes (375660).

- 46. 280050:I:46; 377600:III:353; 377814:122; see also 015800:13-14; 377800:49; 377814:94. Quinn and Quinn say, of the pipes 'steeled with copper,' that "there is no indication if the bowl was stone or pottery" (377814:97). Brereton, however, clearly stated that the "necks" (i.e., bowl and elbow) of the pipes were made of clay (see note 125 cf. 377814:150). It has been suggested that both the pipes and tobacco had been traded to the Pokanoket by other Amerindians (377814:122n), but there is no evidence for this.
- 47. 280050:I:48,50; 377600:III:354,355; 377814:125,130-131.
- 48. 280050:I:54; 377600:III:356; 377814:137.
- 49. 377814:19. Quinn and Quinn suggest that the explorers may here "have been guided by those who knew from other voyages that it grew better farther south." This seems unlikely, given that Gosnold's men had no opportunity to see the plant in growth and the fact that **Nicotiana rustica** could be propagated with little effort throughout the region from Florida to Quebec.
- 50. As with the 1602 expedition, this voyage was also undertaken partly in search of sassafras.
- 51. 058600:348-349; 280050:I:64-65; 377600:III:360; 377814:22,95,97; 409950:8-9.
- 52. 058600:347; 280050:I:63; 377600:III:360; 377800:49; 377814:220. Pring's narrative was printed in Volume IV of Purchas' **Pilgrimes** (375660). Edward Harlow, who visited the Cape Cod area in 1611, recalled that the natives "are plentifull in Corne and Tobacco but have not many Scinns" (i.e., skins)(377814:480).
- 53. 408410.
- 54. 050650:II:117-118; 058600:372-373; 280050:I:329; 377600:III:371,384; 377800:55; 377814:99,275-276; 441250:76. In a list of plants seen in the New World and appended to his report, Rosier again refers to "Tobacco, excellent sweet and strong" (377600:III:380,391; 377814:308). In a manuscript published by Purchas (375660) Rosier says the tobacco was "very strong" (377600:III:384).
- 55. 050650:II:117-118; 058600:375-376; 280050:I:331-333; 377600:III:372-373,385; 377800:55; 377814:279-281; see also 131500:67,69; 377814:99,100,101; 409950:160-161; 441250:77; 561110:188n. This is the first clear evidence that the Eastern Abenaki propagated tobacco. Some incredulous commentators suggest that the reference to a lobster claw

pipe was a joke (see 377814:101n), but there appears no reason for Rosier to suddenly interrupt his account with esoteric humor. Quinn and Quinn believe that "Rosier is confusing their short stone pipes, with hollow, detachable mouth-pieces of wood, for pottery ones" (377814:279n). Here again Rosier's description should not be so readily dismissed even if archaeological evidence remains inconclusive.

- 56. 058600:381; 280050:I:337-338; 377600:III:375,387.
- 57. 058600:385; 280050:I:342; 377600:III:376-377,388.
- 58. 377600:III:369; 377814:268; 556750:148; see also 375100:30.
- 59. 377600:III:370,384; 377814:271n,272; 556750:149.
- 60. 377600:V:108-109.
- 61. 377600:V:123.
- 62. 377600:V:113-119.
- 63. 377600:V:125.

- 64. 011550:I:129-130; 308000:450; 377600:V:267.
  - 65. 011550:I:135-136; 371900:283; 377600:V:269; 489200:12; 556750:164; see also 131500:67; 267500:99; 308000:450; 441240:I:lxiv; 513000:348.
  - 66. 011550:I:137; 377600:V:270; 489200:14; 556750:166; see also 147500:plates 99,100; 308000:548; 419000:10; 441240:I:lxv.
  - 67. 011550:I:138; 371900:284; 377600:V:270; 408370:62; 489200:14; 556750:166; see also 308000:449.
  - 68. 011550:I:140; 377600:V:271; 408370:64; 489200:16; 556750:167-168; see also 131500:69; 308000:548; 419000:10; 441240:I:lxviii.
  - 69. 377600:V:273,274; 131500:140; see also 308000:548; 441240:I: lxxi,lxxiii. Gabriel Archer gave a similar description (377600:V:276).
  - 70. 011550:I:84; 371900:288; see also 308000:449; 441240:I:xliii.
  - 71. 011550:I:85; 308000:449.
  - 72. 011550:I:101; 377500:448; 377600:V:275.
  - 73. 441225. This was published in London while Smith was still in Virginia.

- 74. 011550:I:188-189; 408370:83-84; 489200:51; 441240:I:21-22.
- 75. 441230.
- 76. 441235.
- 77. 011550:II:342,408; 377600:V:322,349; 441240:I:53-54, 118,350; II:423; 489200:88; 556750:173; see also 050650:II:141; 254407:306; 308000:450.
- 78. 011550:II:343; 441240:I:54,350; 489200:88; 556750:173; see 018520:123; 050650:II:141; 131500:66; also: 308000:401,443,450; 322200:14; 368500:18; 371480:5,14; 470500:178,202; 487000:4; 411000:19-20; 513000:241. Elsewhere the pipes are described as "three foot in length" (441240:II:423). Perhaps in an effort to conceal his plagiarism (see 377600:V:346-347), William Strachey changed a virtually identical comment in his own work from "braines of a man" to "braynes of an horse" (377600:V:350; 457360:48; see also 131500:66; 308000:401,443; 513000:241.
- 79. 011550:II:361; 441240:I:72,367; 489200:106; see also 203502:198; 308000:450.
- 80. 011550:II:367-369; 441240:I:77-78,372-374; 489200:111-113; see also 131500:140; 308000:548; 371900:324; 450000:219.
- 81. 457350; 457360; 457370.
- 82. 457360:48,97-98,108; see also 131500:66,140; 308000:401,443,548; 377600:V:349-350; 513000:241.
- Strachey's ethnographic descriptions (of native pipes and 83. tobacco) not derived from Smith may be found in 457360:39,79,94,122-123; see also 0185200:128; 050650:I:526; 119000:24; 131500:67,69; 308000:451; 377600:V:354; 420000:402; 452500:575; 371900:400; 513000:61; 521000:I:143; 521310:312. Strachey also appended a list of Amerindian vocabulary in which tobacco or pipes occur in a total of twenty-five different contexts (457360:174-204; see also 308000:451; 521310:307).
- 84. see pages 135-136.
- 85. 457360:170-171; 469150:78-79; see also 308000:450; 377800:61; 513000:67. For reasons unclear, Quinn's version of this passage ends in mid-sentence (377600:III:436), while another version published by him elsewhere is complete (see 377814:411). I have quoted from Henry Thayer's edition.
- 86. Although Hudson was serving Dutch interests it is appropriate to discuss his voyage in the present context.

- 87. Just's narrative was printed in Volume III of Purchas' **Pilgrimes** (375660).
- 88. 377600:III:479; see also 131500:69; 411000:19.
- 89. 220230:18; 280050:II:410-411; 377600:III:484; see also: 010930:137; 081710:299-300; 220230:48-49; 371480:2; 411000:19; 441720:96; 475200:26-27; 542000:45.
- 90. 220230:18; 280050:II:410-411; 377600:III:484; see also: 027000:83; 046550:373; 081710:299-300; 131500:69; 220230:48-49; 292300:265; 411000:19; 441720:96; 475200:26-27.
- 91. 220230:19; 280050:II:412; 377600:III:484.
- 92. 220230:20; 280050:II:413-414; 377600:III:485; see also 308000:477; 411000:19.
- 93. 081705.
- 94. 377600:III:491; 116600:422.
- 95. 220230:21; 280050:II:415; 377600:III:485.
- 96. 220230:23; 377600:III:486.
- 97. 220230:24; 377600:III:487.
- 98. 291400:29.
- 99. see Chapter Two, pages 21-22.
- 100. see Chapter Two, page 25-29.
- 101. see Chapter Two, Plate 2.4.
- 102. see Chapter Two, pages 39ff.
- 103. see Chapter Two.
- 104. 377600:IV:299,313; 479560:135-144.
- 105. see page 92.
- 106. 375600:3-4.
- 107. see 187425: plate 33.
- 108. It must be recalled that, by 1600, smoking was a common habit around most European ports (018650:172). Nearly a century later Hennepin was to remark that this was still the case (196748:1:xi,30).

- 109. 020000:I:21; 067555:12; see also 086300:137.
- 110. 020000:I:78; 067555:47; see also 086300:137; 1956000:28-29; 521000:II:177-178.
- 111. 020000:I:78,114.
- 112. see page 24.
- 113. see page 39.
- 114. Dickason observes that the French had already drunk cassine to seal contracts with the Timucuans of Florida in the 1560s (086200:199). Although such practices were standard in French-Amerindian diplomatic relations, it is doubtful that pipe ceremonies were involved prior to the Champlain era.
- 115. 067540.
- 116. 020000:I:100; 377600:IV:396; 521000:II:178. Lescarbot reprinted this account in 279000:II:85; see also 308000:510.
- 117. 020000:I:284; 280050:I:99; 377600:IV:332.
- 118. see page 92.
- 119. see page 95-97.
- 120. 020000:I:328,351; III:375; 377500:398; 377600:IV:339,342. The locations of this cultivation may have been at present-day Richmond Island and Nauset Harbor (see 131500:69).
- 121. 020000:I:357; 377600:IV:343; 308000:489; 513000:54.
- 122. see Lescarbot's version of this incident (279000:II:338; 377600:IV:375; 377800:58).
- 123. 020000:I:427-428; 377600:IV:355; see also 279000:II:338 and 377600:IV:375.
- 124. see Chapter Seven.
- 125. 020000:II:69; 377600:IV:424.
- 126. 020000:II:86; 377600:IV:427.
- 127. see page 106.
- 128. 020000:II:283; IV:182-183; see also 011050:108; 116600:422; 279000:III:31; 477000:280; 481100:154.

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- 129. 020000:I:114-115; 377600:IV:399; see also 116600:422; 377800:51. Brooks says Champlain's tobacco myth "seems to have been the first nicotian fable recorded in its entirety" (050650:I:467).
- 130. 020000:I:444,445; 377600:IV:359-360.
- 131. 020000:II:301-302; IV:200-201; see also 279000:III:33.
- 132. see 020000; 067540; 067545; 067550; 067555; 267830.
- 133. 278900.
- 134. 279000:II:327; 280050:I:265; 377600:IV:370-371.
- 135. Lescarbot was wrong in saying that the Floridians called petun **Tabac**. The latter term came from a common Spanish word for the herb. The reference to Floridians is absent in the 1609 edition (see 279020:229).
- 136. 279000:III:176; see also 050650:I:469 and 279020:229.
- 137. 279000:III:252-253. I have quoted from the Grant translation of the 1618 edition. The Erondelle translation of the 1609 edition allows useful comparisons with the former (279020:298-299; see also 050650:I:469-470).
- 138. 471003:117.
- 139. see Chapter Two, pages 40 and 51. It should be noted that many things about the New World, which were taken for granted by seasoned veterans, were new to Lescarbot. For this reason he (unlike Champlain) provides vivid details on the experience of an Atlantic crossing--a description (like his tobacco account) that could only have been of interest to his armchair readers (see 377600:IV:318-319).
- 140. see Chapter Two, pages 51-52.
- 141. 279000:II:90-91, 177, 325; III:33, 99, 164, 176-177, 190, 194, 216, 252-253, 266, 279.
- 142. see Chapter Seven.
- 143. 020000:I:78, 100, 284, 328, 351, 357, 428, 444; II:301, 302; III:99, 165, 375; IV:200, 201, 282; VI:248; see also 086500:IV:165.
- 144. 020000:I:100, 114, 295, 445; II:69, 86, 282, 284; IV:182, 183.
- 145. 020000:I:114; II:283; IV:182.
- 146. Tabac: 279000:II:426; III:397.

Petun: 279000:II:423,474,557,559,565; 279000:III:318,390,397,398,405,409,439,454 Petuner: 279000:II:423,426 279000:III:317,356,397,413,414,439 Petunoir: 279000:II:426; III:397,414,439.

- 147. 279000:III:356,439; the term calumet is more fully discussed in Chapter Six, pages 291ff.
- 148. e.g., 210500:V:755; 170600:VI:134. Laufer erroneously suggests that a certain Paul Scarron (d. 1660) first formed the verb "petuner" (267500:52).
- 149. see pages 24 and 26.
- 150. 020000:I:99, 101, 180; II:282; IV:182; 279000:II:423, 425; III:317, 367, 393-395, 405, 439; 377600:IV:396, 409; see also 086500:IV:165; 308000:637; 452500:581; 471001:107; 471005:27.

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- 151. e.g., 210500:VII:162; 308000:637; 452500:581.
- 152. 020000:I:99n.
- 153. 020000:I:99; 279000:II:423.
- 154. 279000:III:117-120,366-367.
- 155. 279000:III:123-124.
- 156. 279000:III:393.
- 157. 279000:III:125.
- 158. Plate 3.1a is based on a small figure in the corner of Smith's map. The original is difficult to reproduce and our plate is taken from an etching by Sarah E. Major published in 457370:53. The figure is also illustrated in 005010:192; 195600:47; 377600:V:plate 141. Plate 3.1b is based on a reproduction found in 195200:371 (see also 477000:II:584). Plate 3.2a is based on 258000:II:plate XV as reproduced in 086200:120. Plate 3.2b is based on 258000:I:plate XVIII.
- 159. 279000:III:253,439.
- 160. 020000:I:100; II:282-283; IV:182; 279000:II:85; III:31,253.
- 161. 521000:II:178-179.
- 162. 521000:II:178-179. Wiener's treatment of other tobacco-related matters is discussed on pages 458ff.
- **163.** 005520:539; 076500:73,149; **195600:37,40; 219300:169;**

417340:17; Voges defines **tabagie** as "a pub in which tobacco and pipes were sold for smoking in the 18th and 19th centuries when smoking in public was prohibited" (499055:313). The Oxford English Dictionary also derives the term from **tabac** and defines it as "a group of smokers who met in club fashion." Although smoking taverns were certainly common in Europe as early as the sixteenth century, the word "tabagie" may only have entered some languages much later. For depictions of early seventeenth century European smoking tavern scenes see 021300:94,101; 050600:138,144,146; 076500: figs.16,23, 24,32; 119000:73.

- 164. 086500:VI:280.
- 165. quoted in 452500:581.
- 166. Walker cites a 1620s description of a smoking establishment as "the rendevous of spitting, where men dialogue with their noses, and their communication is smoke" (503230:37). Plate 3.3a is based on a German cut (c.1690) reproduced in 050650:II:528. Plate 3.3b illustrates a scene in London at the time of the Stuarts; from a pen-and-ink drawing in the British Museum reproduced in 076500:77,fig.16. Plate 3.3c is based on 382600:16. Plate 3.3d is based on 179450:25.
- 167. 279000:III:176; 279020:229; 050650:I:469.
- 168. 279000:III:253; 279020:298; 050650:I:469-470.
- 169. 050650:I:156-157; IV:272-274; 109000:36; 119000:147; **195600:63; 197100:3; 199500:16; 247700:80; 291500:193;** 368450:83, 246, 278; 382500:1-2; 382600:26. Penn erroneously assumed that Frederick William I was Frederick the Great (368450:83, 246, 278). The latter was, in fact, the son of the former. Our Plate is based on 109000:36; see also the different painting of the same scene reproduced in 050650:I:157.
- 170. 050650:IV:272-274; 368450:246,278 382500:1.
- 171. 257900.

- 172. 258000:I:296; see also 355320:I:49; 409740:40-41. Comparisons have also been made with the "smoke-filled room" of U.S. politics (195600:28).
- 173. 382500:52. Payments out of municipal funds for pipes and tobacco were made at meetings of the City Council of Bristol in the eighteenth century (368450:83). A number of exclusive smoking clubs also sprang up in the early twentieth century in Holland and Belgium (496870:57-60).
- 174. Commenting on these early comparisons Quinn and Quinn observe that the 'composition' or preparation of tobacco

employed in England at the time "does not appear to be clearly understood" (377814:276n). Valuable information on the nature of smoking substances available in England in the first decade of the seventeenth century is, however, available in an anonymous pamphlet published in 1615 (see 464800).

- 175. 377814:163.
- 176. see Chapter Two, pages 77.
- 177. see pages 271-273.
- 178. One may effectually dismiss Wiener's ludicrous suggestion that the sixteenth-century Hurons obtained tobacco from Europeans on the Gulf of Mexico (521000:I:145,188-190).
- 179. see Chapter Five.
- 180. 011050:111; 011550:II:399; 050650:IV:412; 280500:21; 308000:449; 371480:6; 377600:V:319; 421000:279; 441240: I:108; II:412; 489200:141 (see also Chapter Six, page 264).
- 181. see Chapter Six.
- 182. 542000:45; 542005:66. For a discussion of the more developed calumet complex see Chapter Six, pages 291ff. Quinn and Quinn have attempted to classify these group interactions into "ceremonial," "social" or "trade" activities but their own taxonomy often continues to reflect the arbitrary lines Europeans tend to draw between such categories (see 377814:125n,131n,275n,276n,279n).
- 183. see also 046560:42.
- 184. 377814:122n,268n.
- 185. 099800.
- 186. 086300:133; 377600:I:470-473.
- 187. reprinted in 086300:133; 377600:I:465.
- 188. reprinted in 086300:133.
- 189. 050650:II:303-304; see: 058600:158-159; 086300:133; 100000:87n; 119000:23; 189400:176; 195600:17: 196500:261-262; 199500:35; 291400:29; 308000:423; 386500:444; 513000:81; 371900:184; 521000:I:141; 529000:III:69; 529000:III:69; 556750:98,287n.
- 190. 086300:133.
- 191. 086300:136; 195600:36-37; 291400:29; see also 267500:14-15.

A similar case in Chile is recorded for the year 1594 (050650:II:83).

- 192. 086300:136-137; 267500:14-15,18.
- 193. 377500:433.

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- 194. Canner's account was published in Purchas' **Pilgrims** (375660).
- 195. 377600:V:164.
- 196. see page 97-98.
- 197. 377814:365. Challon's activities are known through the narrative of John Stoneman published in Purchas' **Pilgrims** (375660).
- 198. see page 99. Other plans for tobacco trade in the Caribbean were also made during this period (see 377814:323-324).
- 199. 185655:122.
- 200. 464800:fol.B1; see also: 267500:17-18; 291500:130. Despite growing it themselves, the Spanish were also actively engaged in trading tobacco from Amerindians in exchange for trinkets (350000:285; 505250:48). Europeans even received tobacco from Africans who had managed to obtain the plant prior to direct culture contact. Jobson, who visited Gambia in the 1620s, wrote of some peoples from the interior who "had never seen white men before":

I sent therefore into the boate for some beades and such things, and went unto some of the boldest, giving them thereof into their hands, which they were willing to receive, and with these curtesies imboldned them, that they soone became familiar, and in requitall gave me againe, **Tobacco**, and fine neate Canes they had to take **Tobacco** with." (521000:II:128).

- 201. The Spanish product was often obtained through smuggling and even piracy (see 377814:324n).
- 202. see 368450:3. In his report of Francis Drake's 1579 encounter with California natives, Fletcher notes that the crew received the unidentified herb **tabah** "upon persuasion that we were gods" (050650:II:303-304; 189400:176; 199500:35; 291400:29; 513000:81; 521000:I:141). See also discussion on page 4-5.

203. see Chapter Five.

- 204. 513375:121.
- 205. 377814:107-108.
- 206. see page 102 and 377814:107-108,411n.
- 207. 046520.
- 208. 561110:213.
- 209. 059250:5; 184400:250; see also 010580:8.
- 210. 046800:86-87; 194695:74; 194710:73-74; 479560:126.
- 211. 312869:12,209.
- 212. see pages 93-94.
- 213. see pages 94-95.
- 214. see pages 95-98.
- 215. 020000:I:357.
- 216. 279000:II:327.
- 217. see pages 99-100.
- 218. see pages 101-102.
- 219. see pages 102-103.
- 220. 556750:230-231.
- 221. 561110:196,221.
- 222. 336160:I:90; 336170:III:260-261.
- 223. 016150:192.
- 224. 284600:I:130; 441220:16.
- 225. 355300:185.
- 226. 118800:62.
- 227. 002000:316.
- 228. 195600:123.
- 229. 058010:319n.
- 230. 195600:126-127.

231. 245400:118,150.

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- 232. 220100:II:259-260.
- 233. 205550:180.

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- 1. 377500:463.
- 2. 377500:463; see also 377810:414,419.
- 3. see page 100.
- 4. 185650.
- 5. 185655:105; see also 011552:117.
- 6. see page 122.
- 7. see Chapter Two, pages 77-78.
- 8. see pages 123ff.
- 9. 457360:123n.
- 10. By 1638 the previously praised Nicotiana rustica of New England was considered "odious to the English" (223735:61).
- 11. 457360:122-123; 050650:I:526; see also 119000:24; 371900:400; 377600:V:354; 308000:451; 131500:69; 420000:402; 452500:575; 513000:61; 521000:I:143; 521310:312. John Lawson who travelled through Carolina in 1701 felt that the difference between indigenous and imported tobaccos was a matter of curing and preparation rather than any "Natural Relish" (267875:175-176).
- 12. 457360:38; see also 267500:105.
- 13. 1612 is usually cited because John Rolfe's experiment was associated with that date by Ralph Hamor (see note below). The 1614 date (e.g., 118420:248,401) may have been an inference shared by those perpetuating the tradition that the first Virginia tobacco shipment arrived in England in that year.
- 14. 185450.
- 15. quoted in 050650:I:524; see also 008000:16-17; 188700:112.
- 16. 503230:43.
- 17. 002500:459-460; 011552:117; 050650:I:525; 197170:1-2; 371900:400; 457360:123n; 489200:237; 499000:382; 503230:43; 556700:34-35.
- 18. 219200:11; see also Chapter Two.

- 19. 405300:3.
- 20. Our brief review of the English colonial history of tobacco may be complemented by consulting the following additional 002900:11; sources: 005070:209; 005250; 005310:7; 009013:125-129; 010600:24-40; 018650:175-178; 018685; 021300:47-79; 048700:passim; 050650:1:86ff.; 050700:50-59, 92-103, 110-114, 050800:passim; 076500:92; 078600:133,135-137; 099900:22-24, 59-60; 109000:30-37;118420:41,49,50,67,70,90, 360-361, 111700:37; 371-372 122200:30-31; 152950:23-30; 179450:9; 183530:175, 362-363; 195600:42ff.; 188700:101-103, 107; 195800:163-165; 219200:11-31; 205170:392-394; 241450:4-15; 247560:6-7;247700:58-59; 291400:130ff.; 291500:109-113, 150-151, 208-109; 292970:passim; 312840:93-132; 316350; 322600:6-8; 350000:229; 368450:73-74; 377820:111, 336200:2; 162; 405300:3-11; 405500:6ff.; 382600:14; 409740:81; 412000:392-393; 421700:26-45; 441235; 454465:168-169, 198-199, 202-203, 244-251; 466900:passim; 468000:107-110; 489200:322, 330, 336, 349, 361, 375, 379, 384; 400; 499000:382; 501400:14-31; 504500:17; 511500:37-41, 98-104; 560700:12; 561200:162; The excellent bibliographies by Robert (405300:4n and 405500:283-285) should also be consulted.
- 21. 197170:2; 503230:43. Some authorities claim that the first shipment reached the London market in 1614 (e.g., 371900:400 and 556700:34-35), while others suggest a date as early as 1612 (e.g., 011552:117).
- 22. Stith recalled that in the year 1617: one Mr. Lambert made a great discovery, in the trade of planting. For the method of curing tobacco then was in heaps. But this gentleman found out, that it cured better upon Lines; and therefore the Governor wrote to the company, to send over line for that purpose. (454465:147)
- 23. quoted in 050650:I:525.
- 24. Excerpted from a table given by Herndon (197170:46-49). Similar statistics are also given in 005110:16; 408100:121; 503230:43.
- 25. 009013:129; 291400:4,183.
- 26. 408100:121. Plate 4.1a is based on 466900:28. Plate 4.1b is based on 109000:163 (also reproduced in 099900:59).
- 27. 219200:29,40; 291400:167; 312840:126-127; 355118:238; 408100:121.

28. 291400:167.

- 29. 371900:454.
- 30. 050650:II:143; see also 008000:17. George Sandys (treasurer of the Virginia Company) wrote in 1623: "I protest for my owne part if I knew how to defraie the expenses of the yeare, I would not set one plant of Tobacco whilst I lived in this Countrie: so much I loath it an onelie desire that I could subsist without it" (quoted in 118420:371-372).
- 31. 441238.
- 32. 280050:II:765; 441240:II:932. Commenting on Smith's attitude towards the new industry, Brooks speculates that "perhaps the well-known opposition of James I to tobacco, perhaps a congenital aversion to smoking, perhaps a moral bias, intensified his unfavorable attitude to the 'divine herb'" (050650:II:141; see also 188700:112).
- 33. 556750:255.
- 34. 454465:182-183.
- 35. 118420:371-372.
- 36. 118420:371-372.
- 37. 197170:26; 454465:140; 489200:322,416.
- 38. 050650:II:141; see also: 002500:460; 197170:6; 454465:146 489200:330; 513000:41; 529000:III:141-142.
- 39. 308000:363,416; 513000:41.
- 40. 050650:II:141; 197170:6; 280050:II:761; 441240:II:927.
- 41. 556700:39; see also 471062:67.
- 42. 312840:94-95.
- 43. 481100:163.
- 44. The request came in a letter written from Ferryland, Avalon, Newfoundland (dated August 18, 1629) now in the Arents Tobacco Collection of the New York Public Library. A complete facsimile of the letter with introductory notes has been published by Wroth (560700; see also 312350:174-175).
- 45. 560700:12; see also 195600:267; 292970:9; 336170:V:606. The charter passed the Great Seal a few months after Baltimore's death. Ironically, the first colonists arrived under a leadership that did not initially encourage them to grow tobacco, though the leaf soon became the primary cash

crop (312350:186-187). Maryland might have been founded even in the absence of the tobacco incentive, although, as Quinn observes, "the colony would have found much more difficulty in taking root without it" (377807:130).

- 46. 103240:242; 503230:44; 543800:151.
- 47. 377807:130.
- 48. 292970:9.

- 49. 503230:44.
- 50. 050650:I:138; 219200:28; 312840:94-95. In recognition of this fact Jonathan Carver wrote A Treatise on the Culture of the Tobacco Plant (London, 1779) to encourage domestic planting of tobacco in England during the war with the colonies (064243; see also 008000:21 and 048700:18-19). Fifteen years later Winterbotham published his popular instructions to European settlers on how to plant and prepare tobacco in America (536000:III:427-432).
- 51. 247560:6.
- 52. 197170:50.
- 53. 197170:2-3; see also 322900:203; 489200:284-285,336; 556750:253. Productivity increased throughout the colonial period. In 1624 one man could harvest only 400 pounds of tobacco while at the beginning of the eighteenth century the average had risen to between 1,500 and 2,000 pounds (197170:11).
- 54. 291802:145. In the same year North Carolina grew one billion dollars worth of tobacco.
- 55. 312840:96; 408100:118; 421700:27.
- 56. 197170:7.
- 57. 009013:129; 197170:9; 371900:534; 408100:120; 556700:37. Jasper Danckaerts was later assured, however, that some planters in Maryland "had raised tobacco off the same piece of land for thirty consecutive years" (078600:133).
- 58. John Clayton in 118420:90.
- 59. 009013:129; 197170:6-10; 350000:59-60; 371900:534; 421700:27; 556700:37. The expansion of Virginia tobacco planters to the north and west was given additional impetus when, in 1632, a planting restriction of 1,500 plants per person was enacted, causing many to find lands suitable for higher quality crops (197170:9). The plantations later became known for their notorious use of skilled slave labor

as well as indented white servants (078600:112; 336430:31; 510300:319-320).

- 60. 221600:78.
- 61. 009013:129; 197170:50; 292970:16.
- 62. Bruce quoted in 050650:I:104n.
- 63. 050650:I:103-104; 197170:50; 556700:34-35.
- 64. 292000:27; see also: 048700:41; 131600:62; 197170:51; 308000:458; 421700:30; 489200:379, 384; 513000:41; 529000:III:143. Sheppard notes that Tobacco deteriorates very rapidly under any
  - condition. But if subjected to the constant handling that would come from the direct use of it as a medium of exchange this deterioration would have become very much more pronounced... The early colonists were not slow to realize this and used various devices that would reduce the handling of tobacco to a minimum. In 1693 for example, the colonists were ordered not to pass tobacco from hand to hand but to use tobacco notes. (421700:34-35).
- 65. 005300; 489200:339n; 513000:41.
- 66. 203502:214-215; see also 196770:158; 197170:51; 529000:III:143. For other examples of the use of tobacco as currency in Maryland see 183530:318,320,364.
- 67. see pages 69ff.
- **68. 405500:99.**
- 69. see Chapter Eight.
- 70. Thomas Ashe and Samuel Wilson spoke of the tobacco cultivated in Carolina in the 1680s (412930:147,175). Production was more limited than it was in Virginia. The convenient proximity to the latter colony prompted Lawson to suggest that North Carolina might serve to victual the Virginia tobacco fleets (267875:94). A concise introduction to the role of tobacco in North Carolina is given by Brooks (050800).
- 71. For tobacco in Kentucky see 010600:passim and 312820:237,240.
- 72. 050650:I:106-107; 322900:207,323,349; 511500:45.
- 73. 083100:3; 194800:29; 336170:VI:127, 393. The New York

Colonial Documents are filled with references to tobacco trade, tariffs and duties, although the commodity involved was often from Virginia en route to England (e.g., 336160:I:160; 336170:II:234; III:69, 217, 305, 352, 799; IV:1082-1089).

- 74. 050650:I:106-107; 197200:407; 511500:46; see also 336160:II:1174.
- 75. 223730.
- 76. 223735:61.
- 77. 528970; 561110:371.
- 78. 046510:202-203,286,380.
- 79. 409950:162.
- 80. 050650:I:106-107; 195600:80,267.

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- 81. 241450:8; 511500:43.
- 82. 511500:102.
- 83. 011050:107; 050650:I:78-79; 058600:333n; 100000:86-87n; 308000:419, 459; 381000:108-109; 412900:189; 511500:98-100; 561110:188n.
- 84. 005990:65; 185250:207; 291500:150; 322600:7-8; 368450:82; 511500:101.
- 85. 195600:83; see also: 005990:64-65; 050650:I:79n; 185250:205-206; 205170:394; 291500:150; 322600:7; 501400:18; 511500:101-102. Apperson surmises that "it could hardly have been difficult to evade so absurd a regulation as this" (005990:47).
- 86. 322600:8.
- 87. see pages 79ff.
- 88. 078600:266-267.
- 89. 336170:V:617.
- 90. 511500:328-329.
- 91. 279000:III:252-254; see also 050650:I:469; 116600:422; 267500:1; 471006:33; 481100:154.
- 92. 471003:117; see also 308000:637-638; 481100:154; 513000:85.
- 93. 050650:II:396-397.

- 94. 296950. This short paper is hopelessly inadequate and greatly distorts the history of tobacco-use in New France. Despite the spate of historical works (in French and other languages) available by the early 1920s, Massicotte appears to have read neither the secondary sources, nor the primary material on which these were based.
- 95. 296950:290.
- 96. A reference in the Jesuit Relations from the late 1640s, for example, suggests that soldiers in New France were smoking by this time (see 471032:229-231).
- 97. 481100:153-154.
- 98. See Chapter Two.
- 99. 375600:3-4.
- 100. 021300:220; 050700:114; 195600:55; 219200:24; 291400:168; 375600:4-5.
- 101. 050650:II:386; 050700:155; 350000:304-305; 375600:3-4, 12,73-74.
- 102. quoted in 375600:74.
- 103. Breton in 375600:74.
- 104. 050650:II:384-387 cf. 050650:II:329-335. Plate 4.2 is based on 050650:I:85 (also reproduced in 050600:27; 291400:plateVI; 405700:13). Plate 4.3 is based on 050650:II:332. The illustration served as a model for numerous similar plates published in the eighteenth century and often reproduced since (e.g., 108650:plate30; 291400:132).
- 105. 254590; see also: 050650:III:504; 050700:199. The original work was his Nouveau Voyage Aux Isles De L'Amerique published in the Hague in 1724 (see 050650:III:141-145). No one has noted the curious coincidence: in the same year (1779) that saw the publication of Labat's Treatise On The...Tobacco Plant, Jonathan Carver issued in London a work with virtually the same title (see 064243).
- 106. see page 63.
- 107. 375600:13; see also 108650:31-32.
- 108. 375600:75-77,111.
- 109. Several different varieties of Nicotiana tabacum were being cultivated in the Antilles at the time. These were known as "petun verd," "tabac a langue," "tabac d'Amazone,"

"tabac de Verine" and "petum musqué" (188640:39-40).

- 110. 195600:112; 375600:302; see also: 068550:II:267. John Law's Company was given the tobacco monopoly, the marketing monopoly of Canadian beaver, and exclusive rights to the slave trade (108650:164).
- 111. 068550:II:237; 312020:229,237; 375600:308.
- 112. 312020:239.

- **113.** 471067:281,283,311; 471069:215,217.
- 114. 059300; see also 050650:III:351-353.
- 115. 278100; see also 028800:30; 050650:III:384-385; A detailed modern discussion of tobacco in French Louisiana may be found in 375600:302-360.
- 116. 050650:III:355; 050700:162; 291500:207.
- 117. 291500:207.

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- 118. 050700:162; 291500:207. Some French settlers in Louisiana did, however, continue tobacco production into the nineteenth century (046505:260; 306800:38n).
- 119. 375600:xix.
- 120. 050700:154; 292970:22.
- 121. 312840:128; 375600:xxi.
- 122. 050700:157; 312840:128.
- 123. 009013:128; 195600:54; 291500:213; 312840:130-131.
- 124. 291500:213. Arents adds an additional instance in which tobacco played an important role in eighteenth-century politics: Another interesting fact, not generally known, is that tobacco helped to finance the American War for Independence... Franklin and Deane had arranged with the French tobacco monopolists for the purchase of two million livres' worth of tobacco (five million pounds). A million livres was advanced to Franklin to be used in the purchase of material and to establish credits for the American cause (009013:128).
- 125. 048020:262.

126. 471027:157.

- 127. 296950:295; 368450:128,130.
- 128. 296950:290.
- 129. 296950:290.
- 130. No detailed history of tobacco in early French Canada has surfaced and neither Trudel nor Eccles has much to contribute to the subject. The limitations of Massicotte's paper have already been noted (see page 150).

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- 131. 414870:405.
- 132. reprinted in 336170:IX:89. See also 296950:291; 375600:80; 414870:405.
- 133. 375600:80; 414870:405.
- 134. 296300:5; 414870:405.
- 135. 296950:291.
- 136. 420350:1828.
- 137. 296300:5; 296950:291; 420350:1828.
- 138. 375600:77.
- 139. 422380:115.
- 140. 068550:I:101.
- 141. 322500:277; 336170:IX:907,1046.
- **142.** 290350:5; 296950:291-292; 375600:339; 420350:1828.
- 143. 296950:291-292. Speaking of New France, Charlevoix said (at about this same time) that tobacco grew "very well here, and it is even said, that by making a proper choice of the soil we might raise a most excellent sort of it" (068550:II:116).
- 144. 296950:292; 375600:339.
- 145. 375600:111.
- 146. 187425: plate 48.
- 147. quoted in 116600:424; see also 375600:945-950. Maurepas was Secretary of State under Louis XV (King, 1715-1774) during the years 1718-1749. Beauharnois was Governor of New France from 1726-1747, and Hocquart Intendant from 1731-1748.

- **148. 296950**: 292-293; 375600: 949-950.
- **149. 011050:**113; 011053:36.
- **150. 420350:1828.**
- 151. 223200:1; 296300:5; 420350:1828; 465000:59,73. Tait claims that until the 1920s more tobacco was grown in Quebec than Ontario (465000:74).
- 152. 086745:141n.
- 153. see pages 137ff.
- 154. e.g., 471069:249,263; 471070:39,41,51,57,59.
- 155. 086740.
- 156. 086745:44-45.
- 157. 229200.
- 158. quoted in 050650: III: 460; 296950: 293; 308000: 491.
- 159. 108643:89; 296950:294.
- 160. 159850:45; 220210:264,298; 316200:12; see also 528200:5. Gilman illustrates a Canot de Maitre containing Europeans smoking pipes (159850:71).
- 161. 050650:III:459; 296950:293,296; 308000:477,497-498.
- 162. 237400:185; 296950:293; 308000:497-498.
- 163. see pages 150-151.
- 164. Plate 4.4a is based on 422380:66. Plate 4.4b is based on 086200:277 (also reproduced in 011050:109).
- 165. 108643:89; 479560:195; 481100:154.
- 166. 481100:154.
- 167. see page 33 and Plate 2.2a.
- 168. 050600:21. We know that a 1580 by-law for the town of Enkhuizen prohibited the sale of tobacco on feast days (050600:21-22; 503230:264).
- 169. 122200:53; 503230:264. Robicsek claims that "the Dutch, trying to break Spain's hegemony over tobacco sales, began smuggling tobacco from the West Indies to Europe, mainly England, beginning about 1575" (405700:6).

- 170. 050600:71; 122200:53; 375500:7; 503230:264.
- 171. 050650:II:136,390. For an excellent pictorial essay on the history of tobacco in the Netherlands see Georg Bronger's lavish tome Nicotiana Tabacum (050600).
- 172. 375600:73.
- 173. 475200:36.
- 174. 110930:18; 395930:87; 475200:36. The price has often been converted to the more familiar (albeit improbable modern amount of) 24 dollars.
- 175. 050650:I:98; 395930:18.
- 176. 556700:38; see also 076500:162; 291400:134-135.
- 177. The Dutch colonial documents are filled with references to the transatlantic shipment of tobacco. In addition to the Virginia product, the ships also carried tobacco from the Caribbean, from New Netherlands itself, and even from pirated Spanish vessels (336170:I:40-42, 61-63, 159, 224-225, 436-437, 626; see also 220230:193-196).
- 178. quoted in 291400:163.
- 179. After tobacco became a Royal monopoly in England, colonial planters were allowed to ship only small quantities to the home country and, even then, the prices offered them were lower than those offered by the Dutch (291400:134-135).
- 180. 218500:34.
- 181. 375500:6-10.
- 182. 291400:145; 395930:170,249-250; 556700:46-47.
- 183. References to Dutch transatlantic shipments (of Virginia and other tobaccos) in the 1650s may be found in 336170:I:572; II:16,63; XII:183,195; XIV:157,210; see also 195600:84 and 395930:179.
- 184. 291400:145,166; 292970:22; 395930:170; 556700:46-47
- 185. 292970:22; 556700:46-47.
- 186. 336170:II:210-212.
- 187. References to the Dutch trade in Maryland tobacco in the 1660s may be found in 336170:II:210-212; III:47; XII:363-364, 450-451; see also 194580:19.
- 188. 336170:III:48.

- 189. 395930:18-19.
- 190. 475200:173-174.
- 191. 291400:166-167.
- 192. 110930:28; 395930:260-263.
- 193. 218500:34; 291400:148,166.
- 194. 375600:78. Apart from the Dutch control of Atlantic sea lanes, the diversion was the result of heavy customs and excise duties on Island produce entering France: as much as 50 percent on tobacco (108650:32).
- 195. 108650:63.
- 196. 336170:II:518-519; 503230:35; see also 336170:II:527.
- 197. 395930:204-205.
- 198. 375600:720.
- 199. 336047:3; 395930:172, 163-164, 181-186, 265; 479560:309-310, 315, 334.
- 200. 336170:II:212. One can imagine how tobacco revenues could easily have outstripped the peltry trade. Despite a great deal of emphasis on the fur trade relatively modest quantities of this commodity were exported to Holland: 4,700 skins worth 27,125 guilders in 1624 and 16,304 skins worth 134,925 guilders in 1635 (475200:43).
- 201. 194580:14. At first, Hall had hired himself as farm-servant to Jacob van Curler, but after becoming a freeman he produced a tobacco plantation on Wouter van Twiller's land (336170:I:431).
- 202. 220230:272; 336160:IV:6; 336170:I:181; XIII:iv.
- 203. 556700:142; see also 220230:71; 336160:III:31. The names of some of these tobacco planters are known (e.g., Jacob van Couwenhoven, 336170:I:431).
- 204. 194580:14,20.
- 205. 194580:14.
- 206. 194580:14.
- 207. 528850:86n.
- 208. 395930:132n.

- 209. 084750:250; 336170:XIV:11.
- 210. 021300:75-76; 050650:I:105; IV:476; 336170:XIV:19,23. Our Plate is based on 050650:II:537.
- 211. 084750:269; 220230:227-229.
- **212. 336170:I:154-155.**
- 213. e.g., 152950:23; 219200:20; 371480:2.
- 214. 336170:I:260,265-268.
- 215. 336160:IV:30,35; 336170:I:367. A similar pattern occurred when the Dutch developed plantations on the east coast of Sumatra. Tobacco was raised as the first crop which, in the second year, was moved to a new field and replaced by food production (543800:330).
- 216. 336170:XIV:119, 157, 158, 166, 175; 370500:344-345. Aside from abolishing the duty, the Directors in Holland also wrote Stuyvesant that they consented "upon the request of the inhabitants there, that they may, in their own ships, fetch from the coast of Africa as many negroes, as they shall require for the cultivation of the soil under the enclosed conditions and regulations" (336170:XIV:166). A slave market in New Netherland was also intended to serve as a supply depot for the plantations of Virginia and Maryland (395930:169).
- 217. 050650:IV:476; 370500:344~345.
- 218. see page 140.
- 219. 489950:159.
- 220. 336170:XIV:350.
- 221. 336170:XII:167-168.
- 222. Writing in 1654, one observer noted that "experience has taught us, that New Netherland tobacco is packed in hogsheads very deceitfully with intention to defraud, for the top layers at both ends are of the best quality, while in the middle the worst and most rotten is packed" (336170:XIV:303).
- 223. 336170:XIV:342,350.
- 224. 220230:423; 336170:III:38.
- 225. 336170:XII:141,150,158-162.
- 226. 336170:II:90-91; XII:416,454; 395930:152,219. Rink notes

that the eradication of fur-bearing animals by the 1650s forced the West Indies Company to accept tobacco as legal tender (395930:152n).

- 227. see pages 48ff.
- 228. translated in 050600:24-25.
- 229. 489950:155-156. For some reason he used the sixteenth-century nomenclature, "petum male and female."
- 230. 195600:186-187; 543300:389. It should be noted that New Netherland was not merely Dutch but was the most culturally heterogenous colony in North America (395930:139-171; see also 110930:21).
- 231. 405500:99.
- 232. 050650:III:460.
- 233. 078600:52-53.
- 234. 215215:195-197. A garbled version of this story may be found in Ehwa (109000:53-56); see also 195600:186,267. The incident was illustrated by numerous artists (see 109000:50-51; 195600:186-187; 505250:49).
- 235. 395930:133.
- 236. Heimann leaves the impression that Irving's story is factual (195600:186-187).
- 237. 205170:395.
- 238. Tobacco appeared on Norwegian import duty tariffs in 1589 and was cultivated in that country by 1616 (375500:8).
- 239. 375500:10.
- 240. 050700:78.
- 241. 322900:53.
- 242. 322900:53; 371900:519; see especially Johnson's valuable The Swedish Settlements on the Delaware (223050).
- 243. I use here Jennings' (221600) and Axtell's (010580) synonym for acculturation in northeastern North America.
- 244. 371900:519.
- 245. 336170:XII:21-22.
- 246. 336170:XII:21-22; see also: 223050:I:158-161; 322900:65;

375500:10.

- 247. 375500:10.
- 248. 375500:10.
- 249. 322900.78; 375500:10.
- 250. 556700:139. Brooks says that tobacco husbandry had begun in New Sweden by 1644 (050650:1:105); this date is likely a few years too late.
- 251. 322900:99.
- 252. 322900:111,113.
- 253. 375500:10.
- 254. 322900:96-97,126. O'Callaghan claims that the 1644 cargo contained "2,127 packages of beavers and 70,420 pounds of tobacco" (336170:XII:vii-viii). It is unclear how many pelts were in a "package" or why there is a 50,000 pound discrepancy between Printz's and O'Callaghan's tobacco figures.
- 255. 322900:96-97; see also 050700:101. Johan Printz's personal contribution of Virginia and domestic (New Sweden) tobacco sent home in 1644 totalled 7200 (or 7300?) pounds in 28 hogsheads (322900:108,126).
- 256. 322900:96-97.
- 257. 322900:96-97.
- 258. 322900:120. It is rather difficult to corroborate the accuracy of these figures since a Dutch document of 1649 alleges that the New Sweden Company had "taken up some swindlers, who, contrary to their good intentions, do not endeavor to cultivate, but to buy the produce in the English Virginias and bring it to Sweden under the name of their own harvest" (336170:XII:47).
- 259. 336170:XII:vii-viii. The Dutch appear also to have been envious of the New Sweden Company's tobacco monopoly (050650:IV:476; 336170:XII:47).
- 260. 322900:145-146, 159-160, 162. One passage in Rising's report of 1655 is of particular importance in demonstrating the encroachment upon Dutch trade with both Amerindians and English:

The Minques (Susquehannocks), who are yet faithful to us and call themselves our protectors, were recently here and presented me with a very beautiful piece of land...which we have long desired, and it is said to be very suitable for drawing to us the trade with the Minques, likewise the tobacco trade from Virginia...(322900:159-160)

- 261. 322900:54. Ironically, the founder of New Sweden, Peter Minuit, had established New Amsterdam; moreover, half the capital for the Swedish venture came from Amsterdam merchants (237400:185; 475200:108-109).
- 262. 336170:XII:viii-ix.
- 263. 280469; see also 205120:43-44,47; 371480:2.
- 264. 237400:197.
- 265. 322900:53. Brooks attributes the relatively limited success of Dutch and Swedish colonial tobacco production chiefly to "prevailing agricultural conditions" (050700:101).
- 266. 375500:10-11. The tobacco monopoly was revoked in 1660 and the Company finally dissolved in 1662.
- · 267. see Chapter Two, page 78.

Notes For Chapter Five

- 1. see pages 93ff.
- 2. e.g., 205550:180; 561110:213.
- 3. 503960.
- 4. 423500:137.
- 5. 011053:37; 079350:30n; 196753:147-148; 368450:73; 384310:I:311,381; II:478,504-505,514,588. By 1714 the possibility of fires caused by careless smoking at Hudson Bay posts prompted regulations restricting this activity in certain areas (215170:135). By the early nineteenth century, supplies for employees hired by the Northwest Company included tobacco (215170:240; 291455:34-35,52) and the Northern Department consumed annually 50,000 soon pounds of the smoking substance (215170:306). Some traders were dissatisfied with their Company's offerings and ordered special tobaccos at their own expense (159870:124).
- 6. 223735:61-62. The impact of Nicolas Monardes on this ideology is discussed in Chapter Two, pages 42.
- 7. 064243.
- 8. 355300:86. At about the same time tobacco was being sold in Virginia apothecaries (131600:63).
- 9. 205550:256,343.
- 10. e.g., 229500:320; 306800:185; 336080:245-246; 408425:156-157.
- 11. 119100:39; I am indebted to Toby Morantz for bringing this unpublished reference to my attention.
- 12. 195600:124.
- 13. e.g., 195600:122; 408425:100; 561110:213.
- 14. 408425:122-123. Ross was also obliged to shoot a skunk sitting on a roll of tobacco -- a blast that "delicately perfumed everything" (408425:156). The hardships involved in transporting tobacco through the wilderness in the early nineteenth century raised the price of a pound purchased in Philadelphia from ten cents to two dollars by the time it reached points west (474417:193; 560800:85).
- 15. 235100:150.

- 16. e.g., 408425:126-128.
- 17. 195600:121. Plate 5.2a is based on 195600:121.
- 18. 560800:86; emphasis in original.
- 19. 196753:260-261.
- 20. 195600:112,119-120,125,267.
- 21. 119140:I:378-379. It was estimated that the goods paid to Indian tripmen on the Mackenzie River was one-fifteenth of the entire outfit. Two boatloads of tobacco and other goods were required to pay the annual cost for provisions for transport (215170:342).
- 22. 336170:III:326.
- 23. 544250:75; see also 291455:234.
- 24. 303700:II:19,154-155,203.
- 25. 050650:IV:431; see also 241750:5 for a similar case.
- 26. 146080:72-73; 314800.
- 27. 205550:120.
- 28. 046505:130-131.
- 29. 267875:24.
- 30. 079350:273n.
- 31. 336170:III:772.
- 32. 336170:III:773-774.
- 33. 336170:III:840-842; IV:41,235-236; see also: 475200: 307-308, 312.
- 34. 221620:116-117.
- 35. 218810:18,75.
- 36. 218810:36n,62.

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- 37. 336170: IV: 342,739-740,981,983A,984; V: 268-269,272,385,388. For a similar case in the Hudson's Bay Copy Booke of Letters Commissions Instructions Outward, 1688-96, see 384300: 202.
- 38. 336170:IV:745; see also: 475200:348-351.

- 39. 336170:IV:984A-985.
- 40. 336170:VI:156-157. Allusions in other sources to the use of tobacco in changing or maintairing allegiance include 005667:21; 291455:243; 303700:II:153; 355300:117-118.
- 41. 079350:135; 384310:I:493; see also 291455:269.
- 42. e.g., 026800:III:18, 332; IV:44,45; 046500:137; 046505:108, 111; 058000:326, 331, 335; 073700:II:80-81, 120; 076970:43; 118570:14; 119140:I:82, 262; 119800:169; 146050:245; 174100:303, 339-343, 355, 390, 400, 403, 534, 535, 561; 175200:II:126; 194695:172, 259; 195600:121-123; 196753:328 201050:299; 205550:88, 95, 144, 154, 222-223, 239, 242, 343; 215170:195, 320, 374; 215400:xxvii; 218800:26, 122; 220100:I:203, 204, 231-232, 285, 315; II:142, 191-192, 200, 207; III:119-221, 234-235; 220210:182; 229500:311, 331; 232400:383; 280760:92, 104; 290400:102; 291455:246-247; 303700:I:286, 328, 351; II:17, 128, 132, 137n, 152, 161, 220, 290; III:23; 305000:5; 308000:562; 314800; 336080:274; 36170:V:266; VII:103, 113, 141, 149, 173, 176-177, 181, 182, 245, 254, 327-328; VIII:40, 119, 231, 365, 479, 483, 501, 536, 557; 355090:42; 355300:91; 371980:261; 408425:212, 241; 510100:43n; 542000:272.
- 43. 218810:11.
- 44. 120203:24-25.
- 45. 475200:212-213. Aside from tobacco, Europeans sometimes gave cloth, rum, powder, lead, guns, coats, hats and shirts, while Amerindians gave peltries (475200:212-213). The exchange of presents at councils appears to have reflected, on a token scale, the barter economy of the fur trade.
- 46. 079350:xxix,6,135,268-269; 146080:46; 381830:55-62,233,235; 384310:I:498,534,646; II:73,626; 524700:315-319.
- 47. 381830:59-61,233,235.
- 48. 146080:98, 100-101, 124, 127, 169; 215170:270-271; 381830:195,199; 384310:I:646; II:33,77-78.
- 49. 195600:121.
- 50. 195600:125.
- 51. 220100:II:207.
- 52. 175200:II:126.
- 53. 303700:II:290.

- 54. 159870:111; see also 218810:72.
- 55. 195600:127-128.
- 56. Plate 5.1 is based on 159850:5. Plate 5.2a is based on 195600:121. Plate 5.2b is based on 195600:124 (also reproduced in 159850:53).
- 57. 221615:58-61.
- 58: e.g., 076500:163-164; 208400:449; 232400:390; 241600:14; 308000:461; 371480:2; 513000:233-234.
- 011050:112-113; 011053:38-39; 046505:87, 97; 078455:26; 119140:I:307, 317, 348; 130000:283-284; 174100:429; 59. 174750:86; 175200:II:131; 195600:122-123, 125, 127; 201050; 205550:57, 186, 217, 226, 258; 220100:I:281; II:217,219; 232400:63; 280760:85; 291455:70; 303700:I:379; II:12, 368; III:45; 308000:589, 447; 314800; 336160:I:153-154; 336170:III:393; 355090:57, 231; 405500:75; 408425:151, 199; 412930:117; 471056:157; 474417:148, 347; 518300:10; 560800:45, 57. It is possible that Cabeza de Vaca observed tobacco trading as early as 1522 (see 195600:24-25) although it is not at all clear that his vague allusion to "a smoke" referred to a Nicotiana species. Tobacco was also prominent in trade with natives in other parts of the world. Wolf notes that natives were hired on contract to obtain sandalwood in New Caledonia and the New Hebrides in return for iron tools, hardware, cloth, tobacco and pipes (543800:258).
- 60. Major Morrell Marston predicted that "powder, flints, and tobacco would be much more acceptable to them than blankets, strouding, etc., which they have been in the habit of receiving" (022000:II:182).
- 61. 336160:I:15?-154; 336170:III:393; see also 174100:429.
- 62. see note 101.
- 63. 196753:320; see also 118570:14; 215170:194-195.
- 64. 195600:122-123. The company was eventually able to buy more from a licensed Indian trader.
- 65. 046505:97.
- 66. 408425:199.
- 67. 303700:III:45.
- 68. 474417:347.
- 69. 308000:589.

- 70. 119140:I:317. Hooper "purchased an oomiak -- woman's, or family boat -- made of two walrus skins, sewn together, and stretched tightly over a light wooden frame: with paddles complete, its price was a large butcher's knife, a looking glass, and a quantity of tobacco and beads" (205550:226).
- 71. As Trigger observes:

It is often cited as evidence of Indian naivety that they were prepared to trade valuable furs for European goods of little value. Anthropologists object, however, and claim that to Indians furs were commonplace, while European goods were scarce and valued for their utility, beauty, and perhaps for their supernatural significance. (479560:188-189)

- 72. 195600:126-127.
- 73. 146080:167.
- 74. 221000:78.
- 75. The rich harvest of yellow tobacco leaves was often compared with gold (050800). The "storehouse for the skins of dead beasts" was Le Jeune's description of New France in the 1630s (481100:181).
- 76. see 312993:passim; 546200:xxviii-xxxiv.
- 77. 312993:17-31.
- 78. 312993:32-45,67-78.
- 79. 312993:46-66.
- 80. see page 145ff.
- 81. 312993:114-117. Rink points out that not only did New England have a poor supply of otter and beaver, but the strategically important waterways were controlled by the Dutch and the French. Even the Connecticut River fur trade was comparatively limited and New England merchants were led to develop the more lucrative West Indies trade (395930:212).
- 82. 377807:134.
- 83. see page 147.
- 84. 475200:358.
- 85. 324020:8; 475200:215.

- 86. 336047:6; 475200:241. Competition among the fur trades of New England and New France had already occurred in the Kennebec and Penobscot areas (312993:90~94).
- 87. 475200:217. Commenting on the Anglo-French rivalry in the mid-eighteenth century fur trade, Innis observes that the British had better quality kettles and cloth, as well as a cheap supply of rum from the West Indies (215170:85). Eccles, however, believes French goods were often of higher quality. He also doubts that the difference between Montreal and Albany prices was as great as is commonly believed (108650:100n-101n).
- 88. 336047:31.

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- 89. 475200:223.
- 90. 336047:30. In his important study of the fur trade in colonial New York, Norton makes absolutely no mention of tobacco, though he does discuss a plethora of other trade goods (see 336047).
- 91. 384310:I:33.
- 92. 011053:36; 384310:1:33; 513000:55.
- 93. 471056:157,177; see also 215170:47.
- 94. 011053:36; 384250:lxvi,108.
- 95. 384260:I:xxxiii, 52, 168, 118, 176, 187, 317-319; II:114, 138, 189, 193, 194, 210-212, 293-294, 297-298, 307-309. The number of hogsheads and rolls of tobacco shipped in the 1684 outward cargo must be measured by the hundreds, if not thousands (see also 381830:93; 384310:I:101).
- 96. see pages 218ff. for a discussion of the French distribution of tobacco to Amerindians.
- 97. 108650:87.
- 98. 215400:86n; see also: 011053:37; 384300:xxxix; 384310:1: 178,181,190.
- 99. 384310:I:178.
- 100. 215400:86n.
- 101. 011053:37. Newman illustrates a document from 1715 showing how much Brazil tobacco, tobacco tongs, tobacco boxes and other articles were worth in portions or multiples of "made beaver" or prime pelts (3280/0:206). For eighteenthcentury official Standards of Trade relating to tobacco see 146080:49 (table 4); 381830:64 (table 1), 130 (table 16),

196 (table 20), 262 (table 24), 268-269 (table 28); 524700:272,274,277,279.

- 102. 384310:I:254,264,292,310-311.
- 103. 384300:xxxix,123,200,210 327; 384310:I:279.
- 104. 384300:227.
- 105. 384310:I:326,369.
- 106. see 384300:xxxviii-xxxix, 21, 57, 68, 143, 148, 209, 238; 384310:I:310-311, 329, 369.
- 107. 384310:I:372.
- 108. 011053:37; 384310:I:381, 452-453. It was rumored that some employees sold one another tobacco for ten shillings a pound (079350:69).
- 109. 079350:30n. In the late-eighteenth century Andrew Graham observed that "the Company allows their servants to buy goods out of their warehouses; at the same time they give their Factors a strict order not to allow a person to buy any goods of quality or quantity more than what is really useful to him. This is done to prevent private trade." One pound of English roll tobacco was still one Shilling in Graham's day, while Virginia leaf was priced at 6d. (524700:307-308).
- 110. 118570:1; 146080:xi,167-168; 513375:126.
- 111. 384310:I:512.
- 112. 384310:I:452-453,512.
- 113. 381830:262, table 24, 268-269, table 28.
- 114. 079350:43,48.
- 115. 384310:I:452-453.
- **116.** 384310:I:452-453.
- 117. 384310:I:391-392.
- 118. 079350:98.
- 119. 079350:102; see also 524700:276n.
- 120. 079350:109. Some concern over the spoilage of such a
  perishable commodity remained, however (079350:132;
  384310:I:538).

121. 079350:127.

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- 122. 079350:149; see also 011053:37; 384310:I:452-453.
- 123. 079350:157; 381830:181,190. For other comments and complaints (referring to tobacco) by officials during the 1730s, see 079350:154, 169, 195, 199, 212, 213, 220, 222, 226, 230, 251, 259, 292; 381830:128.
- 124. 079350:212-213,220,230,251,259; 384310:I:559.
- 125. 384310:I:594.
- 126. 215400:237; 384310:I:596.
- 127. The complexities of Anglo/French fur trade economics have been discussed by Innis (see esp. 215170:96-97).
- 128. 384310:I:527.
- 129. 215400:lxviii; see also 215400:xx.
- 130. 215400: lxx,85-86; see also 159850:54; 381830:66. A nearly identical passage was recorded by Graham and plagiarized by Umfreville:

We paddle a long way to see you. We love the English, let us trade good black tobacco, moist and hard twisted, let us see it before opened, take pity on us, take pity on us, I say... Let the young men have more than measure roll tobacco cheap... (524700:323; see also 215170:140-141).

- 131. 058000:353; 058010:39; 215170:97; 384310:I:638-639. Despite the importance of tobacco, it is obviously an exaggeration to suggest, as Weber (505250:48-49) does that "the downfall of the French in the New World was due in part to the fact that the British were able to present greater gifts to their Indian allies, among them good tobacco."
- 132. 384310:ī:644.
- 133. 384310:II:18-19.
- 134. 384310:II:23; see also 146080:100-101.
- 135. 384310:II:36.
- 136. 524700:lxix,261.
- 137. 381830:196, table 20; see also 524700:290.
- 138. 215170:129.

- 139. 215170:207.
- 140. 215170:193-194.
- 141. 215170:270-271.
- 142. 381830:195.
- 143. 118570:9.
- 144. 215170:157.
- 145. 011053:37-38.
- 146. Tobacco continued to be prominent in accounts of the contents of canoes and was considered one of the chief trade commodities (215170:228,235).
- 147. 314800. I thank Toby Morantz for access to her computer transcripts of this interesting journal.
- quoted in 011053:38-39. According to Samuel Hearne, Brazil 148. tobacco was twisted into the form of a rope nearly an inch in diameter, and then wound into a large roll (011053:37; 196753:321n). Since carrots and rolls assumed a variety of shapes over three centuries, it is often difficult to associate either with a particular type of tobacco. As early as 1789 the English attempted to substitute the "Brazil" the cheaper Roll tobacco for product (050650:IV:43). See also note 276.
- 149. 146080:123,127. According to Francis and Morantz, "the records as late as 1865 indicate that the Hudson's Bay Company men were still giving presents as a means of encouraging trade and discouraging the hunters from taking their trade to posts in other districts" (146080:169).
- 150. 011053:38-39.
- 151. 011053:39.
- 152. Helm, Rogers and Smith illustrate a replica of such a tobacco carrot (196710:151).
- 153. As Humbolt said, tobacco was "worth crossing the Atlantic for" (118400:809).
- 154. For a brief summary of Amerindian tobacco-use see Chapter One.
- 155. 1627 colonial figures based on 481100:163,165.
- 156. Accurate population figures for Algonkian hunter-gatherer groups are difficult to obtain. An Jroquoian-speaking

population of over 100,000 around the year 1600 has been estimated, though the Ontario Iroquoians alone may have numbered over 60,000 people (187425:5). The combined Huron/Iroquois population reached a nadir in the mid-eighteenth century, when 3,000 individuals are thought to have survived (479560:241).

- 157. The 1663 colonial population figures are based on 481100:268. Eccles gives a total of 2500 for New France (108643:85) but we follow Trudel's more recent and reliable calculation of 3035 (481095:1). The combined English-Dutch figure includes 40,000 in New England, 30,000 in Virginia and 10,000 in New Netherland. Other population figures may be found in 292970:18-19 (Virginia and Maryland), 475200:102 (New England) and 395930:264; 475200:58 102,173 (New Netherland). New Sweden, the fourth colonial power in the Northeast, never had a population exceeding 300 persons (475200:109).
- 158. 292970:18-19.
- 159. 108643:103.
- 160. 108643:103.
- 161. see page 160.
- 162. see page 104ff.
- 163. e.g., 058010:318-319; 308000:489; 377800:54; 412295:106-107; 412300:73; 412302:85; 412500:I:222-223; 419000:17; 471007:217; 471051:43; 471054:229; 471059:153; 481100:154; 513000:54.
- 164. 058010:318-319; 419000:17.
- 165. Examples of Amerindians rejecting high-quality European tobacco are difficult to find. The Englishman Anthony Hendry observed in 1754 that the natives on the Upper Saskatchewan "think nothing of my tobacco, and I set little value on theirs; which is dryed Horse-dung" (118570:14). It should be remembered, however, that Hendry may have meant his personal (non-Brazilian) stock rather than a trade tobacco, especially since he had no trouble bartering tobacco to other native groups (see Table 8.2).
- 166. "Dear and Elk-meat" were also obtained by the French in exchange for tobacco (e.g., 196748:1:74).
- 167. 081730.
- 168. 086500:VII:377-378.
- 169. see pages 207ff. Dickason leaves the rather surprising

impression that this tobacco was cultivated by the Tupinamba-Guarani rather than the Portuguese (086200:185).

- 170. e.g., 050650:III:37; 068550:II:116n; 258600:I:168-169, 207, 377; 312020:53; 324450:10.
- 171. see Chapter Three.
- 172. 521000:I:176-177; II:133.
- 173. 521000:II:129.
- 174. see pages 6-7 above, and 521830.
- 175. 521830.
- 176. see Chapter One, pages 6-7.
- 177. see pages 204ff.
- 178. Our Plate is based on 159850:32.
- 179. see page 7.
- 180. 471004:207; see also 116600:423; 215170:33-34; 477000:I:358-359; 479560:209; 521000:I:144.
- 181. 479560:209; 521000:I:144.
- 182. see pages 151ff.
- 183. 375600:4.
- 184. 375600:173-174,856.
- 185. 375600:15; see also 197100:72.
- 186. 258600:I:373. Thwaites calculated that (by 1905 standards) the retail price of imported tobacco must have reached nearly two dollars a pound (258600:I:373n). In 1748 the five sols-per-pound tax appears to have been reduced to one sol, six denier per pound (296950:294). Eccles notes that the only tax levied on the colony in the seventeenth century was a 10 percent duty on wine, spirits and tobacco (108650:71,84).
- 187. 258600:I:374-375. Estimates for the cost of imported tobacco (of unspecified provenance) for the 1668 to 1758 period range from a low of 30 to a high of 60 sols per pound (296950:295).
- 188. 296950:295.

189. 279000:252-254.

- 190. 312020:53. I have used the McWilliams translation of the Penicaut narrative. It should be noted that Neill's translation suggests that "Brazil" tobacco sold "in the proportion of a hundred crowns the pound" (324450:10).
- 191. see page 160.
- 192. see page 208.
- **193. 258600:I:377**; **312020:53**; **324450:10**.
- **194.** 076565:73; 215170:60; 231080:207.
- 195. 471059:175.
- 196. 336170:IX:220.
- 197. 215170:48n.
- 198. see pages 204ff. and 215170:93. In the early eighteenth century Silvy noted that "fathoms of tobacco rope" were used to barricade rivers to try to stop Amerind canoes and convince the occupants to trade (422380:51).
- 199. see pages 204ff.
- 200. 108650:93-94.
- 201. 215170:83.

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- 202. e.g., 050650:III:37; 058010:146-147, 318-319; 076565:73; 086745:141; 258600:I:140, 377; 284600:I:154, 180; 296950:291; 312020:53; 324450:10; 336170:IX:220; 419000:17; 441220:44,75; 454940:3; 471004:207; 471009:23; 471059:175; 471063:259; 471066:159; 477000:I:358-359; 479560:209; 521000:I:144.
- 203. 258600:I:168-169; 471015:27.
- 204. e.g., 022000:II:19, 76-78, 100; 028800:136-137 058010: 144-147, 290-291, 305, 359; 196748:I:157, 196, 205, 229-230, 241, 304; 245400:258; 258600:I:168-169, 174, 176; 263550:II:167; 336170:IV:890; V:709; IX:104, 649, 706-707, 1034, 1089; 471005:161; 471007:175; 471009:273; 471024:151; 471027:271; 471028:215; 471041:21; 471065:209; 471067:141; 471068:269; 512970:27. Tobacco presents were such an important part of native thinking that some individuals literally dreamed (or at least professed to have dreamed) of Frenchmen handing out the precious leaves (471005:159).
- 205, 083900.

206. 084000:445; 215170:10.

- 207. 116600:424-425; 196745:304,533; 196748:I:157, 196, 205, 229-230, 241, 245, 245; II:533; 268550:142,233.
- 208. 196745; see also 196742; 196743; 196744.
- 209. 196748:I:157, 180, 229-230, 241, 249, 304; II:533; see also 050650:II:562; 116600:425; 377020:64.
- 210. quoted in 086500:VIII:448-449.
- 211. 471065:209. Carheil complained to the Governor that the funds provided for this purpose were more than enough and that the Commandants skimmed off surpluses for their own use, at the King's expense.
- 212. e.g., 086745:187; 258600:I:207; 336170:IX:98, 241, 887; 471005:113; 471007:137-139, 163; 471010:249; 471056:169, 189; 471067:59.
- 213. e.g., 471013:141, 171, 219; 471017:95; 471022:237; 471024:137; 471061:131.
- 214. e.g., 007000:119; 022000:II:176-178; 058010:135-139, 305, 359; 336170:IV:890; V:709; IX:479, 706-707; 454500:605; 471049:69; 471065:209; 512970:27.
- 215. 058010:135-139.
- 216. 454500:605.
- 217. 028800:136-137.
- 218. see page 102-103. In his burlesque **History of New York**, Washington Irving said that the great explorer, upon approaching Manhattan puffed so mightily on his pipe that the smoke kept the Island from the sight of his companion Juet. The latter was obliged "to wait, until the winds dispersed this impenetrable fog" (050650:IV:211-214).
- 219. 110930:19; 395930:24-32; 475200:25-26.
- 220. 046805:202; 377500:III:468; 475200:30-35; 479560:177,310. Although the Mohawks undoubtedly received European goods from their neighbors, it remains uncertain whether this Iroquois group was in direct contact with the Dutch during this early period.
- 221. see 050600.
- 222. Such exchanges of European and native tobaccos have, of course, been documented in "first-contact" situations elsewhere (see page 220-221).
- 223. 475200:137.

- 224. 395930:210-211.
- 225. 395930:196-198.
- 226. 395930:153. Tobacco was packed into casks, barrels and hogsheads -- containers not standardized until the eighteenth century. Jackson estimates that by the end of the seventeenth century the weight of a hogshead of tobacco was close to the weight of the same cubic content of water (218500:35). The 114 florin-per-hogshead quoted by Rink is based on a 240-pound hogshead.
- 227. 046805:202; 475200:48; 479560:182-183,310-311.
- 228. 475200:132.
- 229. 046805:202; 475200:48; 479560:310.
- 230. 395930:126; 475200:51,70,93-94.
- 231. 475200:48.
- 232. 215170:35; 395930:126; 475200:95-96; 479560:191.
- 233. guoted in 291500:314.
- 234. 050650:I:151; 122200:41; 247700:43; 291500:121; 382500:106; 382600:28. When the Portuguese advanced into Angola in the late sixteenth century, Brazilian tobacco was one of the commodities used to purchase slaves (543800:223). Commenting on another case, Mackenzie laments:

The welcome tobacco received from the natives suggested a use for it in trade, and that the abominable slave trade. In due course the price for an unhappy Negro kidnapped in the interior by slave-traders on the Guinea Coast was six or seven rolls of Brazilian tobacco. We can reflect with a sigh that a human being was weighed against tobacco and dragged from home to misery. (291500:121)

- 235. See the excerpt from Kolb's **Beschryving Van De Kaap De** Goede Hoop (Amsterdam, 1727) in 050650:III:201-204.
- 236. 475200:64.
- 237. e.g., 174100:214-216; 336170:XIII:184; 503412:44.
- 238. 336160:IV:45; 336170:XIII:324.
- 239. see page 204ff.
- 240. 110930:26; 312993:40-48, 79-90; 395930:124-127, 215-222;

475200:55, 102ff.

- 241. 475200:109.
- 242. 221610:220; 475200:109.
- 243. see page 179.
- 244. 475200:52-54; 479560:190,287,315.
- 245. 479560:190.
- 246. see page 221.
- 247. 336170:I:154-155.
- 248. 395930:169.
- 249. 475200:54.
- 250. 220230:141; 375100:36; 528850:88.
- 251. 153500:252-253.
- 252. 153500:passim. I thank Bruce Trigger for bringing this recent article to my attention.
- 253. 220230:143; 528850:89.
- 254. 174100:47; 220230:143; 528850:89.
- 255. 475200:36; 479560:182.
- 256. e.g., 336170:XIII:191.
- 257. 174100:214-215; 336170:XIII:184-185.
- 258. 174100:214-216; 336170:XIII:184-185.
- 259. 118570:14.
- 260. Louise Sperling, personal communication, 1986.
- 261. 010580:14.
- 262. e.g., 524700:315-319.
- 263. 381830:62,233.
- 264. 218810:13.
- 265. 185000.
  - 266. 159850:1.



- 267. 159850:2.
- 268. quoted in 513375:121.
- 269. e.g., 146080:25; 381830:54.
- 270. See Francis and Morantz (146080:46-47), Ray and Freeman (381830:xv-xvi, 5-6, 231-236) and especially Trigger's concise treatment of this controversy as it relates to the North American fur trade (479560:183-194). A broader perspective may be found in Braudel (048021:227).
- 271. 303650.
- 272. 303650:ix.
- 273. 479560:193.
- 274. 048021:227.
- 275. 488750:574-575.
- It is virtually impossible to make tolerable estimates 276. based on the available documentation, let alone attempts to extrapolate beyond the surviving records. Tobacco was packaged in a bewildering array of forms and containers with few efforts towards standardization. We find references to pounds, rolls, carrots, hands, feet, anchers, twists, fathoms, casks, pricks, bales, packages, plugs, hogsheads and barrels. An in depth study of what quantity each of these may have represented at different periods and in various settings is desperately needed. Internal evidence is sometimes revealing but often contradictory. Between 1657, and 1757 a hogshead of Virginia tobacco varied in size and weight from 300 pounds to as much as 1,274 pounds (197170:17-19). Brazil tobacco was packaged in cigar-shaped packets called carrots or long ropes called Both were packed in rolls, bales or barrels for twists. canoe transport. In the eighteenth century bales were most often ninety pounds, while rolls could weigh ninety, forty-five or even less (packages weighing more than ninety pounds would have been impractical for portaging). Smaller units were used in calculating the actual distribution to Amerindians--a procedure complicated by the fact that tobacco was shipped by weight but sold by length (see 079350:268; 118570:14; 159850:32; 215170:209, 216, 219; 384310:I:391-392). The linen, canvas and cord line used to package the tobacco were likely recycled and employed in other areas of the trade (215170:209,305). As the fur trade companies penetrated to the interior, winters were spent unpacking and preparing tobacco and other goods (215170:156).

277. 187425:143; plate 60; 291455:32; 384310:I:594. In his 1785

list of articles loaded in a canoe, Joseph Hadfield notes 720 pounds of tobacco in 8 rolls and bales. This represents 13 percent of the total weight of trade goods--a considerable quantity when considering the much lower volume/weight ratios of other items such as guns, ammunition, kettles and hatchets (215170:216).

- 278. 187425:plate 60.
- 279. 384260: Appendix B; 384300:227.
- 280. 215170:193.
- 281. see Chapter Two, page 70.
- 282. 221615:83.
- 283. 544250:75.
- 284. 412930:117.
- 285. 079350:passim; 187425: plate 60; 215170:passim; 314800: passim 384250:passim; 384260:passim; 384300:passim; 384310: passim; 471056:157.
- 286. 174100:303.
- 287. 209870:II:99.
- 288. 050650:IV:431.
- 289. 174100:339-343.
- 290. 174100:355; 305000:5.
- 291. 336170:III:326.
- 292. 076500:163-164; 241600:14; 308000:461; 371480:2; 513000:233-234.
- 293. 208400:449.
- 294. 174100:390.
- 295. 1741000:400.
- 296. 174100:403.
- 297. 079350:380,384.
- 298. 174100:534; 336170:III:772.
- 299. 174100:535; 336170:III:773-774.



Notes For Chapter Five

- 300. 174100:561; 336170:III:840-842.
- 301. 336170:IV:41.

- 302. 336170:IV:235-236.
- 303. 336170:IV:342.
- 304. 336170:VI:156-157.
- 305. 336170:IV:739-740.
- 306. 336170:IV:745.
- 307. 336170:IV:981.
- 308. 336170:IV:983A.
- 309. 336170:IV:984A-985.
- 310. 336170:IV:984.
- 311. 336170:VI:156-157.
- 312. 336170:V:266.
- 313. 336170:V:268-269.
- 314. 336170:V:272.
- 315. 336170:V:385; VI:156-157.
- 316. 336170:V:388.
- 317. 336170:VI:156-157.
- 318. 232400:383.
- 319. 232400:390.
- 320. 073700:II:80-81.
- 321. 073700:II:120.
- 322. 510100:43n.
- 323. 218810:100.
- 324. 218810:122.
- 325. 146080:72-73.
- 326. 058000:326; 058010:38.

- 327. 058000:331; 524700:206.
  - 328. 058000:335.
  - 329. 241750:5.
  - 330. 336170:VII:103.
  - 331. 336170:VII:113.
  - 332. 336170:VII:141.
  - 333. 336170:VII:149,173.
  - 334. 336170:VII:176-177.
  - 335. 336170:VII:181.
  - 336. 336170:VII:182.
  - 337. 336170:VII:245.
  - 338. 336170:VII:254.
  - 339. 119800:169; 308000:562; 336170:VII:327-328.
  - 340. 371980:261.
  - 341. 196753:163.
  - 342. 355300:91.
  - 343. 336170:VIII:40.
  - 344. 336170:VIII:119.
  - 345. 336170:VIII:231.
  - 346. 336170:VIII:365.
  - 347. 011050:112-113; 011053:38-39; 215170:passim.
  - 348. 215170:193.
  - 349. 215170:193.
  - 350. 336170:VIII:479,483.
  - 351. 215170:193.
  - 352. 215170:193.
  - 353. 336170:VIII:501.



- 354. 215170:193.
- 355. 215170:193.
- 356. 336170:VIII:536.
- 357. 336170:VIII:557.
- 358. 118570:14; 196753:260-261; 215170:194-195.
- 359. 196753:286,296-297,328.
- 360. 215170:216.
- 361. 215170:270-271.
- 362. 291455:234.
- 363. 078455:26; 280760:85.
- 364. 280760:92,104.
- 365. 118570:10.
- 366. 118570:14.
- 367. 291455:243,246-247.
- 368. 291455:269.
- 369. 201050:passim.
- 370. 235100:150; see also 118570:14 and 215170:194-195.
- 371. 195600:121-123,267.
- 372. 315500:483.
- 373. 046505:87,97,108,111,130-131.
- 374. 195600:125; 408425:126-128,151,156-157,199,212,241.
- 375. 046500:137.
- 376. 146050:245.
- 377. 229500:311,331.
- 378. 336080:245-246,274.
- 379. 220100:I:203-204, 231-232, 281, 285, 315; II:142, 191-192, 200, 207, 217, 219; III:119, 212, 220-221, 234-235.
- 380. 215170:320.

381. 174750:86.

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- 382. 175200:II:126,131.
- 383. 560800:45,57,86,88.
- 384. 303700:I:286, 328-329, 351, 379; II:12, 17, 19, 128, 2-2, 137n, 152-155, 161, 203, 220, 275-276, 290, 368; III.23, 33, 45, 47, 52, 62, 68.
- <sup>385.</sup> 474417:148,347.
  - 386. 308000:589.
  - 387. 119140:I:82.
  - 388. 119140:I:262,307,317,348,378-379.
  - 389. 355090:42,57,231.
  - 390. 195600:127.
  - **391.** 205550:57, 88, 95-96, 120, 144, 154, 186, 217, 222-223, 226, 239, 242, 256, 258, 343.
  - 392. 220210:182.
  - 393. 263600:229-230.
  - 394. 215170:372.
  - 395. 290400:102.
  - 396. 280050:I:99.
  - 397. 412295:106-107; 412300:73; 412302:85; 412500:J:222-223.
  - 398. 471005:113,161.
  - 399. 471007:137-139,163,175.

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- 400. 471009:23.
- 401. 471009:273.
- 402. 471010:249.
- 403. 471015:27.
- 404. 471017:95.
- 405. 471022:237; 471024:137.
- 406. 471027:271.

- 407. 471041:21.
- 408. 471049:69.
- 409. 076565:73.
- 410. 084000:445.
- 411. 471056:169.
- 412. 471056:189.
- 413. 336170:IX:98.
- 414. 208050:37; 336170:IX:104.
- 415. 471059:175.
- 416. 196748:I:74.
- 417. 471061:131.
- 418. 196748:I:196,205,229-230,241,245,304; II:533.
- 419. **196748:I:157**.
- 420. 336170:IX:241.
- 421. 268550:II:167.
- 422. 336170:IX:220.
- 423. 471063:259.
- 424. 258600:I:140.
- 425. 377020:65.
- 426. 258600:I:168-169.
- 427. 258600:I:174.
- 428. 258600:I:176.
- 429. 258600:I:207.
- 430. 258600:I:377.
- 431. 336170:IX:479.
- 432. 022000:II:19.
- 433. 022000:II:76-78,100; 512970:27.

- 434. 336170:IX:706-707.
- 435. 336170:IV:890.
- 436. 471065:209.
- 437. 245400:258.
- 438. 471066:159.
- 439. 336170:IX:887.
- 440. 471067:59.
- 441. 312020:53; 324450:10.
- 442. 336170:V:709.
- 443. 058010:135-139,144-145.
- 444. 058010:146-147.
- 445. 058010:146-147,177-178.
- 446. 471068:269.
- 447. 058010:290-291.
- 448. 058010:305,359.
- 449. 058010:318-319; 419000:17.
- 450. 454500:605.
- 451. 336170:IX:1084.
- 452. 336170:IX:1089.
- 453. 028800:136-137.
- 454. 284600:I:154,180; 441220:44,75; 454940:3.
- 455. 336170:X:558.
- 456. 336170:X:558.



## Notes For Chapter Six

- 1. The perishable nature of tobacco makes it exceedingly difficult to recover the leaf archaeologically. An exceptional example is Walter Kenyon's Quetico-Superior Underwater Research Project on the "voyageurs' highway," where a fragment of twist tobacco was recovered among a bundle of trade goods, which had spilled into the river sometime between 1801 and 1821 (235100:152).
- 2. see Chapter Two, page 27.
- 3. see Chapter Two, pages 30-32.
- 4. 005310:11; 010620:4; 109000:16; 122200:9,28; 170750:32; 247700:33; 267500:130; 280500:15; 368450:146-147; 370000:190; 417340:25; 417350:8; 421000:279-280,288-289; 485900:66; 528200:24,36,49; 528250:II:24. Some writers locate the prototype for European pipes in the West Indies (e.g., 005310:10-11; 215110:350). Others believe Europeans developed the elbow pipe on their own, after having seen straight tubes in America (e.g., 016500:112; 308000:458,503). The more outrageous arguments have been detailed in Chapters Eight and Nine.
- 5. see Chapter Two, pages 34-35.
- 6. 405870:150; 421000:287,293,295.
- 7. Our Plate is based on 050650:I:130 (see also Chapter Two, page 27).
- 8. 050650:I:298; see also Chapter Two, page 35.
- 9. 050650:I:298; see also 005990:13-14; 010620:4; 086300:45,132; 122200:26; 267500:33; 335000:296; 503230:244. For some unexplained reason, Carl Ehwa attributes this passage to Walter Raleigh (109000:16).
- 10. Among the gentry, the walnut-and-straw pipe was deemed less suitable than silver versions (050650:I:50,332; 179450:7; 199500:147; 219450:87; 267500:35; 291500:90; 368450:58,60,146-147; 422030:168n; 503230:244-245; 528200:25).
- 11. see Chapter Two, pages 36-37.
- 12. see 119320:278, fig.7; 212300:II: plate 40.
- 13. Our Plate is based on 005010:79 (also reproduced in 086200:66; 185800: plate xvi; 212300:II: plate 130). The plate is discussed in 050650:I:314n; 212300:I:100;

371480:10; 377480:430n; 421000:289; 503230:245. Some authors illustrate only the pipe (e.g., 103000:211), while others show only the tobacco bag lying beside it (e.g., 474200:5,fig.1). An entirely new engraving published by Beverley (018685; reproduced in 355170:61) has the pipe and other objects arranged differently on the mat.

- 14. Our Plate is based on 205800; plate cxlii (also reproduced in 018520:115). Other archaeological specimens have also been compared with the sixteenth-century engraving (e.g., 119320:278, fig. 9 cf. 212300:1:101; 377480:345n-346n).
- 15. see 005310:11; 050650:I:47n; 247700:34; 315700:668; 371900:238; 377810:164; 377814:268n; 421000:293; 503000:19; 503230:245; 503240:2. While Raleigh was never at Roanoke, bizzare stories, such as the one related by Apperson, persist:

In November 1911 a curiously shaped pipe was put up for sale in Mr. J.C. Steven's Auction Room, Covent Garden, which was described as that which Raleigh smoked "on the scaffold." ... The pipe was of wood pieces of strange construction in four shape, rudely carved with dogs' heads and faces of Red Indians. According to legend it had been presented to Raleigh by the The Indians. auctioneer, Mr. Stevens, remarked that unfortunately a parchment document about the pipe was lost some years ago, and declared "If we could only produce the parchment the pipe would fetch L500." In the end, however, it was knocked down at seventy five guineas. (005990:22-23)

Brooks illustrates what was alleged to have been Raleigh's set of pipes, pouch and stopper (050650:III:271).

- 16. 081763. The text was translated into English in 1659 and is reproduced in 050650:I:417-418; 377480:345n-346n (see also 103000:211; 267500:34; 421000:288).
- 17. 503000:19; 503230:32; 503240:2.
- 18. Peter Takel of Barnstaple (see 503230:245).
- 19. 010620:13; 050650:II:66-68; 189000:144; 308000:447,451; 405850:265; 405870:151; 417340:17; 503230:245-248,452. Other general information on the early English clay pipe industry may be found in 119000:160-203; 185400; 368450:146-147; 375633:15-18; 512960:75-76.
- 20. 377814:268n; see also Chapter Three.

21. see Chapter Three.

- 22. see Chapter Three.
- 23. Cotten appears on a list of colonists published by Smith in 1612 (011550:II:399; 377600:V:319; 441240:I:108; II:412; 489200:141; see also Chapter Three, note 180). In 1631 Smith again mentioned that tobacco-pipe-makers had been sent to Virginia (280050:II:752; 441240:II:928). These important references have been generally ignored by most scholars interested in the history of Euro-American pipes.
- 24. 457360:39. Later observers also commented on the suitability of American clays for pipe manufacture (e.g., 078465:43; 267875:88; 336160:IV:117; 460482:6; 489950:162).
- 25. 223735:17; 334900:7. American pipe-makers never achieved the prominence of their European counterparts, though a limited industry was developed (078465:44; 232770:12; 223800:67-71; 223830:76-78; 460470).
- 26. Quoted in 460470:203; see also 232400:149.
- 27. 304900:74; 460470:204,239.
- 28. 304900:74; 334900:8; 335000:307-308.
- 29. 312980:30. It should be added, however, that the combined number of Eurocolonial and Amerindian examples represented less than ten per cent of the total sample; the rest were white clay pipes imported from England (312980:4,10).
- 30. e.g., 002400:5.
- 31. see Chapter Four.
- 32. see Chapter Five.
- 33. 002000:316; e.q., 010580:315-316; 016150:204; 076770:157-158; 022000:I:326; 118800;62-69; 188750:180; 201000:116; 218800:106,129; 220100:266; 229500:150,274; 231080:256; 241600:16; 284600:I:130; 303700:II:16,22; 306800:261; 308000:567; 316100:316; 324100:I:196; 336170:VII:780-781,783; VIII:42; 355300:117-118; 441220:16; 488200:61; 512970:30,33.
- 34. e.g., 220100:III:266.
- 35. 010580:315-316.
- 36. see pages 298ff.
- 37. 254407:306.
- 38. An example is the Micmac pipe presented to the Prince of Wales (later Edward VII) in 1860 (241600:16).

- 39. 118800; 201000; 229500:274; 512970:33.
- 40. 324200.
- 41. Our Plate is based on 050650:II:90.
- 42. 086500:V:223.
- 43. 059200:38; 086500:VII:320.
- 44. 086500:VIII:388.
- 45. 371865:254.
- 46. 220100:II:109-110.
- 47. 241600:16; 306800:261; 525410:492; 543500:45.
- 48. 068880:1008; 420400:72-73.
- 49. 241600:16; 488200:61.
- 50. 421500:73-75; 488500:249, 252; 560000:28; 560100:1.
- 51. 241600:30-31; 421500:73-75; 488500:252; 560000:31,35,37; 560100:1,2; 560300:42; 560400:77-78. In the north, the Russians appear to have introduced, or at least popularised, tobacco smoking among the Western Eskimo (see 241600:31 cf. 454467:51-52,54).
- 52. 560000:37,108; 560100:1-2; 560300:42,45.
- 53. 241600:28; 421500:75,152; 560300. More than one fourth of Robin Wright's research sample of 600 argillite pipes were skeuomorphs of European clay versions (560300:43). Sheehan argues that the Haida argillite pipe tradition did not necessarily originate in efforts to copy European smoking devices (421500:75). For a discussion of pipe skeuomorphs in other regions of North America see 488200:61; 500630:37.
- 54. 241600:28; 421500:67-80; 560000; 560100; 560300; see also 000615:323-326; 188640:56-57; 223750:15; 308000:584-586; 464000:339-341; 513000:305.
- 55. 421500:67,79; 560100:1.
- 560000:8,10,108. It has been conjectured that this industry was partially prompted by a decline in the sea 56. otter fur trade (241600:28; 560000:37,42,108). Interestingly, many of the most elaborate pipes could not smoking (089440:fig.111; 421500:73; used for be Sheehan speculates that this carving 488500:252). tradition had something to do with Haida notions of nonsense and interpretations of White behavior

(421500:73-75,79). It may be useful to compare and contrast the Haida case with the situation further north, where native peoples also produced pipes for the European trade despite having only been introduced to the habit in the Historic period (see 205550:57; 241600:31; 454467:44,51,54).

- 57. 560000:47.
- 58. 560000:54-55. In 1922 the bundle was opened and the pipe revealed to William Wildschut, who photographed the specimen.
- 59. 241600:30-31.
- 60. see Chapter Three and 377814:97, 108-111, 122n, 150n.
- 61. e.g., 081710:299-300; 220230:48-49; 292300:265.
- 62. 027000:83.
- 63. 015770:56; 411000:19; see also 000615:333.
- 64. 023700.
- **65.** 005070:110-111; 412930:6.
- 66. 046800:86.
- 67. 046550:372-373; 375100:30; 411000:19. It is perhaps of some interest that in the same year (1602) that copper pipe stems were noted among the Indians of New England, an expedition under Samuel Mace landed somewhere between Cape Fear and Roanoke Island and traded substantial quantities of sheet copper to the natives (see 377490:272-275; 377500:432; 377600:V:162-163). It is, however, improbable that this material would have worked its way north to New England so quickly; earlier opportunities must have existed.
- 68. 046560:32.
- 69. 479565:28.
- 70. 029195:327.
- 71. 479560:154.
- 72. 377950:185,204.
- 73. Brasser points out that "although most of this copper and brass is identifiable as having been of European origin, the variety of uses, the ingenuity of manufacturing techniques and several Indian statements forcibly suggest

an aboriginal acquaintance with native copper" (046800:86 cf 010500:224).

- 74. 046560:35,37.
- 75. 046800:86; 086770:57; 469000:10.
- 76. 377600:III:491; see also Chapter Three.
- 77. .084740.
- 78. 322900:16-17. A different translation is given in 084750:251-252. McGuire provides a garbled summary and says the colony was Swedish rather than Dutch (308000:641).
- 79. 296850:379-380; 402000:7,50,88. Ritchie alludes to other occurrences of brass pipe bowl liners on Seneca sites (402000:50). Archaeological evidence of wooden pipes is virtually confined to cases where the presence of copper has helped preservation. It is probable that wooden smoking devices were quite common during this period. 150 years later, the Iroquois are said to have received wooden pipes from Europeans (see 510100:43n).
- 80. 172000:13,15; 203000:17; see also 208400:437,456; 258620:71.
- 81. 046550:237.
- 82. 046550:256-257,274. Beauchamp speaks of an Onondaga deer-antler pipe, which had a bowl lined with metal (013500:328).
- 83. 375100:133-134,141-142,225,276.
- 84. 208400:415; 484050:187.
- 85. 232765:57.
- 86. 185000:25.
- 87. See 235200:106 and 278000:328 for archaeological examples from the Neutrals, 267200:483-484 for the Huron, and 232400:153,182-184 for similar occurrences among the Susquehannocks.
- 88. 159850:53,183; see also pages 281ff.
- 89. 118570:12; 223750:15; 241600:30; 336300:220.
- 90. 005610:240; 205550:184; 513000:285; 560400.
- 91. 159850:87.

Notes For Chapter Six

- 92. 002000:7; 159850:93.
- 93. 081705.
- 94. 081710:312; see also 220230:57.
- 95. 046550:26.
- 96. 544200.
- 97. 544250:65; see also 050650:II:411; 486000:76; 487000:3-4.
- 98. 486000:75-76; 487000:2-4; see also 441720:79.
- **99.** 486000:76; 487000:3-4.
- 100. see Chapter Nine.
- 101. 414500:65; 488200:57; 513000:337; 518300:5. Occasionally, pipe-drilling tools were manufactured by natives from European scrap metal (118570:11).
- 102. e.g., 046550:254; 249000:52; 377020:146.
- 103. see pages 269ff.
- 1C1. 013500:328; 013800:38-39; 015200:109; 015545:344; 089440:fig.240; 110800:151; 185000:47; 357520:145-146; 369500:242; 513000:351-352.
- 105. see Chapter Nine.
- 106. see pages 303ff.
- 107. 018520:130; 296850:404; 304000:25-26; 447500:284; see also 118500:58.
- 108. 447500:284.
- 109. 336100:196.
- 110. 005050:234; 322300:20; 488200:57-58.
- 111. 322300:21.
- 112. 018520:113; 030440:27; 118570:15; 240500:153-155; 280500:16,18; 308000:633; 322300:21; 336100:200; 368400:329,331; 488200:57-58; 513000:327-328.
- 113. see pages 268-270 above.
- 114. Witthoft, Schoff and Wray express certainty that the stone Micmac pipe provided the original model for the tomahawk version (543600:94-95). A definitive study of American

Indian tomahawks was made by Peterson (371000). Other sources discussing and/or illustrating these fascinating symbols of culture contact include: 005250; 010958:107; 011050:113-115; 030140:49-50; 050650:I:21; 030270:31; 103000:64; 109000:31; 118570:8; 159850:17,63,101; 179450:20; 185250:57; 195600:62; 198000:30; 206500:118; 241600:24; 247700:fig.IV; 229500:280; 280453:65; 308000:464-467; 324020:plate; 2; 371480:5; 377020:71,146; 280500:21-22; 292975:564; 336170:VIII:641; 339610:92; 381210:159; 382600:8; 405500:75; 405700:5; 441720:74; 447000:40; 454700:II:275; 488200:61; 500850:12; 511500:29; 513000:317-322,325,387; 512960:53-69; 525400:77-78; 526000:16; 543600:94-95; 555100:111; 556120:111.

- 115. 030270:31.
- 116. 441720:74.
- 117. 011050:113-115; 159850:17; 241600:24; 280500:21-22; 308000:464-467; 371000:33; 371480:5; 377020:71; 381210:159; 512960:56; 513000:317-318,320,322; 543600:94-95.
- 118. Robert Hall believes the symbolic oppositions between peace and war (characteristic of calumet ceremonialism) have deep prehistoric origins which may be archaeologically recoverable (see 184000; 184500).
- 119. 118570:8.
- 120. 159850:101; 371000:39,103; 512960:55,57; 513000:319,387.
- 121. 543600:94-95.
- 122. 371000:34; see also 195600:62; 206500:118. Our plate is based on 206500:118.
- 123. 371000:34; 512960:56. Remarkably, some Amerindians even copied the metal tomahawk pipe in stone (488200:61; 513000:325).
- 124. 241600:27.
- 125. 512960:69-75; 513000:325-326; see also 254100:31-36. Metal pipes were not unknown in London early in the seventeenth century (050650:III:461n), and they occasionally occur on colonial sites in America (335000:308; 381210:173; 503230:980-981). It has been claimed that lead pipes were cast in Illinois by French Canadians (512960:69), and that iron ones were manufactured in Massachusetts in the eighteenth century (050650:III:461n).
- 126. e.g., 030140:49; 030155:67.

127. 227000:93-94.

- 128. 502900:114; 503230:981.
- 129. 471028:167. The date matches so closely to the Saint-Marie cemetery, that one is led to wonder whether this is not one of those rare instances where the same artifact described in a documentary source is independently recovered in the archaeological record. There are also historic sources suggesting that the English gave silver pipes to Oneida and Mohawk chiefs in the eighteenth and nineteenth centuries (206200:117; 512960:70).
- 130. e.g., 203000:9,16; 208400:416,457; 503230:981; 546500:16.
- 131. e.g., 046550:38,288-289.
- 132. 258627:79-80; 308000:463; 369000; 369500:245-246; 371480:14; 507000:7; see also 375100:130; 159850:102. Pewter pipes are also found by the dozens on Susquehannock sites (e.g., 232400:287,389,405).
- 133. e.g., 046550:288-289; 232400:287,fig.86; 503230:981; 546500:16.
- 134. e.g., 000615:333; 521900:81-82; 086770:59.
- 135. e.g., 251000:76,81; 371480:14.
- 136. 441270:53.
- 137. 525000:45; 525010:127; see also 015800:13-14; 369000:22.
- 138. Very general references on the English clay pipe industry include 005460; 005550; 010450; 010620. The important Bristol industry has been carefully studied by Walker (503230). The most important serial contributions are the BAR International Series on the Archaeology of the Clay Tobacco Pipe edited by Peter Davey.
- 139. By the nineteenth century, a work crew of forty people could produce as many as 17,500 pipes per day (460482:13-14). At the end of the century, one Dutch firm reached an annual production rate of about six million pipes (102100:88).
- 140. 005440:267; 050650:III:462n; 502900:119.
- 141. 335000:296; 417340:24.
- 142. see pages 259ff.
- 143. 050600:31; 503000:30; 503230:264; 503240:28.
- 144. 050600:33; 102080; 102100; 460604; 503000:30; 503240:28.

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- 145. 503000:30; 503230:66b-669; 503240:28.
- 146. 502900:117; 503000:30; 503200:242; 503230:285-286; 503240:28.
- 147. 102101; 197100:14; 33700:23; 502900:117; 503200:242; 503230:285-286.
- 148. 005133; 011050:115; 441280:9; 441281:24; 460482:4; 503000:25; 503240.
- 149. e.g., 000700; 004000:8, 23, 27; 005002; 010020:104; 021350:97-98, 110-111; 051000:51, 60-66, 70; 075495:53,55; 076730; 077000:269, 286; 082000:97-100; 082500:16,18; 118570:14-15; 122000:12, 15; 122800:167; 127000:221; 148000:19; 151000:5-7; 153600:229, 231-234, 252, 255; 159850:45; 185870:340, fig.191; 189000:155; 196765; 199000:14, 16, 24-25; 207000:34; 210000:23-24, 30, 35-36, 38; 232770:11-12, 16; 233000; 240500:151-153, 155, 157, 201-204, 208, 211, 213, 216, 229; 247000:13; 265000:17; 276000:9; 277000:29; 277010:98, 275000:50; 100; 284000:26-27; 295000:68-69; 296000:136-137; 296800:60,74; 322000; 322010; 322011; 334900; 321000; 335010:172; 336300:220-221; 336490; 336500; 368200:64; 370000; 371310; 371315; 371320; 371350; 371830; 371860:71, 73-74, 78-85, 90-93; 377020:77; 377900:25; 386200; 386220; 397500; 409000:44-45; 413000:31, 35-37; 417270; 438100; 441283; 453000:32; 460483; 460500; 460602; 460603; 496000; 502900; 503240; 510600:90-91; 528000:21-22; see also bibliographies in 335010:354-356; 489450:175-192; 503000:19; 503230.
- 150. see 046550:40; 046600:109; 005003; 335000:296; 371200:1-2; 377020:78; 385000. Elaborate cataloguing and measuring procedures have been designed (e.g., 385000). Even the physio-chemical and mechanical alterations in pipes (use-wear) have been studied (e.g., 441282).
- 151. 371200:1-2; see also 005005; 005440:267; 010620:6; 073000:97; 076730:52; 355040:47.
- 152. European white clay pipes occur on a great number of Historic period Amerindian sites after 1610. The following is a representative sample of archaeological sources describing the occurrence of these popular artifacts on sites throughout North America. 02600:28; 046550:249, 266, 291; 046765:59; 053000:14, 48, 159; 063300:321; 063357; 069600:120-121; 071000:180, 200 - 201;068400:147; 076520:16-18; 086900:61; 105000:45; 118000:29-30; 120645:8; 120650:10-12; 129000:203-204, 269; 144500; 151500:32; 159500; 174100:642; 184995:105; 186000:126-127, 132-133; 187100:247, 274; 193000:21-32, 56, 82; 198000:30-32; 205000:79-81; 208000:196, 198-199; 208400:439, 457-458; 232400: 91, 98, 99, 101-102, 266-273, 316, 340-341, 344, 379, 389, 398, 401, 405, 406; 232768:22; 232800:28, 30,

36-39; 232820:83-86; 240500:155; 244000:34; 245000:227; 249000:52; 250000:78, 80, 153, 155; 239, 263600:234, 248; 266000:20; 267200:225; 278050:11, 22; 241-242, 6, 13-14; 291000:162; 283000:1, 284200:98; 290320:34; **292700:58**; **292900:159-160**; **294000:144**; **296850:390**, **404**; 305000; 305050; 305060; 306000; 308000:447, 449, 454, 461, 329000:50, 62; 334050:106; 336492; 337000:24; 629; 355350:56; 368015:25; 368485:60, 62, 64; 369600:59, 62; 371310:39; 371480:6; 375100:133, 135-136, 142, 226, 284; 375350:23, 68; 376000:151; 377020:68, 77-78; 123, 156; 396050:129; 377950:432-436; 400000:31; 404500:73: 405000:34, 162, 301; 417300:47; 426000:29; 428000:231; 453950:81; 457500:41, 44; 463000:18; 469000:7; 469164:146; 484050:179, 184, 188, 191; 500860:13; 502900:80; 1750-1763; 503240:17-20; 503230:655ff, 508000:56; 509000:27; 510000:27; 512000:104, 105, 107; 512960:76; 543700:39-40; 551000:57, 58, 513000:326-327; 94-95; 555000:12, 22, 23. Sources dealing specifically with Iroquoian sites are more fully detailed below. On some Amerindian sites European white clay pipe fragments have been recovered which appear to have been modified to serve as beads (see 053800:153; 081778:12; 209950; 240500:155; 355350:56). pipes were 267200:166; European also serve as effigies and pendants redecorated to (see 005000:29; 237500:215-216; 371200:130-131).

- 153. 305060:67; 375100:142. For occurrences on later Seneca sites see 184995:105; 193000:31-32; 208400:457.
- 154. see pages 270ff.
- 155. 305050; 305060:66; 375100:133,135-136,142,226,284.
- 156. 305060:66.
- 157. 046550:249; 046600:123; 305060:66. For occurrences on later Onondaga sites see 046550:266, 291, 409, 411-414; 046600:passim; 484050:179, 184, 188, 191.
- 158. 305060:64. For other occurrences on later Mohawk sites see 174100:642. For occurrences on Susquehannock sites see 232400:266-273, 316, 340-341, 344, 377, 379, 389, 398, 401, 405-406; 396050:129.
- 159. 305060:67.
- 160. 046550:409; 046600:111, 113, 131; 305060; 306000:3; 503230:670.
- 161. 046550:409; 046600:111, 113, 131; 305060:67, 69.
- 162. 305000:8; 305060:64; 306000:15.
- 163. 475200:63-64.

- 164. 174100:90; 220230:169; 312100:150; see also 046550:352; 503412:44.
- 165. 305060:67.
- 166. 305060:68.
- 167. see Chapter Five.
- 168. 011050:111; 050650:I:50n; II:68; 179450:13; 247700:31; 280500:21; 421000:279. Such deals appear to have been common, for the Iroquois are known to have complained to the English that they had been deprived of land without getting "so much as a single pipe" (see 007000:185; 188900:267-268; 241500:65; 336170:VIII:623-629; 454700:I: Appendix: xxii, xxviii).
- 169. 005990:79-80; 076500:162-163; 185250:207; 195600:63; 247700:59; 267500:37; 308000:461; 336170:XIII;506; 381210:159; 417340:28.
- 170. 005990:79-80; 076500:163-164; 195600:63; 208400:449; 241600:14; 247700:59; 267500:37; 308000:461; 371480:2; 381210:159; 513000:234. Other cases include a Dutch land purchase in 1639, which included payment of 130 clay pipes (475200:63-64), and an exchange of Delaware land for 400 pipes and assorted goods in 1732 (232400:390); see also 308000:561.
- 171. 147000:57-58; 232500:16; 305000:5; 475200:223.
- 172. see Chapter Five.
- 173. 079350:105, 107; 384250:1xvi, 108; 384260:I:223; II:98, 194, 233, 293-294, 297-298, 307-309; 384300:281. The HBC appears to have had access to imported pipes from many different countries (see 371200:72; 371340:161).
- 174. e.g., 215400:xxxiv; see also 079350:282; 526000:16.
- 175. 079350:282; see also 079350:135, 268-269; 384310:I:534.
- 176. 005667:21; 120650:10-12; 232800:36-39; 232820:86.
- 177. e.g., 076500:163-164; 079350:212-213, 380, 384; 201050:366; 232400:390; 241600:14; 308000:461; 328000:206; 371480:2; 377020:66-67; 381830:92, 131, table 16, 262, table 24; 384260:I:317; II:98, 308; 475200:63-64; 513000:234; 524700:274, 279, 304.
- 178. e.g., 046550:30; 232400:101, 206-207, 398; 240500:126; 375100:129, 134, 232, 282.

179. 232400:206-207.

- 180. 375100:134, 232. A concise discussion of early Dutch tobacco boxes may be found in 050600:49-68; Europeans also gave native peoples tobacco pouches (e.g., 291455:453; 336170:X:558), although some of these may have originated among Amerindians in the first place (471024:41, 89). Tobacco markers and metal tags are occasionally found on native archaeological sites (179430:270; 441284:82).
- 181. e.g., 073700:II:80-81, 103; 079350:140, 278-280; 118420:385, 401; 208400:449; 232400:390; 267875:39; 328000:206; 336170:IV:981; 377020:66; 381830:92, 262, table 24, 269, table 28; 524700:272.
- 182. 079350:279-280. Tobacco stoppers and tampers were also occasionally traded (e.g., 384310:I:538), though they were likely of limited use to native peoples. An excellent example of a brass pipe tamper was recovered at the early seventeenth-century archaeological site at Flowerdew Hundred, Virginia; the specimen was depicted in a promotional flyer for a 1987 conference on culture contact held at the National Museum of American History.
- 183. 291455:437; see also Chapter Seven, note 178.
- 184. 028800:158-159.
- 185. 058000:335; 279000:III:194, 216, 420; 377020:155, fig. 31; 412295:126; 412300:87; 412302:98-99; 471012:117.
- 186. 292975:572-573,576.
- 187. In addition to the references cited for Table 6.2, and accompanying our discussion in Chapter Six, the following sources are a representative sample of articles and books containing information on calumets, pipestone, catlinite, sacred pipes, etc.: 005250; 005310:10; 005470:249; 009300:96; 010600:18-21; 013500:328-329; 016000:237, 246; 016100:431-433; 016500:17-18, 110-111, 125, 129-136; 022000:I:161n, 182-187, 311, 313, 326-330, 345, 350, 359-361; II:31, 34, 72-73, 91, 96, 99-101, 106, 126-127, 131; 023000; 028800:31, 39-40, 42, 66, 115, 130-131, 136-137, 141, 143, 152, 158-159, 189, 197, 206; 029000:83; 046505:106-108; 050650:1:24-26; IV:265-266; 050700:22; 054000; 059630:19, 26, 30-31, 41, 49, 65; 064240:99, 101, 268-269, 296, 358-361; 064900:passim; 068550:I:304-307; II:63, 66, 254-255; 068700; 068880:284, 312, 581, 585, 914-915, 979, 1004, 1008-1011, 1018-1019, 1136-1137; 130-131; 073700:I:63n-64n, II:26-27; 076500:163; 076560:II:185; 084140:171, 197, 202, 207-208, 306-307, 351, 393; 084142:236, 339-340, 343, 364, 377, 386, 389; 084700:220; 086300:123; 086500:II:59; 100000:100n, 554; 101510:93; 101700:passim; 102210:II:647-648; 103000:54-67; 103200:4-5, 58-59; 109000:25, 28; 118500; 118700; 119000:31-32, 40-42; 119140:I:168-169; 119720:194, 244;

119800:passim; 120100:135; 120130:134; 131700; 131800; 131805; 131807; 131815:49; 159700:68, 162; 152950:22; 170750:33, 38-46; 175200:II:321-322; 179450:29-31; 179830; 184000:504; 184500; 185250:xv-xvi, 56-57; 185860:1, 51, 77; 188640:55-56; 402; 194695:109, 395, 194800:29; 195600:16-17, 29, 122; 196748:I:82-83, 119, 124-127, 131, 133, 156, 179-180, 190-192, 194, 196, 202, 205, 213, 214, 228-230, 232, 234-236, 239, 246, 252, 255-256, 303, 326, 338-340; II:393, 406, 408, 412, 434-435, 437, 442, 519, 520, 547, 565, 622, 630-631, 633, 634, 647-650. 653-656, 661-663, 665; 196753:305; 197100:6,32; 199500:6-8, 41, 195; 200330; 205120:134-135; 212018:86; 213000:18; 215400:82-86, 218800:24-25; 218810:24-25, 106, 128; 108 - 109;220100:II:102-105; 221600:85; 221620:121-122; 222200:334, 231080:75n, 130-131, 239-241, 244-247, 337; 288; 232400:167-168; 232500:13; 241450:8; 241800:176, 190-194, 346, 378, 404; 247560:4; 247700:32, 40-41, 71-72, fig.iv; 254490:143; 254500:275; 258000:II:175-183, 185, Plate xv; 258500; 258600:I:58, 75-76, 189, 402; II:423-424, 508-509; 258700:258-259; 268550:II:143, 240, 265-266; 272500:54; 280000; 280760:71, 83; 291455:104-108; 303700:I:322-323; II:108; 306800:261; 308000:546-584; 312020:5, 24, 28, 61, 150, 159, 194, 206, 218, 234, 239; 316600:305n; 328000:82; 336170:V:694-696; IX:644; 350000:249; 355300:97, 111-112, 138-139; 357050:389-391; 357060:109, 678; 368450:11-12, 375300:105; 377820:49; 381210:151, 141 - 146;159; 405500:3; 382600:6-8; 408100:223-225; 408425:274-275; 417340:40-41; 417350:7; 409740:75; 411000:22; 422380:117, 419000:passim; 422200:passim; 185: 454455:171-174, 179-180; 450000:passim; 454470:16, 21; 471054:191-193; 471051:47; 454700:II:446; 460993:67; 471065:123-125; 471059:117, 129-137; 471060:203; 488000:passim; 471068:159-161, 479560:216; 195; 505250:48; 488200:passim; 489250:I:210; 504500:13; 511500:20, 24, 512300:31; 512965; 512970:24; 95-96; 513000:231-277; 524700:205; 525400:64-65; 528200:1-6, 542000:37-38, 44-48, 179; 542005:59, 65-68, 188; 45-46; 543500:60; 543600:passim; 546200:70, 73, 113, 144-145, 223; This list 548000:187; 560400:78; 560980:54; 561150:496. does not include a large body of ethnographic reports on in the Amerindian contained calumet cerenonialism A good introduction Pipe/Tobacco/Smoking Project Library. to the early literature on the calumet is Springer's brief survey of ethnohistoric accounts (see 450000:222-227).

188. 500630:36-37.

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189. 354000:II:43.

- 190. 210500:II:176; 354000:II:43; see also 100000:554; 205120:134n; 194695:395, 402; 258600:I:402; 489250:I:210.
- 191. 212800:41; 254040:374; 267850:351; 411500:111.

- 192. 018050; see 086300:123; 086500:II:59.
- 193. 489250:I:210. Compare this with Las Casas' description of a West Indian snuffer as "made in the size of a small flute, all hollow as is a flute" (503571:103; 503600:236).
- 194. 279000:356,439.
- 195. 412295:125, 147, 199; 412300:86, 102, 139. Since both Lescarbot and Sagard also use "petunoir" and "pippe," it is possible that a distinction was being made between short clay pipes, and stone pipe bowls with long wood or cane stems. Sagard spoke specifically of "pippes ou petunoirs de terre rompus" (412295:271; 412300:189).
- 196. e.g., 471007:136; 471010:218; 471015:26; 471024:136, 280; 471026:42, 156, 160, 162; 471027:268, 284, 300; 471028:166, 294, 298; 471040:135, 203. Unfortunately, English translations often change the original calumet to "pipe," thereby masking the frequency with which the term was used. That the Norman corruption of chalumeau became the popular usage may be related to the fact that the majority of settlers in New France before 1670 came from Normandy (see 187425: plate 45).
- 197. 450000:222. In contrast to Springer's remarks, Hall emphasizes that the calumet was only the long, ornate, feathered stem and that this has a separate history from the pipe bowl (184000:503; 184500:1).
- 198. 471051:46,48.
- 199. 471059:119, 129-137.
- 200. 471059:117. Kinietz points out that, while many writers used the term "calumet" to describe pipes employed in matters of state, war, alliance and foreign affairs, Charlevoix used it to describe the implements smoked in the councils of a tribe (241800:192). It is clear that the French did not have a particular ritual object in mind.
- 201. 450000:225.
- 202. 119800:156-157, 194-195; 258000:II:185n; 308000:553-554; 411000:22; 512970:24.
- 203. 184000:505.
- 204. 118800:62; 231080:332.
- 205. 450000:224. Mackenzie noticed that the ceremonial pipe used among the "Kinsteneaux" (Cree) contained a piece of "Brazil" tobacco which had come from a medicine bundle (308000:566). Such cases suggest that native peoples did

not use European tobaccos merely for day-to-day or "secular" smoking, but integrated them into existing ritual complexes.

- 206. 022000:II:34, 114; 073700:I:67-68; 076560:I:118-119; 119800:156; 188900:229; 231080:301; 245400:228; 258600:I:77-84; 268550:II:141-142; 471027:271; 513000:242.
- 207. 231080:253; 268550:II:180-181; 471059:147, 151. Our plate is based on the original in the McGill University Rare Book Library (also illustrated in 500630:34).
- 208. 046500:58; 064240:61, 281; 119800:169; 308000:562; 336170:VII: 327-328, 854-863; VIII:620-623; 454700:I:Appendix:xxii.
- 209. 064240:81, 418-419.

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- 210. 013500:329; 119800:168; 196770:121; 308000:561-562; 336170:VII:63-67; 411000:22; 512970:25; 513000:241-242. Our plate is based on 195600:120. Jennings et. al. note that, among the figures of speech in Iroquois political rhetoric, to smoke on one's mat was to be profoundly at peace, while to smoke from the same calumet with a nation was to be in perfect union with it (221620:121-122). Giving a pipe was undoubtedly the non-verbal expression of the same sentiments.
- 211. see pages 278ff.
- 212. 119800:157, 194-195; 258000:II:185n.
- 213. There is, of course, no reason to reject Fenton's principal argument that the Iroquois Eagle Dance is historically related to the Calumet Dance (119800; 120100:135; 120130:134).
- 214. 488000; 488200:61-62.
- 215. 450000:225-226.
- 216. 023000:760; see also 184500; 500630:36.
- 217. 184000:504-505; 184500.
- 218. Hafner's work is in the form of a doctoral dissertation; a summary may be found in the 1960, Vienna International Congress of Americanists (see 179830).
- 219. 013500:328-329; 016100:431-433; 119720:194, 244; 119800:156; 120100:135; 542000:45-46; 542005:66-67; see also 101510:93.

220. 500630.

- 221. 543600:91-92.
- 222. 543600:91; see also 232400:167-169.
- 223. 119800:155 cf. 308000:571.
- 224. 500630.
- 225. see Chapter Two.
- 226. 005990:26; 291400:48.
- 227. 219450:116.
- 228. 475200:350.
- 229. 525400:58-61,65; see also 450000:228; 470500:178.
- 230. 312020:24. Our plate is based on 050650:I:26.
- 231. 002400:5; 005780:3; 030150:25; 030210:51-54; 153115:37; 196000:121,130; 205300:173; 334000:87; 414500:64,69; 484050:183; 485900:65-66; 486000:78; 487000:4; 488000:689; 488200:61; 543800:4 cf. 355234:86-87.
- 232. 046550:157, 166, 293-294, 327-328, 351, ·411-414; 375100:15, 046600:123-129; 105, 148-149; 402000:48; 485900:65-66; 486000:78; 487000:4; 488000:686. While some authors leave the impression that this pattern was common to all Iroquoian sequences, there are regional differences. Kent describes smoking among the Susquehannocks "popular" by 1600 and "widespread" by 1645 (232400:155). as
- 233. 046550:157,166,327-328.
- 234. 402000:48; see also 002400:5.
- 235. 375100:15,105,148; see also 002400:5.
- 236. 485900:59-60; 486000:78.
- 237. 485900:67; 487000:6. Anthony Sassi has also argued that the introduction of white clay pipes into Iroquois territory led to a "secularization" of smoking (414500:68-69).
- 238. 485900:67.
- 239. 485900:68.
- 240. 487000:6.
- 241. 485900:68; 487000:1,6; 488000:685.

- 242. 487000:2.
- 243. 487000:6.
- 244. see note 205 and 050650:III:295; 068550:II:116; 118570:14. It should be pointed out, however, that some groups continued to plant their own ceremonial tobaccos.
- 245. Ironically, Anthony Wallace, who introduced the idea of revitalization movements to Iroquois studies, noted that an Iroquois man equipped with a European clay pipe "felt himself in no wise contaminated nor less an Indian than his stone-equipped great-great-grandfather" (503380:25).
- 246. 185000.
- 247. 312869.
- 248. 312869:159.
- 249. 312869:159-165.
- 250. 312869:161-162.
- 251. 267200:139-140,259-260; 267222:164.
- 252. 267200:265,268,273.
- 253. 300000:304.
- 254. 300000:304.
- 255. 297000:29; 298000:189-190; 302000:19. Adams has also adopted the "constant state of stress" model, but admits that this is a "grey area of interpretation" (002400:5).

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- 256. Since tobacco was used in every conceivable context in native life, it would come as no surprise that it was also associated with curing. Unfortunately, Mathews' evidence for such an association comes from a set of spurious ethnohistoric accounts. Of the nine references she gleans from the **Jesuit Relations**, two are irrelevant, and the remainder involve gifts of tobacco to shamans in return for services, or other indirect associations of tobacco with curing activities (see 298000:159).
- 257. 477000:I:426; 479560:219-220.
- 258. Kamen-Kay cites an analogous example from Venezuela, where an unusual form of tobacco called "chimo" was employed by the Andean population: Throughout its evolution, this population retained many culture patterns--among them, the preparation and use of chimo... At some

time during the 19th century, European techniques of tobacco use reinforced the customs concerned in the original utilization of chimo, and it gained acceptance among people of rank and importance who lived in parts of Venezuela where tobacco was grown, and in the Andes where chimo was already a habit. (229300:14-15)

- 259. 375100:30; 377600:III:369-370, 384; 377814:268, 271n, 272; 556750:148-149; see also Chapter Five.
- 260. 475200:63-64.
- 261. 469164:146.
- 262. e.g., 079350:135, 268-269, 282; 314800; 384310:I:534; see also 079350:105, 107; 215400:xxxiv; 328000:206-207; 384250:lxvi, 108; 384260:I:223; II:98, 194, 233, 293-294, 297-298, 307-309; 384300:281; 503000:23.
- 263. 336170:XIII:506; see also 005990:79-80; 076500:162-163; 185250:207; 195600:63; 247700:59; 267500:37; 308000:461; 381210:159; 417340:28.
- 264. 174100:355.
- 265. 305000:5; 336170:III:326.
- 266. 005990:79-80; 076500:163-164; 195600:63; 208400:449; 241600:14; 247700:59; 267500:37; 308000:461; 371480:2; 381210:159; 513000:233; 526000:16.
- 267. 013500:329; 174100:561; 336170:III:840-842. McCashion has calculated that, if this present was evenly distributed, each Mohawk "castle" would have received approximately 43 pipes (305000:6-7).
- 268. 336170:IV:41.
- 269. 336170:IV:235-236.
- 270. 336170:IV:235-236.
- 271. 336170:IV:739-740.
- 272. 336170:IV:745.
- 273. 336170:IV:981.
- 274. 336170:IV:984.
- 275. 336170:IV:984A-985.

- 276. 336170:V:266.
- 277. 336170:V:268.
- 278. 336170:V:272.
- 279. 336170:V:272.
- 280. 336170:V:385.
- 281. 232400:383.
- 282. 232400:390.
- 283. 073700:II:80-81; 308000:561.
- 284. 073700:II:120.
- 285. 510100:43n.
- 286. 218810:100.
- **287. 336170:VII:103.**
- 288. 336170:VII:113.
- 289. 336170:VII:141.
- 290. 336170:VII:149,173,182.
- 291. 336170:VII:173,176-177.
- 292. 336170:VII:181.
- 293. 336170:VII:245.
- 294. 336170:VII:254.
- 295. 336170:VIII:40.
- 296. 336170:VIII:119.
- 297. 336170:VIII:231.
- 298. 336170:VIII:365.
- 299. e.g., 011050:112-113; 377020:67.
- 300. 336170:VIII:479,483.
- 301. 336170:VIII:501.
- 302. 336170:VIII:536.



- 303. 336170:VIII:557.
- 304. 005667:21; 120650:10-12; 23800:36-39; 232820:86.
- 305. 193000:31.
- 306. 525410:492.
- 307. 220100:I:203.
- 308. 303700:I:329.
- 309. 474417:262.
- 310. 355090:231.
- 311. see Chapter Three, notes 114 and 116.

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- 312. see Chapter Three, note 55.
- 313. see Chapter Three, note 66.
- 314. see Chapter Three, note 128.
- 315. 050650:I:526; 308000:451; 419000:10; 454465:134; 489200:314; 513000:85.
- 316. 561110:194,210.
- 317. 188900:229; 471027:271; see also Chapter Seven, note 231.
- 318. 237795:14-15; 237800:194-195.
- 319. 184000:505; 184500:5; 513000:243.
- 320. 022000:I:27, 326, 368-371; II:34, 114; 231080:77-78, 84-86; 513000:240.
- 321. 513000:239.
- 322. see Chapter Five, note 47 and 524700:205.
- 323. 231080:239-241, 253, 256; 471058:97-99; 471059:115-117, 131, 147, 151, 153, 159; see also Chapter Seven, notes 183-185.
- 324. 118800:62; 231080:332.
- 325. 231080:288-289.
- 326. 231080:298,301; see also 076560:1:118-119; 268550:11:141-142, 180-181, 233, 267.
- 327. 073700:I:67-68; 119800:156; 245400:226-227; 258600:I:77-84.

- 328. 076560:II:187-188; 450000:224; 454455:141, 171-174.
  - 329. 231080:311.
  - 330. 258600:I:168-169,175.
  - 331. 513000:242.
  - 332. 336170:IX:675.
  - 333. 231080:339.
  - 334. 231080:358-361.
  - 335. 059630:34.
  - 336. 475200:350.
  - 337. 336170:IX:722-724.
  - 338. 546200:70,73.
- 339. 232400:170.
  - 340. 188650:55.
  - 341. see Chapter Seven, note 261.
  - 342. 336170:V:693.
  - 343. 513000:241.
  - 344. 336080:362.
  - 345. 064240:217-218.
  - 346. 336170:VI:210-211.
  - 347. 513000:241.
  - 348. 016150:8.
  - 349. 336170:X:139.
  - 350. 028800:66,72,137,143,152,158-159; 308000:563-564.
  - 351. 357060:654-655.
  - 352. 474500:154.
  - 353. 016150:170.
  - 354. 284600:I:192,199; 441220:65,90,97-98.

- 355. 013500:329; 119800:168; 196770:121; 308000:561-562; 336170:VII:63-67; 411000:22; 512970:25; 513000:241-242.
- 356. 119800:169; 308000:562; 336170:VII:327-328.
- 357. 371980:238-239,261.
- 358. 076770:104; see also 336170:VII:780-781; 420400:193-194.
- .359. 450000:228; 470500:178; 525400:58-61,65.
- 360. 196753:45.
- 361. 195600:120; see also 121100:108-109.
- 362. 196753:152.
- 363. 076770:145-146,154; 308000:563; 336170:VII:780.
- 364. 185860:1,35,51.
- 365. 336170:VII:854-863; see also 308000:563; 336170:VII:783; 420390:44.
- 366. 016150:227-228.
- 367. 064240:24,61,81-83,128,281,418-419; 355300:129,131-132.
- 368. 336170:VIII:42.
- 369. 336170:VIII:233; see also 420400:272-273.
- 370. 184500:5; 371865:256.
- 371. 185862:157,160.
- 372. 336170:VIII:609,614,620-623; 454700:I: Appendix:x,xxii.
- 373. 196753:290,296-297.
- 374. 308000:565.
- 375. 454700:II:374-376.
- 376. 118800:62.
- 377. 308000:567.
- 378. 046505:111.
- 379. 408425:121,136-137,143,150,242,258.
- 380. 046500:58.

- 381. 220100:I:240,262; II:212; III:219-220,233.
- 382. 119230:II:52.
- 383. 308000:567.
- 384. 229500:150,274,294.
- 385. 131815:60,70,114,120,195-196,198,208,210.
- 386. 175200:I:224; II:107.
- 387. 303700:I:285,343,352; II:22; III:29,41.
- 388. 474417:152-153,245.
- 389. 068880:165-166, 190, 211, 394; 084140:136; see also Chapter Seven, notes 176 and 186.
- 390. 355090:41.
- 391. 068880:599.
- 392. 511000:28-29.
- 393. 068880:681-682.
- 394. 220210:237.
- 395. 195600:126.

- 1. 010580:4.
- 2. 010580:passim.
- 3. 086200:xv.
- 4. Apperson devotes an entire chapter to smoking in church (005990:225-233). His historical research is, however, flawed with glaring errors, such as when he attributes the pontifical reign of Innocent XII to a period nearly 100 years earlier than the Pope's birth (005990:225). We are forced to employ more reliable sources.
- 5. 086200:30-31.
- 6. 050650:I:9n,56; 086300:139; 195600:11; 350000:18, 183, 202-205; 466499:2,109-111; 466505:119.
- 7. 195600:17.
- 8. 086200:11-12,66.
- 9. 050650:I:518; II:210-212, 337-339; 306740:22-23; 350000:187-188.
- 10. 247700:85.
- 11. 422030:193.
- 12. 422030:180-183.
- 13. 050650:I:537n; 183530:371-372; 503230:37.
- 14. 371400.
- 15. 371400:fol.Bii, fol. E4; see also: 050650:I:382,384; 219450:94; 267500:25; 466499:15-16.
- 16. 219430; 219450; 219500.
- 17. 219500:12-13; see also: 050650:I:57,402-403; 195600:47; 199500:154; 219430:12-13; 219450:100; 247700:84; 267500:26-27; 291400:42; 291500:103; 405700:8; 501400:11; 511500:63.
- 18. 050650:I:452; see also 005990:37-38.
- 19. 481300:166.
- 20. 280250:307.

- 21. 050650:I:8n; 350000:202; 368450:36.
- 22. 178880:175; 189400:174; 195600:25-26; 291500:264; 350000:186-188, 190, 210.
- 23. quoted in 350000:211.
- Other variations include erba santa croce, herba Santa Croce, herba di Santa Croix, herbe de sainte croix and 24. herba di santa crucis (005310:3; 005520:539; 008000:3; 021300:85; 050650:I:227, 397-399; IV:397; 050700:127; 076500:63-64; 086300:50-51; 064601:1439; 086500:II:88; 119000:46; 122200:59-60; 152950:46; 185250:201; 195600:21; 197100:68; 199500:79; 231010:591; 247700:61; 267500:56; 272500:55; 291400:20-21; 291500:75; 308024:768; 322600:4; 350000:241; 368450:13-14; 375300:106; 423500:135; 441500:5; 466505:121; 496700:232; 513000:34). Hartwich (188640:67) says that the imported plant was **N. rustica**, yet this is probably based on the erroneous assumption that the tobacco available in Lisbon came from Florida (see discussion on pages 31-32 above). Castore Durante (Herbario Nuovo, Rome, 1585) was the first to note that Cardinal di Santa Croce introduced tobacco into Italy (086500:II:88). Heimann believes "there is a suspicion that the plant received one of its names, 'Herba Santa Croce,' from the earliest name of Brazil, Santa Cruz, rather than from the Cardinal Prosperc di Santa Croce" (195600:13).
- 25. 086300:152; 350000:233-234.
- 26. 121400.
- 27. translated in 086500:II:77-78.
- 28. 293950.
- 29. 050650:I:388; 291500:101; see also 350000:240.
- 30. 152945.
- 31. 306740; see also 050650:I:479.
- 32. 011640.
- 33. 247700:79; 350000:244-245.
- 34. 073850.
- 35. 086500:IV:186-187.
- 36. 084080.
- 37. 086500:VI:249. De Rocquigny was a French Huguenot who took refuge from persecution in England. His ideas on tobacco

were offered in the form of a poem called du Petun.

- 38. 076500:179; 195600:63; 247700:79; 267500:53-54; 280250:306; 350000:240; 368450:271 405700:9; 454100:3. Lewin notes that Molière was violently abused by Cohausen in a book entitled Satyrical Thoughts of the Pica nasi; or the Longings of the Concupiscent Nose; i.e. the Abuse and the Injurious Effects of Taking Snuff, in which Molière is called a clown and a rogue (280250:306). Molière's play survived fifteen performances but was later banned by the Church for the whole of the playwright's life.
- 39. 500700.
- 40. Our Plate is based on 086500:VIII:407-408, plate 182.
- 41. 086500:VIII:407-408.
- 42. 247700:78.
- 43. 050700:126; see also: 005990:225-233; 008000:70; 021300:112; 050650:I:79n,160; 071200:26-27; 076500:128-134; 119000:117-118, 129-130, 272; 195600:64; 199500:38; 247700:61; 267500:57; 291500:163; 350000:234-235, 242; 368450:40, 71, 81, 260-261, 281-283; 417340:18. It is often said that when William Bredon (parson or vicar of Buckinghamshire in the 1630s) had no tobacco, he would cut the bell-ropes to smoke them (005990:35; 021300:110; 185250:205; 308000:460). Ortiz notes that by the end of the century special cigars were being manufactured for priests (350000:248-249).
- 44. 119000:272; see also Mackenzie's anecdote: The most accomplished spitter I ever saw was an exalted prelate who, while preaching in Seville Cathedral, was able to spit over the heads of a couple of dozen pious women squatting around the foot of the pulpit and hit the same flagstone every time with consummate accuracy. (291500:36)
- 45. 050700:126; 119000:242; 199500:38; 350000:74; 368450:260-261.
- 46. 086300:153-154.
- 47. 119000:128,242; 368450:260-261. Van Lancker conjures up a fanciful image of "monks coughing in the midst of their Gregorian chants" (496700:235).
- 48. 498500.
- 49. 076500:131-132.

- 50. 086500:X:567-568. The incident was also reported by Stella and Chiericato (see 086500:X:567-568).
- 51. 002900:26; 005310:4; 005520:539; 005990:225; 021300:103: 050700:79; 048500:211; 050650:I:79; 071200:27; 076500:128-130,270; 086300:153-154; 086500:VI:283; 108700:52; 109000:30; 119000:78n,242; 122200:61; 134700:11; 179900:432; 185250:204; 189370:8; 195600:38; 197100:55, 69, 82; 199500:38; 215110:350; 247700:84-85; 267500:153; 280250:292; 291400:24; 291500:149; 304800:285; 350000:234; 368450:35-36, 260; 375300:108; 382500:20-21; 409740:79; 412000:392; 423500:140n; 441500:9; 460482:10; 468000:102; 496700:235; 497000:17; 503230:45; 511500:39-40; 513000:37-38 Penn (368450:35-36,260-261), Fairholt (119000:242), Apperson (005990:225) and Heward (199500:38) all say that this occurred in 1624 rather than 1642. This error may have been initiated by Fairholt and passed down through a long list of historians who used his work as a primary source.
- 52. quoted in 076500:128-130.
- 53. quoted in 368450:56-36; see also 513000:37-38.
- 54. 076500:130.
- 55. 050650:III:111; 050700:80; 350000:232,237.
- 56. 048500:211; 076500:130,270; 086300:153-154; 179900:432 280250:292-293; 291500:149; 350000:235; 409740:79; 503230:45.
- 57. 291500:152.
- 58. 291500:152.
- 59. 086300:153-154; 197100:82. Brooks (050650:I:81) and Ortiz (350000:235) say that these suspensions occurred in 1681.
- 60. 050650:I:81; 071200:42; 179900:432; 199500:38; 350000:235; 368450:38,260-261. Fairholt (119000:272) and Billings (021300:103) say that this occurred in 1690. Since Innocent XII became Pope only in 1691 this is evidently an error. Apperson (005990:225) and Taylor (468000:102) repeated this mistake and promptly turned it into 1590.
- 61. 423500:140n.
- 62. 048500:212; 050700:128,141; 280250:302; 291500:149,193. Benedict XIII should not be confused with the French antipope with the same title who "reigned" in 1394-1423. Billings (021300:103) claims it was Benedict XIV (1740-1758) who was responsible for revoking the penalties. Others say it was Benedict XII (050650:I:81; 185250:208;

076500:198-199) but his reign is much too early (1334-1342). While some claim the edicts were revoked in 1724 (179450:13; 304800:285; 368450) or 1755 (064601:1445), most historians cite 1725 as the correct date.

- 63. 368450:274.
- 64. 368450:40,225.
- 65. 050650:I:81.
- 66. 350000:248.
- 67. 050650:I:79n; II:218; 064601:1446; 291500:149; 350000:235-236.
- 68. 214300.
- 69. 086500:VI:289-290.
- 70. 357940; see also 086500:VII:361-362.
- 71. 068830; see also 086500:X:567-568.
  - 72. 003500.
  - 73. 008000:77. Our Plate is based on 050650:III:288-289.
  - 74. Plate 7.3a is based on 076500:98 (also reproduced in 306000:cover). Plate 7.3b is based on 219500:31 (also reproduced in 272500:31). Plate 7.3c is based on 272500:30.
  - 75. 094300:121.
  - 76. 375500:17.
  - 77. 457360:123; see also 050650:I:526; 377600:V:354.
  - 78. 050650:I:526n. For Leo Wiener this passage had an entirely different meaning: Stachey had simply "remarked that tobacco was taken in proportion to the number of wives a man had, that is, according to his wealth, which once more shows that smoking was an expensive luxury" (521000:II:177).
  - 79. 468000:102. Emboden unconvincingly argues that this rumor contributed to the popularity of tobacco throughout the world (111700:38).
  - 80. 050650:I:526n.

81. 231000:112.

- 82. 405500:109.
- 83. 466499:103.
- 84. 050650:I:381; 231000:104.
- 85. 021450:59.
- 86. 071200:52; see also 231000:105. Thomas Robert Malthus had by this time written his famous essays on population.
- 87. 002900:26; 050650:I:71; 050700:77; 291500:127.
- 88. 312869:10.
- 89. 076500:133; see also 050650:I:81; III:108-112.
- 90. 050700:127; 119000:272; 170750:7; 231000:104; 454100:3.
- 91. 008000:73; 050650:III:108-112; 050700:126-127; 086500:VII:379; 350000:235.
- 92. 353700.
- 93. 050650:I:202-209; 086300:26-27.
- 94. 018050.
- 95. 050650:I:226; see also: 008000:63; 021300:260; 050700:194-195; 078300:37; 076500:63; 119000:18-20; 122200:60-61; 185250:199-200; 195600:15-16; 199500:29-45; 291400:11-12; 350000:157-159; 368450:4,6-9; 371400:xi; 405700:6; 417000:140-141; 511500:27; 521000:I:137-139. Our Plate is based on 050650:I:226 (also reproduced in 077500:203; 324050:22; 350000:159).
- 96. 350000:20,190-191,216.
- 97. 350000:219.
- 98. A donatario was a proprietor of a province in Portuguese Brazil (086500:I:36).
- 99. 086300:78-79,142-143; 086500:I:36.
- 100. quoted in 382750:231-232.
- 101. 111700:37.
- 102. 449500:ix.
- 103. 026305:92; 048500:210; 050650:I:79n; 050700:79; 076500:106-108,269; 086300:149-150.

- 104. 050650:I:79n. As Wasson observes, the vehemence with which the Church inveighed against tobacco is proof of its importance in Amerindian culture (503660:163).
- 105. 081455. Dickson and O'Neil note that Acosta was editor of the proceedings and appears to have formulated the decrees (086500:III:101-102). cf. note 286.
- 106. quoted in 086300:150; 086500:III:101-102; see also 050650:I:79n; 050700:79; 076500:106-108; 405700:6; 449500:ix,105.
- 107. 050650:I:79n; 076500:106-108; 280250:292.
- 108. See page 42ff.
- 109. 334700. These were letters from the Portuguese Indies translated from Spanish into Italian between 1559 and 1565.
- 110. quoted in 086300:62 and 086500:I:35-36; see also 086300:78-79,141; 195600:10.
- 111. see page 59 above.
- 112. see pages 42-44 and 47 above.
- 113. 086300:66-67.
- 114. 081450.
- 115. Castiglioni claims Acosta was "a strong advocate of tobacco" (064601:1440) but it is clear from the Jesuit's text that he was citing a description of native usage plagiarized from a history of Mexico by the Dominican priest, Fray Diego Durán (086300:143-147) cf. note 272B.
- 116. 010580:49.
- 117. quoted in 010580:53.
- 118. 412295.
- 119. 412295:70; 412300:48; 412302:62; see also 412500:I:182.
- 120. 412295:111-112; 412300:76-77; 412302:88; see also: 219230:87; 412500:I:228-229.
- 121. This work has, to my knowledge, not been translated into English. As an original copy could not be located I have used the French edition of 1866 (412500).
- 122. 412500:I:182 cf. 412302:62,88; see also 481100:154.
- 123. 278900.

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- 124. see Chapter Two.
- 125. 464800:fol.C4. This passage (by the anonymous C.T.) was penned in 1615. In his famous laudation of tobacco published in 1571, Monardes had already recommended the leaf for "opilations of the stomacke, and of inner parts," as well as for "hardness in the belly" and "worms out of the guttes" (i.e., internal congestion, stomach-ache, constipation and helminthiasis; see 050650:I:248). As we have noted, the Spanish Jesuits made similar claims in sixteenth-century South America (see page 335ff).
- 126. see pages 332 above.
- 127. I have quoted from the Grant translation of the 1618 edition (279000:III:164; emphasis mine). See also the Erondelle translation of the 1609 edition (279020:217-218 also reprinted in 050650:I:469). Venus was the Roman god of love.
- 128. 279020:299. The Grant translation gives simply "calms the passions" (279000:III:253).
- 129. 412295:160; 412300:111; 412302:121.
- 130. 258000:II:83.
- 131. see pages 332ff. above.
- 132. 268550:I:13; 412295:106-107; 412300:73; 412302:85; 412500:I:222-223; 477000:I:394.
- 133. 196748:I:xi,30.
- 134. 196745; see also 196742; 196743; 196744.
- 135. 196748:II:460; see also 008000:14-15; 010580:53; 050650:II:562-563; 008000:14-15; 219230:67.
- 136. 268550; see also 010580:50.
- 137. 268550:141-142.
- 138. 196748:I:180.
- 139. 196748:I:196, 205, 229-230, 241, 245, 249, 304; II:533; see also 050650:II:562.
- 140. 196748:1:230,245,249.
- 141. e.g., 196748:I:304.
- 142. 196748:II:533; see also 196748:I:241.

- 143. 196748:I:258,295.
- 144. The Oxford English Dictionary says that **misocapnus** first appeared in the Latin edition (1619) of James I's A **Counterblaste to Tobacco** (219500; see also 008000:56; 050650:II:70; 267500:29).
- 145. 021300:105n; 050650:II:70; 185250:204; 197100:70; 219450:120; 368450:40. This was certainly an obscure work for no copy seems to have survived.
- 146. 050700:126; 350000:74.
- 147. 086500:V:234. The emblem, together with the poems, were published by the "rhetorici" in **Typus Mundi** (469130).
- 148. 010955. This was a translation of a Latin edition of 1657 (see 050650:II:320-321). Our Plate is based on 050650:IV:420 (also reproduced in 076500:128; 272500:31).
- 149. 050650:II:320-324; 076500:118-120; 086500:VII:338; 454100:4.

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- 150. 064601:1449.
- 151. 215230:36.
- 152. 267400:32; see also 050650:I:164; 050700:144; 215230:36-37; 247700:49-50.
- 050650:II:499-501. The tendency of many missionaries to 153. emphasize the God-given medical virtues of plants from the New World led to an identification of the Jesuits with some of these plants. After Spanish missionaries discovered the fébrifuge qualities of cinchona bark, for example, the Jesuit Honoré Fabri (1607-1688) affirmed that some thousand people in Rome alone had been cured of fever by the bark and newspapers advertised "the excellent powder known by the name of Jesuit's powder" (466100:839). The Spanish Jesuits received a more dubious reputation when they were identified with the dreaded "Jesuit's snuff"--a lethal concoction thought by many in the early eighteenth century to have been the favorite method by which the Jesuits cleared away political opponents (050700:133; 119000:256; 291500:166; 350000:12; 382500:25-26).
- 154. 471003:117.
- 155. 471007:139.
- 156. 102200.
- 157. 102210:I:108; see also 050650:II:365. Du Creux never visited the New World but collected data for the **Historia**

by translating passages from the Jesuit **Relations** and interviewing eyewitnesses. The idea that tobacco had a "wonderful effect of drying up the brain" is not specifically referred to in the **Relations** and may have come from Lescarbot, Sagard or conversations with Jesuits who came back from New France. Since the role of tobacco in the humours theory was common knowledge throughout France at this time, it is more likely that Du Creux's comments simply reflect information already known to him.

- 158. 068880:1018-1019; 084140:306.
- 159. see pages 332ff.
- 160. 010580:79.
- 161. 471005:161; 471007:137; 471009:273.
- 162. see discussion in Chapter One, pages 6-7.
- 163. 010580:107.
- 164. 471017:81-83. Two similar passages occur elsewhere in the **Jesuit Relations:**

This same man was singularly addicted to smoking... When this new Christian saw that the smoke was useless to him, he abstained from it to such an extent that one would have said that he never cared for this plant. Not only on this point has he done violence to himself, but he has frequently passed entire days without eating anything...(471027:157).

Wishing, on a certain day, to indicate the desire that he had to be a Christian, "I love nothing in the world so much as Petun or tobacco," said he; "I love it no more, when they speak to me of Baptism, --that is to say, if, in order to be baptized, it were necessary to give it up, I would have no more desire to smoke" (471029:157).

- **165.** 471017:127; 473000:143.
- 166. 471058:25; see also 076500:106-107.
- 167. 471032:229-231. This passage also reveals the degree to which soldiers in New France had adopted the habit in the late 1640s. Being discouraged from smoking by the Jesuits while simultaneously seeing other Frenchmen smoke with impunity must have puzzled native peoples. Lahontan had his fictitious Huron conversationalist, "Adario," allude to this hypocrisy: "Most of your French People take snuff when they're at Mass; they talk, and laugh; and sing rather for

Diversion than out of Devotion" (258600:II:538).

- 168. 471018:187.
- 169. 231000:100-101; see also 111700:39.
- 170. 314550:95-96.
- 010580:95; 512970:8; 513000:71. 171.
- 471054:229; see also 231080:155; 513000:89. 172.
- 173. 471051:43-45; see also 010580:10,111; 231080:129; 314550:47; 512970:7; 513000:68.
- 174. 471051:45.
- 175. 059630:18.
- 176. 068880:634. De Smet's native neophytes also redirected smoking ceremonies from "pagan spirits" to the Christian God:

The Flat Heads are fond of praying ... if any wake during the night, they begin to pray...when his prayer is done, which is always preceded and followed by the sign of the cross, he smokes his calumet and then turns in again. This he will do three or four times during the night ... These pious excesses had sprung from a little piece of advice I had given them on my first visit, that "on waking at night it was commendable to raise the heart to God." (084140:290-291) In his Canadian Savage Folk MacLean wrote of another fascinating expression of piety:

In 1890 a decided religious movement known as the "Messiah Craze," was witnessed among the Indians of the north-western portion of the United States, its ulterior effects reaching the Blackfeet, Sioux and Crees of Canada... The Sioux, Cheyennes and Arapahoes heard that the Christ had been seen, and a delegation of three Sioux and Porcupine, a Cheyenne, went to the country where it was said the Christ was living.

Good Thunder, one of the delegation, upon his return told his experience as follows: ... suddenly he appeared to me--a man of long, surprising beauty with golden hair--clad in a blue robe... I saw the prints of the nails in his hands and feet ... The Indians offered Christ a pipe, tobacco pouch and moccasins, he handed the two first to others who were with him, but kept the

moccasins. (292300:452-453)

- 177. 022000:I:309; 231080:74-75; 513000:86-87.
- 178. 022000:I:326; 512970:28-29; 513000:86-87.
- 179. 189400:176; 512970:7; 513000:68.
- 180. 471058:267; see also 314550:145; 513000:67.
- 181. 010580:119-120,278. "Curiously engough," says Penn, "during the seventeenth century tobacco was used in English churches as incense. There are frequent entries in church-warden's accounts of sums paid 'for tobacco and frankincense burnt in church,' a combination of paganism, sanitation, and symbolism" (368450:6).
- 182. 350000:186-187.

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- 183. 471059:119; see also 471059:115, 117, 153, 159. The Jesuit Claude-Jean Allouez was also given a calumet and was obliged "to make a pretense of smoking it" (471060:157; 513000:239).
- 184. 471059:131; 513000:234. See also Hennepin's statement: "I had certainly perished in my voyage, had it not been for this Calumet..." (196745:125; 116600:424; 512960:85; 512970:28).
- 185. 471059:151; see also 525410:44.
- 186. 068880:251,591,605-606; 084140:151.
- 187. 471067:249-253.
- 188. 280000:10; see also 488000:687.
- 189. An English translation was published by the Museum of the American Indian in 1952 (280000).
- 190. 280000:13; see also 512970:26.
- 191. 280000:20.
- 192. 280000:14,20. One wonders whether Le Sueur was at all influenced by Joseph Lafitau's (1724) comparison of the calumet dance with the customs of ancient Europe. Lafitau also alluded to the importation of the calumet by the Fox to Jesuit missions and wondered whether missionaries "understood fully the religious bases for this custom" (258000:II:179,185; see also 512970:24).

193. 280000:18.

- 194. see Chapter Nine.
- 195. 471036:113.
- 196. 471045:127.
- 197. 471045:131.
- 198. e.g., 471005:111-113, 161; 471007:137-139, 163, 175; 471009:273; 471010:249; 471013:141, 171, 219; 471015:27; 471017:95; 471022:237; 471024:137; 471027:271; 471028:215; 471041:21; 471056:169, 189; 471059:175; 471061:131; 471063:259; 471067:59, 141, 257; see also 068880:626, 908, 909, 1009; 084140:207; 084142:284; 102210:I:141, 166; II:412; 174100:101; 221620:143-144; 231080:266; 314550:70, 144, 201; 475950:40; 477000:II:507, 564-565.
- 199. 471015:27; see also 314550:70,144,201.
- 200. 471041:21.
- 201. 010580:282.

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- 202. 411400. Our Plate is based on 086500:IV:189, plate 103.
- 203. 086500:IV:189.
- 204. Compare this with comments made by J.W. Anderson, who was a fur trader amongst the James Bay Cree in 1910: I have formed the opinion that there is an optimum period in the dealings of any primitive people with the white man. This might be described as the period of time when the aborigines have sufficient of the white man's material civilization to ease the burden of life, but not yet enough to disrupt their way of life...those undoubted and perhaps harmless comforts, tea and tobacco, two of the greatest amenities we have given to the original inhabitants of Canada...(524700:x1).
- 205. 471005 159-161. In Iroquoian culture a community was expected to present to an individual dreamer whatever occurred in his/her dream. An in depth study of dreams or visions and their role in Iroquoian shamanism and tobacco-use has been completed and will be published shortly. The **Jesuit Relations** provide other examples of Amerindians requesting tobacco from the French. In 1611 Biard spoke of a case where one pound of tobacco and several other goods were demanded from the King in return for an offer to let him marry a native woman (308000:637; 471001:177). Dièreville noted that when a Frenchman took into his service one of the daughters of an Ottawa, the

price included tobacco for the father (086500:X:587). Some did not wait for the missionaries to surrender their stocks of the precious herb and secretly deprived them of it. In 1642 a young lad was caught stealing a little tobacco that a Jesuit had saved "for gratuities to them" (471024:151).

- 206. 471046:137-139.
- 207. 471012:117. This advice may have come from Le Jeune's earlier experience that carrying a lighted tinder allowed his native hosts "to smoke while paddling a canoe" (471007:137). While rudimentary, the European method of producing fire was still more efficient than the laborious native technique and the French employed this technology to advantage (descriptions of seventeenth-century their tinder-boxes found in 050600:107-109 may be and 103200:116-118). Although the tinder-pistol was invented during the seventeenth century it was a costly investment and most travelers continued using the old tinder-box with flint and steel (291500:233; 382600:42).
- 208. 471009:273.
- 209. 471056:169.
- 210. 471010:249.
- 211. 471056:189.
- 212. 471005:111-113; see also 010580:83; 102210:I:141.
- 213. 471007:137-139.
- Needless to say, the resulting dog-fight raised the 214. suspicion of the native hosts, who were not impressed and looked upon the missionary "as a very bad man," reproaching him disdainfully and intimating that he would be the cause of their deaths (471007:163; see also 102210:I:166). There is reason to believe that this was not an isolated case. Consider, for example, Alexander Mackenz: experiences among the "Knisteneaux" Indians in 1789-93: Mackenzie's If there should be any who cannot finish the whole of their mess (meal), they endeavor to prevail on some of their friends to eat it for their for them, who are rewarded assistance with ammunition and tobacco. (291455:108)Note also Maximilian of Wied's account of his travels in the interior in the 1830s: When a Manitari invites his friends to a
  - feast which is especially devoted to the table, each guest brings a dish, which is filled, and which he is expected to empty; if he is unable to do this, he passes it on

to his neighbour, and, as a sort of reward, gives him some tobacco. If his neighbour accepts it, he undertakes thereby the often not pleasant task of emptying the dish. (303700:II:370)

And, finally, various comments by Father De Smet in the 1840s:

...dogs were served up to do me honour. I had half a one for my share. You may judge of my embarrassment, when I tell you that I attended one of those feasts at which every one is to eat all that is offered to him. Fortunately, one may call to his aid another guest, provided that the request to perform the kind office be accompanied by a present of tobacco. (084140:162)

...the portion bestowed upon me was large; the two thighs and the paws, with five or six ribs; the law of the feast required me to eat it all, but it was too much for me. Finally I learned that one may get rid of his dish by passing it to another guest, with a present of tobacco. (068880:212)

- 215. 471017:95; see also 086200:259; 475950:40; 477000:II:507,564-565.
- 216. 471024:137.
- 217. 471022:237. For a similar case see 471049:69.
- 218. 471061:129-131.
- 219. 471013:141,171,219.
- 220. 258600:II:438; see also 010580:122. One is led to wonder whether the alleged Abenaki request for a mission of Black Gowns in the late 1640s was partially intended to help benefit from the "temporal attractions" offered by the Jesuits. Although the missionaries "put them off till Autumn, in order to take time to consider the matter," the Abenaki were given tobacco and other parting gifts, perhaps to keep them interested (471028:215).
- 221. 412295:106-107; 412300:73; 412302:85; 412500:I:222-223. On occasion, native peoples also gave the Jesuits tobacco pouches (e.g., 068880:166; 471024:41,89).
- 222. 471007:217; see also 477000:II:491.
- 223. see Chapters Four and Five.
- 224. 471067:59.

- 225. 471067:141.
- 226. 471066:159.
- 227. 471066:31.
- 228. 471067:271.
- 229. see discussion in Chapter One.
- 230. 471027:271; 471028:167; 471040:203; 471056:189.
- 231. 471027:271; see also 102210:II:412; 174100:101; 221620:143-144.
- 232. 102210:412.
- 233. see Chapters Four and Six.
- 234. 471028:167; see also Chapter Six.
- 235. 183530:134.
- 236. 050650:I:104-105; 355118:242; 368450:73-74; 371900:535; 513000:41.
- 237. 050700:93-94.
- 238. e.g., 010580; 314550.
- 239. Charles Inglis quoted in 010580:133.
- 240. see Chapter Three.
- 241. 005990:66; 205170:394.
- 242. quoted in 010580:139-140.
- 243. 005990:66; 205170:394.
- 244. 475200:38.
- 245. 395930:214; 475200:38-39.
- 246. 220230:117; 312100:158.
- 247. see Chapter Four.
- 248. 194580:85-93.
- 249. 290700:48.
- 250. 010580:263.

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- 251. 016150.
- 252. 016150:8.
- 253. 016150:10-11.
- 254. 016150:64.
- 255. 016150:48,53,78,89.
- 256. 016150:117.
- 257. 016150:171.
- 258. 016150:192.
- 259. see Chapter Three.
- 260. 371200:144.
- 261. 188750:151.
- 262. comments by Forbes on Father Luyanto quoted in 189400:181.
- 263. 026800:III:351.
- 264. 076550:106,109.
- 265. 010990:100.
- 266. 435150:49-40.

Notes For Chapter Eight

- 1. 086500:VIII:395n. The idea was repeated in 1711 (008000:15; 050650:I:6).
- 2. 258000:II:79-82.

3. 257900.

4. 258000:II:180-183.

5. see 479560:22-23.

6. 002000.

- 7. 002000:7,103-104,109,167,270,316,408,423-424.
- 8. 002000:423-424.
- 9. 010500.
- 10. 010500; see also 201550:23; 422375:27-28,31-38; 524600:14,29-30.
- 11. 010500:230.
- 12. 064900.
- 13. 064900:I:233-234.
- 14. 118700.
- 15. 118700:21-23; our Plate is based on 118700:23.
- 16. 118700:22n.
- 17. 118700:21,36.
- 18. 118700:21n; 451500:246.
- 19. 118700:plate 1.

20. 118700:62.

- 21. 064900:II: plate 255 cf. 118700: plate 1g.
- 22. For a brilliant analysis of the attitudes of the bourgeoisie at this time see Stallybrass and White's work on **The Politics and Poetics of Transgression** (452850:125ff.).

23. 422375:50.

- 24. 422375:50-51; Squier and Davis were more inclined to conjecture that these were smoking devices, though they assigned them to the more generic category of "implements" (451500:226).
- 25. 451500:226n.
- 26. 417070.
- 27. 417070:113,115,248-249.
- 28. 417070:133-145.
- 29. 417070:133; see also 505000:8.
- 30. see 088000:24.
- 31. 417070:140-142; for a contemporary critique of Schoolcraft's nomenclature see 505000:9. Our Plate is based on originals in 417070:141-142.
- 32. 417073.
- 33. see 422375:51. It should be noted that Schoolcraft's attribution of the mounds to Indians rather than a lost civilization was shared by Samuel F. Haven in 1856 and again in 1877 (see 201550:40; 422375:64-65; 524600:39).
- 34. see 524600:39-40.
- 35. 315000.
- 36. 315000:374.
- 37. 315000:354-357.
- 38. 315000:357; see also 000615:319-320.
- 39. 451500.
- 40. 524600:34-82.
- 41. 422375:56; 524600:36.
- 42. 451500:227.
- 43. 451500:229.
- 44. 064900:I:235.
- 45. 451500:243.
- 46. 064900:I:235.

- 47. 451500:195,228-229.
- 48. 451500:228-229,249.
- 49. 451500:151-152.
- 50. 451500:228.
- 51. 451500:152.
- 52. 451500:259; our Plate is based on the originals in 451500: Figures 128, 153, 159, 164, 179, 183.
- 53. 451500:242; see also 422375:62.
- 54. 451500:229-230; emphasis in original.
- 55. see 560000; 560100; 560300; 560500.
- 56. 451500:272.
- 57. 201550:36-37.
- 58. In a surprisingly balanced treatment of the history of tobacco an anonymous contributor to the June, 1855 edition of **Harper's Magazine** attributed all of Squier and Davis' pipes (of both the "mound builder" and "later race" varieties) to the Indians, though even here there was an admission that the "more modern" productions were inferior (005310:10).
- 59. 195600:73.
- 60. 195600:73.
- 61. 195600:75-76; 524600:28.
- 62. 195600:78.
- 63. 195600:90.
- 64. 005310:14.
- 65. 005310:14.
- 66. 201550:15.
- 67. 021320:193-194.
- 68. 195600:143.
- 69. 195600:190; our Plate is based on reproductions in 195600:55,190.

- 70. These "cigar-store Indians" have since become among the most valued collectors' items sold by antique dealers.
- 71. 195600:197-200.
- 72. 134700.
- 73. 134700:3.
- 74. 134700:11; see also 199500:98-100; 368450:18-19.
- 75. 134700:12.
- 76. Our Plate is based on the original in 064900:II: plates 271-272.
- 77. see Chapter Two.
- 78. 005990:155-191.
- 79. 005990:177.
- 80. 291300; see also 050650:IV:306-308.
- 81. 011900; see also 050650:IV:316.
- 82. 005380; see also 119000:43n-44n; 122200:1-2; 199500:103-104; 215110:350; 368450:19-20.

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- 83. 011060:5-6; 368450:20-21; 503230:243; 528200:18; 528250:11:42.
- 84. Plate 8.6a is based on 258630:16, 8.6b on 050130:490 and 8.6c on 018800:218.
- 85. 005310:2,11.
- 86. 005310:2.
- 87. 005280:292; 119000:155; 215110:350.
- 88. see 005380:290.
- 89. quoted in 005380:290.
- 90. quoted in 005380:291.
- 91. 528190.
- 32. see 479100:69,73.
- 93. see also 381500.
- 94. 528200:15.

- 95. 528200:51. Bruce later issued a public recantation (see 528200:51-52; 528250:II:39-40). Wilson, however, observed that "converts to his earlier position are loath to abandon an idea that seemed to evoke a new bond of sympathy between that ancient classic world and our own" (528250:II:40).
- 96. 528200.

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- 97. 528200:47.
- 98. 528200:6-9; see also 528250:II:31.
- 99. 064900.
- 100. 417070; 417073.
- 101. 315000.
- 102. 451500.
- 103. 528200:33-35. Trigger notes that in 1860 Egerton Ryerson (Chief Superintendent of Education for Canada West) described Wilson as a man who, in his leisure moments, devoted himself to "disembowelling the Cemeteries of the Indian tribes in seeking up Tomahawks, Pipes and Tobacco which may be found there and writing essays upon them" (479100:72).
- 104. 528200:1-2.
- 105. 528200:5; see also 528250:II:4.
- 106. 417073.
- 107. 280780; see also 050650:IV:265-266.
- 108. 528200:5-6; see also 528250:II:4.
- 109. As Brian Street points out, the tradition of the 'Noble Savage' was not entirely rejected in nineteenth-century thought (457450:7).
- 110. 528190:680.
- 111. 054340:441.
- 112. 528200:51.
- 113. 528200:16; for an unacknowledged paraphrasing of this passage by later tobacco historians see 368450:148 and 122200:2.
- 114. 528200:19n; for an example see 005320.

- 115. 528200:18.
- 116. Referring to Wilson years later, the distinguished antiquarian F.W. Fairholt thought Toronto was somewhere in the United States (119000:34).
- 117. 528250:I:462-488; II:1-50. Comparison of **Pipes and Tobacco** with **Prehistoric Man** suggests that Wilson completely reorganized the former to produce an entire chapter in the latter. Many additions and deletions are evident, though entire sections are reprinted verbatim. A greatly expanded discussion of "mound pipes" was added in another section of the 1862 work.
- 118. 528250:II:1-50.
- 119. An interesting discussion of the image of the Amerindian "savage" in nineteenth-century European popular discourse is given by Billington (021320:105-149).
- 120. e.g., 010880; 021300; 046740; 050580; 071200; 074600; 119000; 323350; 375633; 407500; 421950; 422377; 453260; 471550; 474440.
- 121. 119000.
- 122. 119000:24-42.
- 123. 451500.
- 124. 528200.
- 125. 064900.
- 126. Fairholt called Wilson's **Pipes and Tobacco** a "clever Ethnographical sketch" (119000:34).
- 127. 119000:152-154.
- 128. 119000:159.
- 129. 119000:43-44.
- 130. 119000:159n,213.
- 131. 021300.
- 132. 021300:86-87,111-112.
- 133. 021300:163-167.
- 134. e.g., 000600; 000610; 011060; 011070; 050400; 119150; 311500; 382300.

- 135. 311500:22.
- 136. 000600:155.
- 137. 000600:156. In a second report Abbott felt more inclined to de-emphasize distinctions between "mound builder" and "Indian" pipes, arguing that some forms were common to both (000610:125).
- 138. 011060; 011070.
- 139. 011070:121-122.
- 140. It was probably assumed that, while non-nicotian substances could be consumed in medical moderation, the introduction of tobacco made pipe smoking a social recreation.
- 141. e.g., 011075; 011080; 011200; 011500; 013500; 015000; 016770; 046740; 050500; 094500; 131700; 131800; 185750; 222100; 222101; 258500; 293000; 314700; 323350; 357510; 357540; 357550; 357560; 357600; 381500.
- 142. see 524600:40.
- 143. 323350.
- 144. see 118700:15-16.
- 145. 046740.
- 146. 293000.
- 147. 185750.
- 148. 094500.
- 149. 314700:117-119.
- 150. 011080:764.
- 151. 011075:264.
- 152. 000615.
- 153. 000615:315; see also 369500:239.
- 154. 000615:335.
- 155. 013500:327.
- 156. 015000; 131700; 131800; 258500.
- 157. 479100:72.

- 158. 079500:92-97.
- 159. 079500:93.
- 160. 079500.
- 161. 079500:95-96. Dawson's reference to the renowned botanist, Pallas, reflects a common practice of the period. Eminent botanical authorities such as Pallas and Meyen were invariably cited by those convinced that tobacco-smoking was of great antiquity in China (050650:I:7).
- 162. 079500:95.
- 163. 528250:I:487.
- 164. 147050:I:170-171; II:117; 289250:250; 289255:255-256, 434, 512-513, 518; 315000:passim; 315010:69-70; 137-139,179; 489250:I:210; II:287, 343, 383, 417-418.
- 165. 528200:27.
- 166. 528250:I:462,481-484.
- 167. 528250:I:462.
- 168. 528200:3.
- 169. 528250:I:462.
- 170. 528250:I:462-469.
- 171. 528250:I:475-486; see also 524600:40.
- 172. 528250:I:484-485.
- 173. 454200:96.
- 174. 311000:10-12,14-15; 422375:79-81.
- 175. our Plate is based on 011075: Figures 17,18; 196780: Figures 28,29; see also 030430:24; 119150:68; 498000:609.
- 176. The smoking of ancient Amerindian pipes recovered from the ground was apparently a popular habit durng this period, for we have found other references to this effect (e.g., 496500:111).
- 177. 011075:274-276; 119150; 196780:156-157; 311000:12-13; 357402:247; 357405:320; 422375:80-81.
- 178. 311000:22-25.
- 179. 311000:4; 422375:82-112.

- 180. 196780.
- 181. 196780:124.
- 182. 196780; 422375:88.
- 183. 196780:166.
- 184. 196780:137.
- 185. 196780:155-158; 311000:27-28; 422375:89.
- 186. 375680.
- 187. see 311000:28-30; 422375:90-93.
- 188. 311000:30.
- 189. 311000:30-31.
- 190. 422375:92.
- 191. 498000.
- 192. 498000:608.
- 193. 498000:609.
- 194. 092400.
- 195. quoted in 422375:97.
- 196. see bibliography in 311000:113-118.
- 197. 311000:33-36.
- 198. 011075:275-277.
- 199. 489410; see also 050500; 311000:78-79.
- 200. 357540; 357560:308-309; see also 311000:79. Meanwhile, suspicion was growing that Jacob Gass might have been involved in the fraudulent production of the elephant pipes (see 018400; 018500; 311000:37-43).
- 201. see 311000. The elephant pipes are also discussed as examples of fakes by Crouch (see 076900:24-25,75). The manufacture of "Indian", pipes for fraudulent sale to unsuspecting collectors was such a popular pastime in the late-nineteenth century that frequent warnings needed to be published (e.g., 089439; 545200).
- 202. e.g., 005400; 005410; 005420; 005430; 005440; 005450; 005460; 005470; 005480; 005490; 005500; 005510; 005520;

005530; 005540; 005550; 005560; 005570; 005580; 005590; 005600; 108500.

- 203. 189400.
- 204. 189400:180.
- 205. 189400:173-175.
- 206. 189400:182.
- 207. see Chapter Five.
- 208. 189400:182.
- 209. 189400:182.
- 210. 005380:289. The anonymous author of this article may have been E.V. Heward, since he later asked permission of the editor to republish the essay as a chapter in his book St. Nicotine of the Peace Pipe (see 1995J0:vii,95-116).
- 211. 005380:295-296; 199500:108.
- 212. 005380:299; 199500:113-115; for a critique of this position see 368450:22.
- 213. 005385.
- 214. 005385. As might be expected the promoters of the pipe as a symbol of profundity were not pleased with the popularity of the cigarette. In a 1913 "Plea for the Pipe" a defender wrote:

...why should it be considered a mark of vulgarity, of plebeianism, to inhale tobacco-smoke through the stem of a briar, and the hall-mark of good breeding to finger a cigar or dally with that triviality and travesty of the adoration of My Lady Nicotine--a cigarette? (quoted in 005990:195).

- 215. 489420.
- 216. 314500.
- 217. 355500.
- 218. 369500.
- 219. 131805.
- 220. 081500.

- 221. 081500:48.
- 222. 470500:176-213 and passim.
- 223. 470500:177n.
- 224. 470500:177-178.
- 225. 470500:209.
- 226. 470500:282.
- 227. 470500:348.
- 228. 292300:257-279 and passim.
- 229. 292300:257.
- 230. 292300:259-260.
- 231. 292300:259.
- 232. e.g., 357500; 357560.
- 233. 469158; see also 422375:108-112; 524600:42-43.
- 234. see 357590:249.
- 235. 357590:263; see also 357520:145-146; 357570:54-55.
- 236. see 292980:139.
- 237. 357590:254-256.
- 238. e.g., 011100:38-39; 011200:112-113; 011300:172; 357900.
- 239. 011200:112-113.
- 240. e.g., 205190:434, 439, 443, 445-446, 454, 465, 469, 492; 454180:446,448,457.
- 241. See the excellent biography of Boyle written by Gerald Killan (241400).
- 242. 030100; 030105; 030110; 030120; 030130; 030140; 030150; 030155; 030160; 030170; 030180; 030190; 030200; 030210; 030220; 030230; 030240; 030250; 030260; 030270; 030280; 030290; 030300; 030310; 030320; 030350; 030360; 030370; 030380; 030390; 030400; 030410; 030420; 030430; 030440. Laidlaw, McGuire and Orr also contributed articles on Amerindian pipes to the Annual Archaeological Reports (see: 258610; 258612; 258617; 258620; 258622; 258624; 258627; 308015; 339600; 339605; 339610).

243. 241400:xi,140.

- 244. Killan lists Cyrus Thomas, Frederick W. Hodge, Flinders Petrie, John Evans, W. Boyd Dawkins and the Marquis de Nadaillac among the prominent international scholars who regularly perused the Ontario reports (241400:200-201).
- 245. 201550:192.
- 246. 030270:27.
- 247. 357590:255-264,268-270 cf. 030110; 030120.
- 248. 030120:27.
- 249. 357590:256,263.
- 250. 030430:24-25.
- 251. e.g., 030150:34-35; 030210:51-55; 030270:21; 030300:18.

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- 252. 030210:55.
- 253. 030180:4; see also 241400:105.
- 254. 030210:55.
- 255. 013500:328; 013800:38-39; 015200:109; 015545:344.
- 256. 357520:145-146.
- 257. 369500:242.
- 258. 528250:II:16-17.

## Notes For Chapter Nine

1. 308000.

- 2. 308015:43.
- 3. 308000:626.
- 4. 308000: plates 1-4.
- 5. 308000:489.
- 6. 308000:413.
- 7. 308000:626.
- our Plate is based on the originals in 308000: Figures 17, 19, 90, 93, 112, 115, 118, 132, 135, 161.
- 9. 469158.
- 10. 308000:511,632-633.
- 11. 308000:512.
- 12. 308000:512,525.
- 13. 308000:514-522,524,527,632.
- 14. 308000:632.
- 15. 196780; see also Chapter Eight.
- 16. see Chapter Eight.
- 17. 308000:524.
- 18. see Chapter Eight.
- 19. 308000:527.
- 20. see Chapter Eight.
- 21. see Chapter Eight.
- 22. 308000:489; see also 513000:290.
- 23. 308000:489, 493, 504, 631; see also 505000:12-13; 513000:290-291.
- 24. 308000:489,497,631.
- 25. 308000:500.

- 26. 308000:501.
- 27. 308000:493,496,631; see also 505000:12.
- 28. see 308000:527-528.
- 29. 030310:20.
- 30. 030350.
- 31. 030350:27; see also 241400:199; 505000:13-14.
- 32. 030350:29. Years later W.J. Wintemberg argued that native flowers, such as those of the tobacco plant, might have shape of the Iroquoian suggested the trumpet pipe (533500:81). George West, who reiterated much of McGuire's work, could not bring himself to agree with him on this "It is not reasonable to suppose," he wrote, "that point. the shape of a horn, even though pleasing noises issued therefrom, which the savages did not understand or appreciate, could have so impressed them as to cause a great nation, covering a vast territory, to suddenly adopt such a decidedly radical change in the form of their pipes" (513000:291).
- 33. 030350:28. A similar critique permeated many of Boyle's descriptive articles on pipes written from this point onward (e.g., 030360:50; 030370:55; 030380:56; 030390:29).
  - 34. 030350:30.

- 35. 030350:30.
- 36. 030350:33-34.
- 37. 308015:44.
- 38. 308015:46.
- 39. 308015:44; see also 505000:14-15.
- 40. 308015:46; see also 505000:15.
- 41. 505000:12.
- 42. 451500; see also Chapter Eight.
- 43. 196780; see also Chapter Eight.
- 44. 030320:11.
- 45. 030320:13.
- 46. 030320:14-21; see also 241400:182. Boyle was not the only

scholar to find similarities between human effigy pipes and modern juvenile artwork. W.J. Wintemberg, who had been trained by Boyle, also thought it useful to compare "certain features of some of the (Indian) designs with those occurring in the rudimentary drawings of white children" (529900:33).

- 47. 308020.
- 49. 308022.
- 49. 308024.
- 50. see 018400 and 018500.
- 51. 018520:110.
- 52. 018520:118,120,122,134,135.
- 53. 018520:134.
- 54. 018520:122. Berlin listed J.W. Powell, the former director of the Bureau of American Ethnology, among those who allegedly advocated this idea.
- 55. 512960. Aside from this contribution on pipes published in 1905, 5 st also prepared an article on pipestone in 1910 (512965), a monograph on tobacco in 1911 (512970) and, of course, his magnum opus of 1934 (513000).
- 56. 512960:78.
- 57. 512960:124.
- 58. 512960:82-83.
- 59. Articles and books exclusively on the Amerindian pipe/ tobacco/smoking complex published between 1900 and 1919 include: 005480; 005540; 005590; 018520; 067020; 093000; 108500; 134030; 200330; 205310; 258610; 258612; 258617; 258620; 258622; 258624; 287500; 308020; 308022; 308024; 336030; 339600; 339605; 339610; 413700; 422800; 438700; 512960; 512965; 512970.
- 60. 336030.
- 61. e.g., 005990; 188640; 199500; 368450; see also 050100 and 511400.
- 62. see pages 409ff.
- 63. 368450.
- **64.** 368450:22.

- 65. 368450:140.
- 66. 368450:141.
- 67. 188640.
- 68. 074600; see also 188640:31.
- 69. 188640:23-26.
- 70. 188640:49.
- 71. 188640:51-52.
- 72. 188640:51-52.
- 73. 188640:52-53.
- 74. see Chapter Eight, passim.
- 75. 010500:230.
- 76. 308000.
- 77. 521000.
- 78. 521000:I:102-191; see also 050650:I:7.
- 79. 451500.
- 80. 470500.
- 81. 308000.
- 82. see Chapter Eight.
- 83. 521000:I:168-178.
- 84. 521000:I:184-189.
- 85. 521000:II:94.
- 86. our Plate is based on 521000:II: opposite page 92. Wiener appears to have ignored Edwin Barber's article (published in 1879) in which these same pipes were dated to the seventeenth and eighteenth century (see 011070).
- 87. 521000:II:196-197.
- 88. 087000:178-179.
- 89. 087000:184.
- 90. 521300:83.

- 91. 088200:94.
- 92. 315500:482.
- 93. 088000. Daniel Wilson had already alluded to the philological evidence in the mid-nineteenth century. "Nothing," he wrote, "more clearly proves the antiquity and universality of the use of tobacco throughout the whole continent of America, than the totally distinct and diverse names by which it is designated in the various languages of the Indian tribes" (528250:II:2). Elsewhere the same author noted that "the terms existing in the widely diversified native vocabularies are...irreconcilable with the idea of the introduction of tobacco as a recently borrowed novelty among the northern tribes of the American continent" (528200:4; 528250:II:29).
- 94. 420000:398.
- 95. 089300:245.
- 96. 280500; Ralph Linton was the Assistant Curator of North American Ethnology. One wonders whether his interest in tobacco was in any way connected to the intriguing story told by his biographers. Apparently "he was christened Rolfe after a remote ancestor, John Rolfe, who married Pocahontas, but since this odd name caused confusion when he entered school, he adopted the more familiar name of Ralph" (280480:5-6). As we have seen (pages 136-137) John Rolfe played one of the most important roles in the history of tobacco, having introduced and promoted the English cultivation of the plant in America.
- 97. 296500; J. Alden Mason was the former Assistant Curator of Mexican and South American Archaeology and one of the many distinguished students of Franz Boas.
- 98. 267400; 267500; 267700; 280300.
- 99. 280300.
- 100. 267800; 280400; 312500; 312700.
- 101. 267800.
- 102. 088000:48.
- 103. 280500:1.
- 104. see page 397.
- 105. quoted in 501400:44.
- 106. 501400:45.

- 107. 088000.
- 108. 521310.
- 109. 386500; 452500.
- 110. 452492.
- 111. Friederici in 452500:570.
- 112. 452492; see also 452490.
- 113. 452500:580 (my translation).
- Wiener was an influential 114. figure with a prestigious reputation. He was the author of A Commentary to the Germanic Laws and Mediaeval Documents, Contributions toward a History of Arabico-Gothic Culture, History of Yiddish Literature, History of the Contemporary Russian Drama, Anthology of Russian Literature and Interpretation of the Russian people. He had translated the works of Tolstoy and contributed to German, Russian, French, English and It is also clear that he was widely American journals. read in American archaeology and had an extensive knowledge of sixteenth-century historical sources.
- 115. 369700.
- 116. For general surveys of the history of the intellectual climate of this period see 187417; 254425; 292980.
- 117. 122200.
- 118. 287500.
- 119. Articles and books exclusively on the Amerindian pipe/ tobacco/smoking complex published in the 1920s include: 021340; 053690; 061000; 073800; 078485; 088000; 089300; 160000; 163000; 167000; 201000; 241200; 258627; 280500; 296500; 315500; 368500; 369000; 415000; 420000; 421700; 429500; 430000; 432000; 433600; 434000; 452490; 452492; 485000; 503300; 504450; 513360; 521310; 524000.
- 120. 021340:39.
- 121. 503300.
- 122. 185250.
- 123. 185250:198-199.
- 124. 103000. The popularity of the work may be partly explained by a public impression that the founder of a famous pipe-manufacturing company might be better qualified to

write on the subject than the arm-chair intellectuals, whose tiresome arguments were often contradictory.

- 125. 103000:25. An effort to trace the anthropological source cited by Dunhill was not met with success.
- 126. 103000:37,133.
- 127. 103000:45-50.
- 128. Articles and books exclusively on the Amerindian pipe/ tobacco/smoking complex published in the 1930s include: 005655; 005657; 009600; 057450; 064200; 083050; 089000; 108630; 159500; 168200; 185900; 201400; 223487; 292500; 310350; 371480; 417065; 419800; 513000; 513010; 524800.
- 129. 512960; 512970.
- 130. 513000.
- 131. 308000.
- 132. 513000:I:125-129,355-378.
- 133. 513000:II:482-995.
- 134. 513000:I:131.
- 135. 513000:I:157,170,291-292.
- 136. For contemporary reviews of West's monograph see 083050 and 310350.

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- 137. e.g., 076500:26-30; 122200:2.
- 138. e.g., 076500:29-31; 122200:8.
- 139. e.g., 050650:I:27; 122200:6; our Plate is based on 449500.
- 140. 076500.
- 141. 122200.
- 142. 122200:6.
- 143. 513000.
- 144. 050650.
- 145. 050650:I:6.
- 146. 050650:I:8.
- 147. 050650:I:13.



148. 050650:I:17.

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149.	Articles	and bo	oke eve	lusively d	on the	Amerindia	n ntna/
147.				published		e 1940s	an pipe/ include:
				053220;		053700;	
				064600;		110950;	179800;
				202200;		209700;	223500;
		271050;				322200;	
	409770;	416750;	453200;	469290;		503420;	503421;
	513400;	513500;	513505;	543500.	·	•	•
	Articl	es and 1	books exc	clusively	on the		Lan pipe/
				published		e 1950s	include:
	005660;	011050;	054000;	064220;		086800;	•
	134920;	223700;	240000;	253500;		280000;	
	312865;	316180;	324500;	336100;		404750;	
	449500;	453500;	454350;	467000;	474415;	518300;	543600;
	546500.					<b>.</b>	·
	tobaggo	es and l	DOOKS EXC	clusively	on the		an pipe/
	005663	005665;	Comptex	published		e 1960s	include:
		050540;				011700;	
		116700;				076900; 138000;	103700; 152940;
		179830;				241300;	
	306740;	306750;	315900	322300;		356280;	
	357700	369100;	369150:	369200;		371650;	
		420300;		422400;		441180;	
		512100;			190900,		4411007
	Articles and books exclusively on the Amerindian						lan pipe/
	tobacco/	smoking	complex	published	in the	e 1970s	include:
	005678;	005679;	005680;	005681;		005685;	
		005697;		010950;		017150;	
		053150;		073600;	075405;	075408;	
		075415;		075421;	075425;	075428;	078370;
		116500;		118600;		138500;	
	143000;		152900;	153400;		153421;	
		153427;		177900;		187440;	
		201430;		223130;	•	223400;	
		241700;				297000;	
	304300;	•	312782;	312783;		312869;	312989;
	312990; 368300;	•	316300; 382400;	320050;	334000;	336220;	355050;
	412700;		418400;	384000; 419000;	405700;		411000;
	441200;	465500;	466000;	469200;	•	421900;	441000;
	475000;	•	485900;	486000;		469300; 488000;	471600; 488500;
	500850,		505000;	505100;	521500;		546000;
		560100;		505100,	5215007	521700;	5400007
	Articles and books exclusively on the Amerindian pi						ian nine/
	tobacco/smoking complex published				in the 1980s include:		
	002400;	-	005778;	005782;		005810;	005820;
	007300;	011010;	023000;	047000;		054350;	0£8200;
	074930;	075510;	077250;	079000;		110200;	118800;
	119600;	131847;	131857;	131858;		159800;	168600;
	168601;	168650;	178930;	179100;		184500;	187500;
	187520;	223750;	230000;	254407;		301000;	302000;

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<u>و</u> الأربية 302200; 302500; 303340; 310230; 338000; 357350; 357351; 408450; 416980; 418500; 421500; 450000; 453120; 469140; 469650; 471800; 488200; 488300; 500000; 500500; 500607; 500630; 521830; 560300; 560400.

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- 150. 449500.
- 151. 197100:1.
- 152. 109000:16.
- 153. 179450:1.
- 154. 315500:483; see also 241600:32.
- 155. 315500:487-488.
- 156. 542000:38; 542005:59-60.

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157. 543800:3-4.

## Bibliography

- 000600 Abbott, Charles. C. 1876 American-Indian Stone Tubes and Tobacco-Pipes. Nature 14:154-156.
- 000610 Abbott, Charles. C. 1879 Smoking-Pipes of Stone. Report upon United States Geographical Surveys West of the One Hundredth Meridian, Vol. VII. - Archaeology, edited by F.W. Putnam, pp.124-134. Washington.
- 000615 Abbott, Charles. C. 1881 Primitive Industry: Or Illustrations of the Handiwork, in Stone, Bone and Clay, of the Native Races of The Northern Atlantic Seaboard of America. Salem, Massachusetts.
- 000700 Abler, Thomas S. 1964 Pipes and Pottery of the Du Bay Site. The Wisconsin Archeologist 45(3).
- 002000 Adair, James 1775 The History of the American Indians... London.
- 002400 Adams, Nick 1986 Historic Iroquois Pipes Discovered at Fort Frontenac. Ontario Historical Society Bulletin 49: 5.
- 002500 Adamson, Hans Christian 1941 Lands of New World Neighbors. McGraw-Hill, New York.
- 002900 Akehurst, B.C. 1968 Tobacco. Humanities Press, New York.
- 002950 Akweks, Aren (pseud. Ray Fadden) 1947 **The Great Gift, Tobacco.** Akwesasne Counselor Organization, St. Regis Mohawk Reservation, Hogansburg, New York.
- 003500 Alberti, Henry Christian 1743 De Tabaci Fumum Sugente Theologo, Ob es einem Theologo nothig und gesund den Toback zu rauchen? Halle-Magdeburg.
- 004000 Albrecht, Josephine F. 1972 Caleb Pusey House - III: History Hidden in the Earth. Bulletin of the Archaeological Society of Delaware (n.s.) no. 9.
- 005000 Alexander, L.T. 1972 A Unique "TD" Clay Pipe. Bulletin of the Archaeological Society of Delaware (n.s.) no. 9.

- 005002 Alexander, L.T. 1979 Clay Pipes from the Buck Site in Maryland. In **The Archaeology of the Clay Tobacco Pipe**, vol. 2, edited by Peter Davey, pp. 37-61. B.A.R. International Series 60.
- 005003 Alexander, L.T. 1983 More Light on the Theory of Dating Clay Pipes by Measuring Stem Hole Diameters. In **The Archaeology of the Clay Tobacco Pipe**, vol. 8 (America), edited by Peter Davey, pp. 235-244. B.A.R. International Series 175.
- 005005 Alexander, L.T. 1986 Clay Pipes with Irish Affiliations. In Historic Clay Tobacco Pipe Studies, vol. 3, edited by Byron Sudbury, pp. 69-75. Ponca City, Oklahoma.
- 005010 Alexander, Michael (editor) 1976 Discovering the New World based on the works of Theodore de Bry. Harper and Row, New York.
- 005045 Alsop, George 1666 A Character of the Province of Mary-land... Also, A small Treatise on the wilde and naked Indians (or Susquehanokes) of Mary-land, their Customs, Manners, Absurdities, and Religion. London.
- 005050 Alter, J. Cecil 1962 Jim Bridger. University of Oklahoma Press, Norman.
- 005070 Alvord, Clarence W. and L. Bidgood 1912 The First Explorations of the Trans-Allegheny Region by the Virginians, 1650-1674. Arthur H. Clark, Cleveland.
- 005133 Andersen, C.J. 1985 J.W. Scales and Andrew Wilson, Toronto: Two Promotional Clay Pipe Markings. Arch Notes 85(2): 5-8.
- 005250 Anonymous n.d. **Tobacco, Pipes and the Pleasures of Pipe Smoking.** Turmac Tabakmaatschappij Canada Ltd., Toronto.
- 005300 Anonymous n.d. **Up in Smoke** (Pamphlet). Royal Ontario Museum, Toronto.
- 005310 Anonymous 1885 The History and Mystery of Tobacco. Harper's New Monthly Magazine 11(61): 1-18.
- 005320 Anonymous 1856 Antiquity of Smoking. Chambers's Journal of Popular Literature 6(138): 128.
- 005360 Anonymous 1879 Publications. **Torrey Botanical Club Bulletin** 6:292.

Ľ

- 005380 Anonymous 1896 On the Antiquity of Tobacco-Smoking. MacMillan's Magazine 74: 289-299.
- 005385 Anonymous 1897 Evolution in Smoking Methods. Harper's Weekly, A Journal of Civilization 41(2135): 1163. (see also 005420)
- 005400 Anonymous 1898 Mexican Tobacco. Canadian Cigar and Tobacco Journal 4(7): 205.
- 005410 Anonymous 1898 Curiosities in the World's Tobacco Pipes. Canadian Cigar and Tobacco Journal 4(8): 227,229.
- 005420 Anonymous 1898 Evolution in Smoking. Canadian Cigar and Tobacco Journal 4(8): 233. (reprint of 005385)
- 005430 Anonymous 1899 Egyptian Tobacco. Canadian Cigar and Tobacco Journal 5(3): 111.
- 005440 Anonymous 1899 Historic Clay Pipes. Canadian Cigar and Tobacco Journal 5(7): 267.
- 005450 Anonymous 1899 Pre-Historic Smoking. Canadian Cigar and Tobacco Journal 5(8): 311.
- 005460 Anonymous 1899 Broseley Clay Pipes. Canadian Cigar and Tobacco Journal 5(12): 477.
- 005470 Anonymous 1900 The Pipe. Canadian Cigar and Tobacco Journal 6(6): 249.
- 005480 Anonymous 1900 Pipes Unknown in Cuba. Canadian Cigar and Tobacco Journal 6(6): 251.
- 005490 Anonymous 1900 Use of Tobacco. Canadian Cigar and Tobacco Journal 6(7): 257.
- 005500 Anonymous 1900 The Anti-Tobacs at Paris. Canadian Cigar and Tobacco Journal 6(7): 289.
- 005510 Anonymous 1900 Pipes of All Peoples. Canadian Cigar and Tobacco Journal 6(8): 351.

- 005530 Anonymous 1900 A Short History of Tobacco. Canadian Cigar and Tobacco Journal 6(12): 538.
- 005530 Anonymous 1901 Anti-Tobacconists. Canadian Cigar and Tobacco Journal 7(2): 79,81.
- 005540 Anonymous 1901 Pipes Smoked by Aztecs. Canadian Cigar and Tobacco Journal 7(5): 237.
- 005550 Anonymous 1901 About Clay Pipes. Canadian Cigar and Tobacco Journal 7(5): 239,241.
- 005560 Anonymous 1901 Some Tobacco History. Canadian Cigar and Tobacco Journal 7(6): 285,287.
- 005570 Anonymous 1901 The Musical Tobacco Pipe of Japan. Canadian Cigar and Tobacco Journal 7(7): 323.
- 005580 Anonymous 1901 The Origin and Production of Pipes. Canadian Cigar and Tobacco Journal 7(7) 327.
- 005590 Anonymous 1901 A Curio of a Pipe. Canadian Cigar and Tobacco Journal 7(9): 500a.
- 005595 Anonymous 1902 Tobacco Traditions. Scientific American Supplement 54(1391): 22288-22289.
- 005600 Anonymous 1902 They "Pop" With a Pipe. Canadian Cigar and Tobacco Journal 8(3): 135.
- 005610 Anonymous 1907 The Indian Authorship of Wisconsin Antiquities. Wisconsin Archeologist 6(4): 167-256.
- 005630 Anonymous 1921 No Smoking in Shakespeare. The Literary Digest 69(3): 24-25.
- 005655 Anonymous 1932 Arti-facts and Arguments (Indian Smoking Pipe). Pennsylvania Archaeologist 3(1): 16.

- 005657 Anonymous 1933 Indian Pipes Found in Bradford County and on Exhibition in the Tioga Point Museum, Athens, Pennsylvania. **Pennsylvania Archaeologist** 3(3): cover.
- 005660 Anonymous 1958 Interesting Wisconsin Specimens: Hopewell Pipe. The Wisconsin Archeologist 39(2): 154.
- 005663 Anonymous 1960 Interesting Wisconsin Specimens: Pipe. The Wisconsin Archeologist 41(3): 74.
- 005665 Anonymous 1962 Interesting Wisconsin Specimens: Tube Pipe. The Wisconsin Archeologist 43(1): 26.
- 005667 Anonymous 1966 Indians of Ontario. Department of Indian Affairs and Northern Development, Ottawa.
- 005670 Anonymous 1968 Interesting Wisconsin Specimens: Disk Pipe. The Wisconsin Archeologist 49(3): 148.
- 005672 Anonymous 1969 Fort Ancient Pipes from the Good Collection. Ohio Archaeologist 19(3): 89.
- 005678 Anonymous 1971 (Illustration and description of pipe). Ohio Archaeologist 21(1): cover, 296.
- 005679 Anonymous 1971 (Illustration and description of pipe). Ohio Archaeologist 21(2): cover, 1.
- 005680 Anonymous 1971 (Illustration and description of pipe). Ohio Archaeologist 21(3): cover, 1.
- 005681 Anonymous 1971 (Illustration and description of pipe). Ohio Archaeologist 21(4): cover, 1.
- 005684 Anonymous 1972 (Illustration and description of pipe). Ohio Archaeologist 22(1): cover, 1.
- 005685 Anonymous 1972 (Illustration and description of pipe). Ohio Archaeologist 22(3): cover, 3.

- 005686 Anonymous 1972 (Illustration and description of pipe). Ohio Archaeologist 22(4): cover, 3.
- 005696 Anonymous 1975 (Illustration and description of pipes). Ohio Archaeologist 25(2): cover, 4.
- 005697 Anonymous 1975 (Illustration and description of pipe). Ohio Archaeologist 25(4): cover, 3.
- 005730 Anonymous 1978 (Illustration and description of pipe). Ohio Archaeologist 28(3): 3, back cover.
- 005760 Anonymous 1981 **Pipes of the Iroquois** (Pamphlet). Royal Ontario Museum, Toronto.
- 005778 Anonymous 1983 (?) The Earliest Pipes of New York and New England, 500AD -1676 AD. U.S. Tobacco Museum, exhibit literature.
- 005780 Anonymous 1983 **The History of Smoking Pipes.** Encyclopaedia Britannica Library Research (unpublished manuscript).
- 005782 Anonymous 1983 Whatever Happened to the Cigar Store Indian? Marketing and Development in Ontario Agriculture Autumn (1983): 5.
- 005784 Anonymous 1983 **Prehistoric Ceremonial Indian Pipes of the Tennessee Region.** Museum of Tobacco Art and History, exhibit literature.
- 005790 Anonymous 1983 **The History of Smoking Tobacco and Hemp.** Encyclopaedia Britannica Library Research Service (unpublished manuscript).
- 005810 Anonymous 1984 Historic Catlinite Pipe Indian-Artifact Magazine 3(4): 20.
- 005813 Anonymous 1985 Pipe Smokers Share a Rich Tradition. **Pipe Smoker** Winter (1985): 6-9, 26.
- 005820 Anonymous 1987 Eskimo Pipe on Auction Block. Anthropology Today 3(1): 27.

- 005990 Apperson, G.L. 1914 **The Social History of Smoking.** Martin Secker, London (republished in 1916 by G.P. Putnam's Sons, New York).
- 007000 Aquila, Richard 1983 The Iroquois Restoration: Iroquois Diplomacy on the Colonial Frontier, 1701-1754. Wayne State University Press, Detroit.
- 007300 Arcand, Bernard, M. Laberge, and S. Vincent 1980 L'Imagèrie des Amérindiens: Le passage à tabac. Recherches Amérindiennes au Québec 10(3): 205-208.
- 007500 Arciniegas, German 1986 America in Europe: A History of the New World in Reverse. Harcourt Brace Jovanovich, New York.
- 008000 Arents. George Jr. 1938 Books, Manuscripts and Drawings Relating to Tobacco From the Collection of George Arents, Jr. (descriptive notes by Jerome E. Brooks). Library of Congress, Washington, DC.
- 009000 Arents, George Jr. 1938 Early Literature of Tobacco. Library of Congress, Washington, DC. (see also 009010)
- 009010 Arents, George Jr. 1938 Early Literature of Tobacco. South Atlantic Quarterly 37(2): 97-107. (see also 009000)
- 009013 Arents, George Jr. 1939 The Seed from Which Virginia Grew. William and Mary College Quarterly Historical Magazine (2d. ser.) 19: 123-129.

Arents, George Jr. see also 050650

- 009300 Arese, Count Francesco 1934 A Trip to the Prairies and in the Interior of North America (1837-1838). Translated by Andrew Evans. The Harbor Press, New York.
- 009600 Ariss, Robert 1939 Distribution of Smoking Pipes in the Pueblo Area. New Mexico Anthropologist 3: 53-57.

Armstrong, B.G. see 511000

010020 Arthurs, David W. 1980 Manitou Mounds. Ontario Ministry of Culture and Recreation, Archaeological Research Report 13: 97-112.

- 010450 Atkinson, D.R. 1986 English West Country Pipes of Ca. 1680-1730. In **Historic Clay Tobacco Pipe Studies**, vol. 3, edited by Byron Sudbury, pp. 111-123. Ponca City, Oklahoma.
- 010500 Atwater, Caleb 1820 Description of the Antiquities Discovered in the State of Ohio and Other Western States. Transactions and Collections of the American Antiquarian Society 1: 105-267. (Reprinted in 1973 by AMS Press, New York)
- 010580 Axtell, James 1985 The Invasion Within: The Contest of Cultures in Colonial North America. Oxford University Press, New York.
- 010600 Axton, W.F. 1975 Tobacco and Kentucky. The University Press of Kentucky, Lexington, Kentucky.
- 010620 Ayto, Eric G. 1979 Clay Tobacco Pipes. Shire Publications, Album 37.
- 010650 Baba, Moses Osamu 1949 Smoking Among the Ainu. Man 49: Plate L, 97-100.

÷

- 010660 Baby, Raymond S. 1969 An Adena Effigy Pipe. Ohio Archaeologist 19(1): 16-17.
- 010850 Bailey, L.H. (editor) 1914 **The Standard Cyclopedia of Horticulture,** 6 volumes. Macmillan, New York.
- 010870 Baillard, Edme (pseud. for Jean Royer de Prade) 1668 Discourse du tabac, ou il est traité particulièrement du tabac en poudre. Paris. (reissued as 084050)
- 010880 Bain, A.W. 1836 Tobacco: Its History and Associations. n.p.
- 010900 Bain, John Jr. 1896 **Tobacco in Song and Story.** New York. (republished by the New York Public Library in 1953, as Arents Tobacco Collection Publication no. 4).
- 010930 Bakeless, Katherine and J. Bakeless 1957 Explorers of the New World. G. Bell and Sons, London.
- 010950 Baker, Dana 1975 A Tubular Pipe. Ohio Archaeologist 25(3): 34.
- 010955 Balde, Jakob 1658 Die Truckene Trunkenheit. Nürnberg.

- 010958 Baldwin, C.C. 1888 Indian Narrative of Judge Hugh Welch, of Green Springs, Seneca and Sandusky Counties, Ohio. Western Reserve Historical Society Tract 50: 105-110.
- 010990 Baldwin, Gordon C. 1970 Indians of the Southwest. G.P. Putnam's Sons, New York.
- 011003 Baldwin, John 1975 A Restored Pipe. Ohio Archaeologist 25(1): 7.
- 011010 Ealdwin, John 1984 Prehistoric Wood Duck of the Grand River. Indian-Artifact Magazine 3:24-25,57.

Banister, John see 118420

- 011050 Earbeau, Marius 1953 Tobacco, A Peace-maker. Canadian Geographic Journal 47(3): 106-115.
- 011053 Barbeau, Marius and Clifford Wilson 1944 Tobacco for the Fur Trade. The Beaver Outfit 274: 36-39.
- 011060 Barber, Edwin A. 1879 Antiquity of the Tobacco-Pipe in Europe, Part 1 - Great Britain. The American Antiquarian 2(1): 1-8.
- 011070 Barber, Edwin A. 1879 Antiquity of the Tobacco-Pipe in Europe. Part II -Switzerland. The American Antiquarian 2(2): 117-122.
- 011075 Barber, Edwin A. 1882 Mound Pipes. The American Naturalist 16: 265-281.
- 011080 Barber, Edwin A. 1883 Catlinite: Its Antiquity as Material for Tobacco Pipes. **The American Naturalist** 17: 745-764.
- 011100 Barber, Edwin A. 1886 Collectors and Collections. The American Antiquarian and Oligental Journal 8: 38-41.
- 011200 Barber, Edwin A. 1886 Collectors and Collections: Typical Pipes in Various Collections. The American Antiquarian and Oriental Journal 8: 112-113.
- 011300 Barber, Edwin A. (editor) 1886 The Museum: Collectors and Collections. The American Antiquarian and Oriental Journal 8: 1

- 011500 Barber, Edwin A. 1886 Pipes among the Pueblos. The American Antiquarian and Oriental Journal 8: 372-373.
- 011550 Barbour, Philip L. (editor) 1969 The Jamestown Voyages Under the First Charter 1606-1609, 2 volumes. Cambridge University Press, Cambridge.
- 011552 Barbour, Philip L. 1969 Pocahontas and Her World. Houghton Mifflin, Boston.
- 011640 Barclay, William 1614 Nepenthes, or the Vertues of Tabacco. Edinburgh.
- 011700 Barka, Norman F. 1968 A Polished Stone Pipe From Lancaster County, Virginia. Quarterly Bulletin of the Archaeological Society of Virginia 23: 50-51.
- 011870 Barré, Nicolas 1557 Copie de quelques letres sur la navigation du Cheuallier de Villegaignon es terres de l'Amerique oultre l'AEquinoctial. Paris.
- 011900 Barrie, James M. 1890 My Lady Nicotine. London. (republished in 1926 by Hodder and Stoughton, London)

Bartram, John see 185860 and 185862

- 013440 Baxter, James Phinney 1906 A Memoir of Jacques Cartier Sieur de Limoilou. His Voyages to the St. Lawrence. A Bibliography and a Facsimile of the Manuscript of 1534 with Annotations, etc. Dodd, Mead and Co., New York.
- 013500 Beauchamp, William M. 1882 Indian Pipes. The American Antiquarian and Oriental Journal 4(4): 326-329.
- 013800 Beauchamp, William M. 1887 The Relics of the Iroquois. The American Antiquarian and Oriental Journal 9(1): 37-39.
- 015000 Beauchamp, William M. 1889 Indian Tobacco. Journal of American Folk-Lore 2(6): 234.
- 015200 Beauchamp, William M. 1889 The Rarer Indian Relics of Central New York. The American Antiquarian 11.
- 015545 Beauchamp, William M. 1892 The Early Religion of the Iroquois. The American Antiquarian and Oriental Journal 14(6): 344-349.

- 015770 Beauchamp, William M. 1902 Metallic Implements of the New York Indians. New York State Museum Bulletin 55 (Archaeology 7).
- 015800 Beauchamp, William M. 1903 Metallic Ornaments of the New York Indians. New York State Museum Bulletin 73 (Archaeology 8).
- 016000 Beauchamp, William M. 1905 A History of the New York Iroquois. New York State Museum Bulletin 78 (Archaeology 9). University of the State of New York Bulletin 329: 125-461.
- 016100 Beauchamp, William M. 1907 Civil, Religious and Mourning Councils and Ceremonies of Adoption of the New York Indians. New York State Museum Bulletin 113: 341-451. New York State Education Department Bulletin 402.
- 016150 Beauchamp, William M. 1916 Moravian Journals relating to Central New York, 1745-66. Onondaga Historical Association, The Dehler Press, Syracuse, New York.
- 016500 Beaumier, John Paul and Lewis Camp 1980 The Pipe Smoker. Harper and Row, San Francisco.
- 016700 Beaumont, John 1602 **The Metamorphosis of Tabacco.** London. (reprinted in 1971 by Da Capo Press, Amsterdam)
- 016770 Becker, L. 1882 Zur Ethnologie der Tabakspfeife. Die Natur p. 257.
- 016800 Beinhart, E.G. 1941 Nicotiana rustica in New Mexico. Science 94(2449): 538-539.
- 017150 Bender, Harold D. 1971 A Sandstone Effigy Pipe. Ohio Archaeologist 21(4): 14.
- 017300 Bennett, Edward 1620 (?) A Treatise Touching the Importation of Tobacco Out of Spaine. n.p. (reprinted in 1977 by Walter J. Johnson, Amsterdam)
- 018050 Benzoni, Girolamo 1565 La Historia del Mondo Nuovo. Venice.
- 018400 Berlin, Alfred F. 1886 Fraudulent Objects of Stone. The American Antiquarian and Oriental Journal 8: 97-101.

- 018500 Berlin, Alfred F. 1886 Fraudulent Stone Objects, and the Gass Correspondence. The American Antiquarian and Oriental Journal 8: 228-230.
- 018520 Berlin, Alfred F. 1905 Early Smoking Pipes of the North American Aborigines. Proceedings and Collections of the Wyoming Historical and Geological Society 9: 107-136.
- 018600 Berner, J. 1969 Wachtel Collection (Pipes). Ohio Archaeologist 19(2): 74-75.
- 018650 Best, Joel 1979 Economic Interest and the Vindication of Deviance: Tobacco in Seventeenth Century Europe. The Sociological Quarterly 20: 171-182.
- 018685 Beverley, Robert 1705 The History and Present State of Virginia. London.
- 018690 Bewley, T. 1986 Abstract of: Over-Reaction to Drug Dependence--A Changing Menace. Smoking and Health Bulletin Jul/Aug: 301.
- 018800 Bibby, Cyril 1959 T.H. Huxley: Scientist, Humanist and Educator. Watts, London.
- 020000 Biggar, H.P. 1922-1936 The Works of Samuel de Champlain, 6 volumes. The Champlain Society, Toronto.
- 020500 Biggar, H.P. 1924 **The Voyages of Jacques Cartier.** Publications of the Public Archives of Canada No. 11. F.A. Acland, Ottawa.
- 021300 Billings, E.R. 1875 Tobacco: Its History, Varieties, Culture, Manufacture and Commerce. Hartford, Connecticut.
- 021320 Billington, Ray A. 1981 Land of Savagery Land of Promise. W.W. Norton and Company, New York.
- 021340 Birket-Smith, Kaj 1929 Drinking Tube and Tobacco Pipe in North America. Ethnologische Studien (Leipzig) 1929:29-39.
- 021350 Birmingham, Robert A. 1982 Historical Archaeological Investigations at the Stephen Mack House. The Wisconsin Archeologist 63(2): 67-116.

- 021450 Bishop, W.J. 1949 Some Early Literature on Addiction, With Special Reference to Tobacco. **The British Journal of Addiction** 46: 49-65.
- 021800 Black, Peter W. 1984 The Anthropology of Tobacco Use: Tobian Data and Theoretical Issues. Journal of Anthropological Research 40(4): 475-503.
- 021900 Blair, David Hunter 1939 The Evolution of Smoking. The Empire Review 1939: 83-89
- 022000 Blair, Emma Helen (editor) 1911-1912 The Indian Tribes of the Upper Mississippi Valley and Region of the Great Lakes, 2 volumes. Arthur H. Clark, Cleveland, Ohio. (Reprinted in 1969 by Kraus Reprint, New York)
- 022400 Blaisdell, Richard 1979 Ireokwa (Tobacco People). Unpublished M.A. thesis, California State University, Long Beach.
- 023000 Blakeslee, Donald 1981 The Origin and Spread of the Calumet Ceremony. American Antiquity 46: 759-768.
- 023700 Bland, Edward 1651 The Discovery of New Brittaine. London.
- 026300 Blum, Richard H. 1970 A Background History of Drugs. In Society and Drugs, Volume 1 (Social and Cultural Observations), edited by Richard H. Blum, pp. 3-23. Jossey-Bass, San Francisco.
- 026305 Blum, Richard H. 1970 A History of Tobacco. In Society and Drugs, Volume 1 (Social and Cultural Observations), edited by Richard H. Blum, pp. 87-97. Jossey-Bass, San Francisco.
- 026800 Bolton, Herbert E. 1966 Anza's California Expeditions. Russell and Russell, New York.
- 027000 Bolton, Reginald P. 1909 The Indians of Washington Heights. Anthropological Papers of the American Museum of Natural History 3.
- 028400 Bolus, Malvina (editor) 1972 People and Pelts, Selected Papers: Second North American Fur Trade Conference. Peguis, Winnipeg.

- 028500 Bondeson, Wolmar E. 1972 Tobacco From A Tiahuanacoid Culture Period. In A Medicine-man's Implements and Plants in a Tiahuanacoid Tomb in Highland Bolivia, edited by S. Henry Wassén, pp. 177-184. Etnografiska Studier 32, Goteborg.
- 028670 Boorsch, Suzanne 1976 America in Festival Presentations. In **First Images of America: The Impact of the New World on the Old,** edited by Fredi Chiappelli, pp. 503-515. University of California Press, Berkeley.
- 028700 Borgatta, Edgar F. 1968 Some Notes on the History of Tobacco Use. In Smoking, Health, and Behavior, edited by F. Borgatta and R.R. Evans, pp. 3-11. Aldine, Chicago.
- 028800 Bossu, Jean-Bernard 1962 **Travels in the Interior of North America, 1751-1762,** edited by S. Feiler. University of Oklahoma Press, Norman, Oklahoma.
- 028900 Bottoms, Edward 1963 An Effigy Pipe From Hertford County, North Carolina. Quarterly Bulletin of the Archaeological Society of Virginia 17: 49.
- 029000 Boucher, Pierre 1664 **Histoire Véritable et Naturelle des Moers et Productions du Pays de la Nouvelle-France, Vulgairement le Canada.** Paris. (Reprinted in 1964 by Société Historique de Boucherville. An English translation by E.L. Montizambert was published in 1883 by George E. Desbarats, Montreal)
- 029195 Bourque, Bruce J. and R.H. Whitehead 1985 Tarrentines and the Introduction of European Trade Goods in the Gulf of Maine. Ethnohistory 32: 327-341.
- 029250 Bowen, Willis Herbert 1938 The Earliest Treatise on Tobacco: Jacques Gohory's "Instruction sur l'Herbe Petum." **Isis** 28: 349-363.
- 030100 Boyle, David 1888 Notes on Specimens: Clay Pipes. Annual Report of the Canadian Institute 1887: 22-24. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030105 Boyle, David 1888 Notes on Specimens: Stone Pipes. Annual Report of the Canadian Institute 1887: 25-30. Appendix to the Report of the Minister of Education of Ontario, Toronto.

- 030110 Boyle, David 1889 Notes on Specimens: Clay Pipes. Annual Report of the Canadian Institute 1888: 20-22. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030120 Boyle, David 1889 Notes on Specimens: Stone Pipes. Annual Report of the Canadian Institute 1888: 23-28. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030130 Boyle, David 1889 Notes on Specimens: Clay Pipes. Annual Report of the Canadian Institute 1889: 23-27. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030140 Boyle, David 1889 Notes on Specimens: Stone Pipes. Annual Report of the Canadian Institute 1889: 28-31. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030150 Boyle, David 1891 Notes on Specimens: Clay Pipes. Annual Report of the Canadian Institute 1890-91: 29-35. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030155 Boyle, David 1891 Notes on Specimens: Stone Pipes. Annual Report of the Canadian Institute 1890-91: 35-40. Appendix to the Report of the Minister of Fducation of Ontario, Toronto.
- 030160 Boyle, David 1892 Notes on Specimens: Clay Pipes. Annual Report of the Canadian Institute 1391: 26-28. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030170 Boyle, David 1892 Notes on Specimens: Stone Pipes. Annual Report of the Canadian Institute 1891: 29-33. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030180 Boyle, David 1893 Notes on Specimens: Clay Pipes. Annual Report of the Canadian Institute 1892-93: 15-16. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030190 Boyle, David 1893 Notes on Specimens: Stone Pipes. Annual Report of the Canadian Institute 1892-93: 16-19. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030200 Boyle, David 1895 Clay Pipes. In Notes on Primitive Man in Ontario pp. 32-40. Appendix to the Report of the Minister of Education of Ontario, Toronto.

• :

030210 Boyle, David 1895 Stone Pipes. In Notes on Primitive Man in Ontario pp. 48-55. Appendix to the Report of the Minister of Education of Ontario, Toronto.

6

- 030220 Boyle, David 1896 Notes on Specimens: Clay Pipes. Annual Archaeological Report for 1894-95, pp. 58-59. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030230 Boyle, David 1896 Notes on Specimens: Stone Pipes. Annual Archaeological Report for 1894-95, pp. 60-62. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030240 Boyle, David 1897 Notes on Specimens: Clay Pipes. Annual Archaeological Report for 1896-97, p. 51. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030250 Boyle, David 1897 Notes on Specimens: Stone Pipes. Annual Archaeological Report for 1896-97, pp. 51-53. Appendix to the Report of the Minister of Education of of Ontario, Toronto.
- 030260 Boyle, David 1898 Notes on Specimens: Clay Pipes. Annual Archaeological Report for 1897-98, pp. 17-20. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030270 Boyle, David 1898 Notes on Specimens: Stone Pipes. Annual Archaeological Report for 1897-98, pp. 21-22. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030280 Boyle, David 1898 Notes on Specimens: Clay Pipes. Annual Archaeological Report for 1898, p. 45. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030290 Boyle, David 1898 Notes on Specimens: Stone Pipes. Annual Archaeological Report for 1898, pp. 46-49. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030300 Boyle, David 1900 Notes on Specimens: Clay Pipes. Annual Archaeological Report for 1899, pp. 17-18. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030310 Boyle, David 1900 Notes on Specimens: Stone Pipes. Annual Archaeological Report for 1899, pp. 18-20. Appendix to the Report of the Minister of Education of Ontario, Toronto.

- 030320 Boyle, David 1901 Notes on Specimens: Stone Pipes. Annual Archaeological Report for 1900, p. 21. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030350 Boyle, David 1904 Who Made the Effigy Stone Pipes? Annual Archaeological Report for 1903, pp. 27-35. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030360 Boyle, David 1904 Working Methods: Unfinished Stone Pipes. Annual Archaeological Report for 1903, pp. 48-52. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030370 Boyle, David 1904 Working Methods: Finished Stone Pipes. Annual Archaeological Report for 1903, pp. 52-56. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030380 Boyle, David 1904 Notes on Specimens: Clay Pipes. Annual Archaeological Report for 1903, pp. 56-57. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030390 Boyle, David 1905 Notes on Specimens: Stone Pipes. Annual Archaeological Report for 1904, pp. 27-30. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030400 Boyle, David 1905 Notes on Specimens: Clay Pipes. Annual Archaeological Report for 1904, pp. 31-32. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030410 Boyle, David 1906 Notes on Specimens: Clay Pipes. Annual Archaeological Report for 1905, pp. 12-19. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030420 Boyle, David 1906 Notes on Specimens: Stone Pipes. Annual Archaeological Report for 1905, pp. 19-22. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 030430 Boyle, David 1907 Notes on Specimens: Stone Pipes. Annual Archaeological Report for 1906, pp. 24-27. Appendix to the Report of the Minister of Education of Ontario, Toronto.

- 030440 Boyle, David 1908 Notes on Specimens: Catlinite Pipes. Annual Archaeological Report for 1907, pp. 24-28. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 046500 Brackenridge, H.M. 1904 Journal of a Voyage up the River Missouri Performed in Eighteen Hundred and Eleven. In Early Western Travels 1748-1846, Volume 6, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 046505 Bradbury, John 1904 Travels in the Interior of America in the Years 1809, 1810, and 1811. In Early Western Travels 1748-1846, Volume 5, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 046510 Bradford, William 1963 Of Plymouth Plantation 1620-1647. Alfred A. Knopf, New York.
- 046520 Bradford, William and Edward Winslow 1622 Relation or Journall of the beginning and proceedings of the English Plantation setled at Plimoth in New-England. London.
- 046550 Bradley, James W. 1979 The Onondaga Iroquois: 1500-1655. A Study in Acculturative Change and Its Consequences. Unpublished Ph.D. Dissertation, Syracuse University, Syracuse, New York. (revised edition published by Syracuse University Press, 1987)
- 046560 Bradley, James W. 1987 Native Exchange and European Trade: Cross-Cultural Dynamics in the Sixteenth Century. Man in the Northeast 33: 31-46.
- 046600 Bradley, James W. and Gordon DeAngelo 1981 European Clay Pipe Marks from 17th Century Onondaga Iroquois Sites. Archaeology of Eastern North America 9: 109-133.
- 046740 Bragge, William 1880 Bibliotheca Nicotiana. Birmingham, England.
- C46765 Branstner, Susan M. 1985 Excavating a Seventeenth-century Huron Village. Archaeology 38(4): 58-59, 73.

Brant, Joseph see 454700

- 046800 Brasser, Ted J. 1978
  - Early Indian-European Contacts. In Northeast, edited by Bruce G. Trigger, pp. 78-88. Handbook of North American Indians, volume 15, William G. Sturtevant, general editor. Smithsonian Institution, Washington, D.C.
- 046805 Brasser, Ted J. 1978 Mahican. In Northeast, edited by Bruce G. Trigger, pp.198-212. Handbook of North American Indians, volume 15, William G. Sturtevant, general editor. Smithsonian Institution, Washington, D.C.
- 047000 Brasser, Ted J. 1980 Self-Directed Pipe Effigies. Man in the Northeast 19: 95-104.
- 047500 Brathwait, Richard 1617 The Smoaking Age or the Man in the Mist, with the Life and Death of Tobacco. London.
- 048020 Braudel, Fernand 1981 Civilization and Capitalism 15th - 18th Century. Volume I: The Structures of Everyday Life. Harper and Row, New York.
- 048021 Braudel, Fernand 1982 **Civilization and Capitalism 15th - 18th Century. Volume** 2: The Wheels of Commerce. Harper and Row, New York.
- 048500 Brecher, Edward M. 1972 Licit and Illicit Drugs, Little and Brown, Boston.
- 048700 Breen, T.F. 1985 **Tobacco Culture: The Mentality of the Great Tidewater Planters on the Eve of Revolution.** Princeton University Press, Princeton, New Jersey.
- 050100 Brennan, W.A. 1915 **Tobacco Leaves: Being a Book of Facts for Smokers.** George Banta, Menasha, Wisconsin.
- 050130 Brent, Peter 1981 Charles Darwin "A Man of Enlarged Curiosity." Heinemann, London.
- 050150 Brereton, John 1602 A Brief and true Relation of the Discoverie of the North part of Virginia. London.

Bridger, Jim see 005050

050400 Brinkley, S.H. 1879 Correspondence. American Antiquarian 2(2): 150-151.

- 050500 Brinton, D.G. 1887 Elephant Pipes. The American Antiquarian and Oriental Journal 9(1): 55.
- 050540 Britt, Claude Jr. 1969 An Unusual Steatite Pipe from Auglaize County, Ohio. **Ohio Archaeologist** 19(3): 90-91.
- 050546 Brittain, Jim 1985 Unique Finds (Pipes). Indian-Artifact Magazine 4(4): 61.
- 050560 Britton, Nathaniel L. 1901 Manual of the Flora of the Northern States and Canada. Henry Holt and Co., New York.
- 050580 Brodigan, Thomas 1830 A Botanical, Historical, and Practical Treatise on the Tobacco Plant. London.
- 050600 Brongers, Georg A. 1964 Nicotiana Tabacum: The History of Tobacco and Tobacco Smoking in The Netherlands. Theodorus Niemeyer, Groningen, Netherlands.
- 050650 Brooks, Jerome E. (editor) 1937-1952 Tobacco; Its History Illustrated by the Books, Manuscripts and Engravings in the Library of George Arents, Jr., 5 Volumes. The Rosenbach Company, New York.
- 050700 Brooks, Jerome E. 1952 **The Mighty Leaf: Tobacco Through the Centuries.** Little, Brown and Company, Boston.
- 050800 Brooks, Jerome E. 1975 Green Leaf and Gold: Tobacco in North Carolina. North Carolina Department of Cultural Resources, Division of Archives and History, Raleigh, North Carolina.

Brooks, Jerome E. (editor) see also 008000

- 051000 Brose, David S. 1967 The Custer Road Dump Site: An Exercise in Victorian Archaeology. Michigan Archaeologist 13(2): 37-128.
- 053000 Brose, David S. 1973 A Report on a Preliminary Archaeological Survey of Monroe County, Michigan. Michigan Archaeologist 19(1-2).
- 053150 Broughton, Paul L. 1972 Pipes and Smoking Customs of the Plains Amerindians. Anthropological Journal of Canada 10(4): 11-25.
- 053220 Brown, Allen 1945 Stone Tobacco Pipes. Hobbies 49: 110.

- 053225 Brown, Allen 1945 California's "Tube" Tobacco Pipes. Hobbies 50: 114.
- 053690 Brown, Charles E. 1928 Effigy Platform Pipe. Wisconsin Archeologist (n.s.) 8(1): 13-14.
- 053700 Brown, Charles E. 1944 The Pipe of Peace Ceremony Passes. Wisconsin Archeologist (n.s.) 25(3): 97-98.
- 053800 Brown, Ian W. 1979 Functional Group Changes and Acculturation: A Case Study of the French and the Indian in the Lower Mississippi Valley. Mid-Continental Journal of Archaeology 4(2): 147-165.
- 054000 Brown, Joseph E. 1953 The Sacred Pipe: Black Elk's Account of the Seven Rites of the Oglala Sioux. Penguin Books, New York.
- 054340 Bruce, J.C. 1853 The Roman Wall, an Historical and Topographical Description of the Barrier of the Lower Isthmus, Extending from the Tyne to the Solway. London.
- 054350 Bruchac, Joseph 1984 How Gluskabe Stole Tobacco (Abenaki). Parabola 9(2): 88-90.
- 054410 Brunet, J. 1700 Le bon usage du tabac en poudre. Paris.
- 057450 Burke, R.P. 1937 Sawonogi Pipes. Arrowpoints (Alabama Anthropological Society) 21(5-6): 41-46.
- 058000 Burpee, Lawrence J. (editor) 1908 York Factory to the Blackfeet Country: The Journal of Anthony Hendry 1754-55. Transactions of the Royal Society of Canada (third series) 1907-8, volume 1, section 2.
- 058010 Burpee, Lawrence J. (editor) 1927 Journals and Letters of Pierre Gaultier de Varennes de la Verendrye and His Sons. The Champlain Society, Toronto.
- 058600 Burrage, Henry S. (editor) 1906 Early English and French Voyages Chiefly from Eakluyt 1534-1608. Charles Scribner's Sons, New York.
- 059200 Bushnell, David I. Jr. 1907 Virginia--From Early Records. American Anthropologist (n.s.) 9:31-44.

- 059250 Bushnell, David I. Jr. 1935 The Manahoac Tribes in Virginia, 1608. Smithsonian Miscellaneous Collections 94(4). Smithsonian Institution, Washington.
- 059300 Butel-Dumont, Georges M. 1753 Memoires Historiques Sur La Louisiane..., 2 volumes. Paris.
- 059500 Butkus, Edmund 1973 A Spectacular Platform Pipe Find. Central States Archaeological Journal 20(2): 84-88.
- 059630 Butler, Ruth Lapham (translater/editor) 1934 Journal of Paul Du Ru (February 1 to May 8, 1700) Missionary Priest to Louisiana. The Caxton Club, Chicago.
- 060550 Byrd, William of Westover 1721 A Discourse Concerning the Plague. London.

Ŷ

- 060800 Cabeza de Vaca, Alvar Núñez 1542 La relación que dio Alvar Núñez Cabeza de Vaca. Zamora.
- 061000 Cadzow, Donald A. 1926 Peace-Pipe of the Prairie Cree. Indian Notes 3: 82-89. Museum of the American Indian, Heye Foundation, New York.
- 063300 Caldwell, Joseph 1952 The Archeology of Eastern Georgia and South Carolina. In Archeology of Eastern United States, edited by James B. Griffin, p. 312. University of Chicago Press, Chicago.
- 063330 Calella, P. Plácido de 1945 Tabaco en las Tribus Siona. **Amazonia Colombiana Americanista 3:** 39.
- 063357 Calver, W.L. 1931 Historical Clay Pipes. New York Historical Society Quarterly Bulletin 15(3).
- 063360 Cambron, James W. 1963 Flint "Fishhooks" and An Effigy Pipe. Journal of Alabama Archaeology 9(1): 36-37.
- 063460 Carpenter, Edmund S. 1947 A Remarkable Pipe from the Upper Allegheny. Pennsylvania Archaeologist 17: 36.
- 064100 Cartagena, Alberto de 1945 Datos Preliminares Sobre El Tabaco Entre Las Tribus Yukuna Y Mirana. Amazonia Colombiana Americanista 3: 39-41.

- 064200 Carter, John G. 1938 The Northern Arapaho Flat Pipe and the Ceremony of Covering the Pipe. Bureau of American Ethnology Bulletin 119: 73-102. Anthropological Papers 2. Smithsonian Institution, Washington.
- 064220 Carter, Loy 1952 Pipes From Loy Carter's Collection, Clarksville, Va. Quarterly Bulletin of the Archaeological Society of Virginia 7(1).
- 064225 Carter, Loy C. 1964 Late Tubular Clay Pipes From the Triangle Site. The Chesopiean 5: 135.

Carter, Robert see 316350

064235 Cartier, Jacques 1545 Brief recit, & succincte narration, de la nauigation faicte es ysles de Canada, Hochelaga & Saguenay. Paris.

Cartier, Jacques see also 013440 and 020500

- 064240 Carver, Jonathan 1778 **Travels Through the Interior Parts of North-America in the Years 1766, 1767, and 1768.** London. (Facsimile edition published in 1974 by Coles, Toronto; see also 355300)
- 064243 Carver, Jonathan 1779 A Treatise on the Culture of the Tobacco Plant. London.

Carver, Jonathan see also 355300

Casson, Dollier de see 076565

- 064450 Castetter, Edward F. 1943 Early Tobacco Utilization and Cultivation in the American Southwest. American Anthropologist 45(2): 320-325.
- 064600 Castiglioni, Arturo 1943 The Use of Tobacco Among the American Indians. Ciba Symposia 4: 1426-1435.
- 064601 Castiglioni, Arturo 1943 The Introduction of Tobacco In Europe. Ciba Symposia 4: 1436-1456.
- 064900 Catlin, George 1841 Manners, Customs, and Condition of the North American Indians, 2 volumes. London.

Catlin, George see also 118700

067020 Chamberlain, Alexander F. 1907 Kinnikinnick. In Handbook of American Indians North of Mexico, Volume 1, edited by F.W. Hodge, p. 692. Bureau of American Ethnology Bulletin 30.

Chaboillez, Charles J.B. see 201050

- 067540 Champlain, Samuel de 1613 Les Voyages de sieur de Champlain Xaintongeois, capitaine ordinaire pour le Roy, en la marine. Paris.
- 067545 Champlain, Samuel de 1619 Voyages et descouvertures faites en la Nouvelle France depuis l'année 1615 à la fin de l'année 1618. Paris.
- 067550 Champlain, Samuel de 1632 Les Voyages de la Nouvelle France occidentale, dicte Canada, faits par le Sieur de Champlain. Paris.
- 067555 Champlain, Samuel de 1859 Narrative of a Voyage to the West Indies and Mexico in the Years 1599-1602. Translated and edited by A. Wilmere and N. Shaw. Hakluyt Society, London.

Champlain, Samuel de see also 020000 and 267830

- 068200 Chapdelaine, Claude 1982 Les Pipes à plate-forme de la Pointe-du-Buisson: un système d'échanges à définir. **Recherches Amérindiennes au Québec** 12(3): 207-215.
- 063400 Chapman, Carl H. 1952 Culture Sequence in the Lower Missouri Valley. In Archeology of Eastern United States, edited by James B. Griffin, p. 139. University of Chicago Press, Chicago.
- 068550 Charlevoix, François Xavier de 1761 Journal of a Voyage to North America, 2 volumes. London. (republished in 1923 by the Caxton Club, Chicago)
- 068700 Château Dufresne n.d. Smoker's Paraphernalia (exhibit catalogue). Chateau Dufresne, Montreal.
- 068810 Chiappelli, Fredi (editor) 1976 First Images of America: The Impact of the New World on the Old, 2 volumes. University of California Press, Berkeley.
- 063830 Chiericato, Giovanni Maria 1703 Decisiones Miscellaneae. Venice.

14

- 068880 Chittenden, Hiram M. and A.T. Richardson (editors) 1969 Life, Letters and Travels of Father de Smet 1801-1873, 4 volumes. Arno Press and The New York Times, New York.
- 069300 Chute, Anthony 1595 Tabaco. The Distinct and Severall Opinions of the Late and Best Phisitions that have Written of the Divers Natures and Qualities Thereof. London.
- 069310 Chute, Anthony 1623 Beschrijvinge Van Het...Krvyt Tobacco. Rotterdam.

Chute, Anthony see also 229700

- 069500 Clare, Mary 1955 The Significance of the Pipe to the Gros Ventres of Montana. Unpublished M. Ed. Thesis, Montana State University, Missoula, Montana.
- 069600 Clark, Donald W. 1981 Prehistory of the Western Subarctic. In Subarctic, edited by June Helm, pp. 107-129. Handbook of North American Indians, Volume 6, William G. Sturtevant, general editor. Smithsonian Institution, Washington, D.C.
- 071000 Cleland, Charles E. 1972 The Matthews Site (20 CL 61) Clinton County, Michigan. Michigan Archaeologist 18(4).
- 071200 Cleland, Henry W. 1840 On the History and Properties Chemical and Medical of Tobacco. Glasgow.
- 071260 Clermont, Norman, C. Chapdelaine and G. Barre 1983 Le Site Iroquoien de Lanoraie: temoignage d'une maison-longue. Recherches Amérindiennes au Québec, Montreal.
- 073000 Cohn, Michael 1962 Stuart and Hanover -- Two Heraldic Pipes from Revolutionary War Sites in New York City. **Pennsylvania Archaeologist** 32(3-4): 97-98.
- 073600 Colby, Solon B. 1971 A New Hampshire Effigy Pipe. New Hampshire Archaeologist 16: n.p.
- 073700 Colden, Cadwallader 1922 The History of the Five Indian Nations of Canada (1727), 2 volumes. Allerton Book Co., New York.
- 073800 Cole, H.E. 1922 Three Unfinished Pipes. Wisconsin Archeologist (n.s.) 1: 57-58.

Bibliography

- 073850 Cole, Nathanael 1618 Preservatives Against Sinne. London.
- 073900 Colin, Antoine 1602 Histoire des Drogues. Lyon.
- 074600 Comes, Orazio 1900 Histoire, Géographie, Statistique du Tabac... Typographie Coopérative, Naples.
- 074930 Conner, Leland L. 1984 Pipestone: Sacred Ground of the Sioux. Indian-Artifact Magazine 3(3): 15,36.
- 075400 Converse, Robert N. 1969 Human Effigy Pipe from Mound City. Ohio Archaeologist 19(1): 4-5.
- 075405 Converse, Robert N. 1970 Two Fort Ancient Pipes. Ohio Archaeologist 20(2): 214-215.
- 075408 Converse, Robert N. 1971 An Engraved Sandstone Pipe. Ohio Archaeologist 21(2): 4.
- 075411 Converse, Robert N. 1971 A Fort Ancient Effigy Pipe. Ohio Archaeologist 21(4): 3.
- 075412 Converse, Robert N. 1971 A Rare Bat Effigy Pipe. Ohio Archaeologist 21(4): 29.
- 075415 Converse, Robert N. 1972. A Crane Effigy Pipe. Ohio Archaeologist 22(2): 25.
- 075418 Converse, Robert N. 1973 Another Remarkable Pipe. Ohio Archaeologist 23(4): 4-5.
- 075421 Converse, Robert N. 1974 A Sandstone Pipe From The Shipley Collection. Ohio Archaeologist 24(2): 26-27.
- 075425 Converse, Robert N. 1975 Two Belmont County Pipes. Ohio Archaeologist 25(1): 5.
- 075428 Converse, Robert N. Where Are They Today? (Pipes). Ohio Archaeologist 25(4): 23-25.
- 075495 Conway, Thor 1980 Point Aux Pins Archaeology: Woodland and Historic Components. Ontario Ministry of Culture and Recreation, Archaeological Research Report 13: 29-63.

665

٠.;

- 075510 Conway, Thor 1984 Rare Oneota Pipes From the Whitefish Island Site in Sault Ste. Marie, Ontario. Arch Notes 84(3): 15-17.
- 076400 Corlett, William T. 1935 The Medicine-Man of the American Indian and his Cultural Background. Charles C. Thomas, Springfield, Illinois.
- 076500 Corti, Count Egon Caesar 1931 A History of Smoking. George G. Harrap and Co., London.
- 076520 Cory, Rory 1987 A Nineteenth Century Wyandot Site on the Detroit River. Kewa (Newsletter of the London Chapter, Ontario Archaeological Society) 87(1): 11-19.
- 076550 Coues, Elliott (editor) 1900 On The Trail of a Spanish Pioneer. The Diary and Itinerary of Francisco Garcés... 1775-1776, 2 volumes. F.P. Harper, New York.
- 076560 Cox, Isaac J. (editor) 1922 The Journeys of Rene Robert Cavelier Sieur de LaSalle as Related by his Faithful Lieutenant, Henri de Tonty; His Missionary Colleagues, Fathers Zenobius Membre, Louis Hennepin and Anastasius Douay; His Early Biographer, Father Christian LeClercq; His Trusted Subordinate, Henri Joutel; and His Brother, Jean Cavelier; Together with Memoires, Commissions, etc., 2 volumes. Allerton Book Co., New York.
- 076565 Coyne, James H. (translator and editor) 1903 Exploration of the Great Lakes 1669-1670 By Dollier de Casson and De Bréhant De Galinée. Galinée's Narrative and Map With An English Version, Including all the Map-Legends. Part I. Ontario Historical Society Papers and Records 4.
- 076570 Coze, Paul 1940 The Indian's Altar To His God. **Travel** 74(3): 16-19, 45.
- 076730 Cresthull, Paul 1969. Styles of Detachable Stem Pipes. Maryland Archaeologist 5(2): 52-56.
- 076770 Croghan, George 1904 A Selection of George Croghan's Letters and Journals Relating to Tours into the Western Country -- November 16, 1750 - November, 1765. In Early Western Travels 1748-1846, Volume 1, edited by R.G. Thwaites. A.H. Clark, Cleveland Ohio.

- 076900 Crouch, Donald Evvy 1965 **Types of Hopewell Effigy Pipes.** Unpublished MFA Thesis, Department of Art, State University of Iowa.
- 076970 Crowquill, Alfred (pseud. for Henry Forrester) 1947 A Few Words about Pipes, Smoking and Tobacco. New York Public Library, New York.
- 077000 Crumley, Carole L. 1973 The Kantzler Site (20 By 30): A Multi-component Woodland Site in Bay County, Michigan. The Michigan Archaeologist 19(3-4).
- 077250 Culbert, T. Patrick 1980 Review of: The Smoking Gods: Tobacco in Maya Art, History and Religion, by Francis Robicsek (1978). The Hispanic American Historical Review 60: 169-170.
- 077500 Cumming, W.P., R.A. Skelton and D.B. Quinn 1972 **The Discovery of North America.** American Heritage Press, New York.
- 078300 Curtis, Mattoon M. 1935 The Story of Snuff and Snuff Boxes. Eiveright, New York.
- 078370 Cutler, John L. 1979 Review of: The Smoking Gods: Tobacco in Maya Art, History, and Religion by Francis Robicsek (1978). American Notes and Queries 17(10): 161.
- 078455 Dailey, R.C. 1964 Alcohol and the Indians of Ontario: Past and Present. Alcoholism and Addiction Research Foundation Substudy 1-20-64. Toronto.
- 078465 Dallal, Diane 1986 New York City Pipemakers. In **Historic Clay Tobacco Pipe Studies**, Volume 3, edited by Byron Sudbury, pp. 43-47. Ponca City, Oklahoma.
- 078485 Dam, Cornelia H. 1929 Tobacco Among the Indians. The American Mercury 16(61): 74-76.
- 078600 Danckaerts, Jasper 1913 Journal of Jasper Danckaerts 1679-1680, edited by B.B. James and J.F. Jameson. Charles Scribner's Sons, New York.
- 079000 Daniels, Peta 1980 "A Certaine Kind of Herbe" Smoking Pipes of the Ontario Iroquois. **Rotunda** (Royal Ontario Museum) 13(2): 4-9.

- 079320 Davey, Peter (editor) 1979 **The Archaeology of the Clay Tobacco Pipe,** Volume 2. B.A.R. International Series 60.
- 079330 Davey, Peter (editor) 1981 **The Archaeology of the Clay Tobacco Pipe,** Volume 5 (Europe 2). B.A.R. International Series 106.
- 079340 Davey, Peter (editor) 1983 **The Archaeology of the Clay Tobacco Pipe,** Volume 8 (America). B.A.R. International Series 175.
- 079350 Davies, K.G. (editor) 1965 Letters From Hudson Bay, 1703-40. The Hudson's Bay Record Society, London.
- 079500 Dawson, J.W. 1880 Fossil Men and Their Modern Representatives: An Attempt to Illustrate the Characters and Condition of Pre-Historic Men in Europe, by Those of the American Races. Montreal.
- 081400 Deacon, John 1616 Tobacco Tortured; or the Filthie Fume of Tobacco Refined. London.
- 081450 De Acosta, José 1590 Historia natural y moral de las Indias. Seville.
- 081455 De Acosta, José 1591 Concilium Limense. Madrid.
- 081500 Deans, James 1890 The Huida-Kwul-Ra, or Native Tobacco of the Queen Charlotte Haidas. The American Antiquarian and Oriental Journal 12(1): 48-49.
- 081582 De Bry, Theodore 1591 Grands Voyages (II). Frankfurt.
- 081600 De Candolle, Alphonse 1886 Origin of Cultivated Plants. London.

De Espinosa, Isidro Felis see 188750

081670 De Goes, Damião 1566 Chronica do felicissimo Rei Dom Emanuel (Primera Parte). Lisbon.

Dela Croix see 153500

081705 De Laet, Johann 1625 Nieuwe Wereldt. Leyden.

- 081710 De Laet, John 1841 Extracts from the New World, or A Description of the West Indies. Collections of the New-York Historical Society, 2d series, Volume 1.
- 081730 De La Martiniere, Pierre Martin 1671 Voyage des Pais Septentrionaux. Paris.

De la Verendrye, P.G. see 058010

- 081760 De l'Écluse, Charles (Carolus Clusius) 1574 De Simplicibus Medicamentis. Antwerp.
- 081763 De l'Écluse, Charles (Carolus Clusius) 1605 Exoticorum libri decem. Leiden.
- 081770 De Léry, Jean 1578 Historie d'un voyage faict en la terre du Brésil, autrement dite Amerique. La Rochelle.
- 081773 De Léry, Jean 1880 Histoire d'un voyage faict en la terre du Bresil, 2 volumes, edited by Paul Gaffarel. Paris.
- 081778 Deller, Brian, C. Ellis and I. Kenyon 1986 The Archaeology of the Southeastern Huron Basin. In: Studies in Southwestern Ontario Archaeology Occasional Publications 1: 2-12, (London Chapter of the Ontario Archaeological Society, London).
- 081782 De L'Obel, Matthias 1576 Plantarum seu stirpium historia. London.
- 082000 Demeter, C. Stephan and W.L. Lowery 1977 An Archaeological and Historical Investigation of the Berrien Springs Jail House Site. **The Michigan** Archaeologist 23(2-3).
- 082500 Demski, Elizabeth A. 1980 A Preliminary Report on Excavations at the Jeremiah Curtin House 1978. The Wisconsin Archeologist 61(1).
- 083050 Densmore, Frances 1934 Review of: Tobacco, Pipes and Smoking Customs by G.A. West (1934). Minnesota History 15(4): 453-454.
- 083100 Denton, Daniel 1670 A Brief Description of New-York: Formerly called New-Netherlands. London. (republished in 1937 by Columbia University Press, New York)
- 083900 Denys, Nicolas 1672 Description Geographique et Historique des Costes de L'Amerique Septentrionale. Paris.

- 084000 Denys, Nicolas 1908 **The Description and Natural History of the Coasts of North America (Acadia),** edited by William F. Ganong. The Champlain Society, Toronto.
- 084050 de Prade, Jean Royer 1677 Histoire du Tabac... Faris. (reissue of 010870)
- 084070 De Reneaulme, Paul 1611 Specimen Historiae Plantarum, Paris.
- 084080 De Rocquigny, Adrian 1634 La Muse Chrestienne. London.
- 084120 De Serres, Olivier 1600 Le Theatre D'Agriculture. Paris.
- 084140 De Smet, P.J. 1906 Letters and Sketches: with a Narrative of a Years Residence among the Indian Tribes of the Rocky Mountains. In **Early Western Travels**, Volume 27, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 084142 De Smet, P.J. 1906 Oregon Missions and Travels Over the Rocky Mountains in 1845-46. In Early Western Travels, Volume 29, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.

De Smet, P.J. see also 068880

- 084700 Devine, E.J. 1922 Historic Caughnawaga. Messenger Press, Montreal.
- 084740 De Vries, David Pietersz 1655 Korte Historiael, Ende Journaels Aenteyckeninge... Alkmaar.
- 084750 De Vries, David Pietersz 1841 Extracts from the Voyages of David Pieterszen De Vries, Master of Artillery in the Service of the United Provinces, etc., translated by G. Troost. Collections of the New-York Historical Society, 2d series, Volume 1.
- 086200 Dickason, Olive P. 1984 The Myth of the Savage and the Beginnings of French Colonialism in the Americas. University of Alberta Press, Edmonton.
- 086300 Dickson, Sarah A. 1954 Panacea or Precious Bane: Tobacco in Sixteenth Century Literature. Arents Tobacco Collection Publication Number 5. New York Public Library, New York.

- 086500 Dickson, Sarah A. and P.H. O'Neil (editors) 1958-1969 Tobacco: A Collection of the Books, Manuscripts, and Engravings Aquired Since 1942 in the Arents Tobacco Collection at the N.Y. Public Library, 10 parts, 1507-1724. New York Public Library, New York.
- 086700 Diehl, Harold S. 1969 Tobacco and Your Health: The Smoking Controversy. McGraw Hill, New York.
- 086740 Dièreville, Sieur de 1708 Relation Du Voyage Du Port Royal De L'Acadie, Ou De La Nouvelle France. Rouen.
- 086745 Dièreville, Sieur de 1933 Relation of the Voyage to Port Royal in Acadia or New France, edited by J.C. Webster. Champlain Society, Toronto.
- 086750 Dimbleby, G.W. 1967 Plants and Archaeology. John Baker, London.
- 086770 Dincauze, Dena F. 1974 An Introduction to Archaeology in the Greater Boston Area. Archaeology of Eastern North America 2(1): 39-67.
- 086800 Di Peso, Charles C. 1957 A Tubular Stone Pipe (?) from Sonora. American Antiquity 22: 288-290.
- 086900 Dirst, Victoria 1982 The Oshkosh Swimming Pool Burial. The Wisconsin Archeologist 63(1): 51-64.
- 087000 Dixon, Roland B. 1920 Review of: Africa and the Discovery of America, Volume I by Leo Wiener (1920). American Anthropologist 22: 178-185.
- 088000 Dixon, Roland B. 1921 Words for Tobacco in American Indian Languages. American Anthropologist 23: 19-49.
- 088200 Dixon, Roland B. 1921 Discussion and Correspondence: Africa and the the Discovery of America, A Rejoinder. American Anthropologist 23: 94-97.
- 089000 Dixon, Roland B. 1933 Tobacco Chewing on the Northwest Coast. American Anthropologist 35: 146-150.

089300 Dixon, Roland B. and J.B. Stetson Jr. 1922 Analysis of Pre-Columbian Pipe Dottles. American Anthropologist 24: 245-246.

1

- 089437 Dobkin de Rios, Marlene 1984 Hallucinogens: Cross-Cultural Perspectives. University of New Mexico Press, Albuquerque.
- 089439 Dockstader, Frederick J. 1969 Fraudulent Artifacts before 1900. Ohio Archaeologist 19(2): 72.
- 089440 Dockstader, Frederick J. 1973 Indian Art in America. Promotory Press, New York.
- 089465 Dodoens, Rembert 1553 Trium priorum de stirpium historia commentariorum imagines ad viuum expressae. Antwerp.
- 092400 Donnelly, Ignatius 1882 Atlantis: The Antediluvian World. New York.
- 093000 Dorsey, George A. 1906 Legend of the Teton Sioux Medicine Pipe. The Journal of American Folk-Lore 19(75): 326-329.
- 094300 Douglas, Mary 1979 Purity and Danger: An Analysis of Concepts of Pollution and Taboo. Routledge and Kegan Paul, London.
- 094500 Douglass, A.E. 1889 A Portrait Pipe From Central America. The American Antiquarian 11(6): 348-353.
- 099800 Drake, Francis 1628 The World Encompassed. London.

Drake, Francis see also 196500

- 099900 Drake, Samuel A. 1893 The Making of Virginia and the Middle Colonies 1578-1701. New York.
- 100000 Drake, Samuel G. 1880
  The Aboriginal Races of North America..., 15th edition.
  New York.
- 101510 Druke, Mary A. 1985 Iroquois Treaties: Common Forms, Varying Interpretations. In The History and Culture of Iroquois Diplomacy, edited by Francis Jennings, pp 85-98. Syracuse University Press, Syracuse, New York.

- 101700 Drysdale, Vera L. (editor) 1982 The Gift of the Sacred Pipe (based on Black Elk's account as originally recorded by Joseph Epes Brown). University of Oklahoma Press, Norman. (see also 054000)
- 102080 Duco, Don H. 1981 The Clay Tobacco Pipe in Seventeenth Century Netherlands. In **The Archaeology of the Clay Tobacco Pipe**, Volume 5 (Europe 2), edited by Peter Davey. B.A.R. International Series 106.
- 102100 Duco, Don 1986 A ca. 1900 Export Catalogue of the Goedewaagen Firm. In Historic Clay Tobacco Pipe Studies, Volume 3, edited by Byron Sudbury, pp. 89-95. Ponca City, Oklahoma.
- 102101 Duco, Don 1986 Pipemarks from the Gambier Factory. In: Historic Clay Tobacco Pipe Studies, Volume 3, edited by Byron Sudbury, pp. 99-110. Ponca City, Oklahoma.
- 102200 Du Creux, François 1664 Historia Canadensis. Paris.
- 102210 Du Creux, François 1951-52 The History of Canada or New France, 2 volumes. The Champlain Society, Toronto.
- 103000 Dunhill, Alfred 1924 The Pipe Book. A. and C. Black, London.
- 103200 Dunhill, Alfred H. 1954 **The Gentle Art of Smoking.** G.P. Putnam and Sons, New York. (republished in 1961 by Max Reinhardt, London)
- 103240 Dunn, Richard S. 1982 Masters, Servants, and Slaves in the Colonial Chesapeake and the Caribbean. In **Early Maryland in a Wider World**, edited by David B. Quinn, pp. 242-266. Wayne State University Press, Detroit.

Du Ru, Paul see 059630

- 103700 Dusenberry, Verne 1961 The Significance of the Sacred Pipes to the Gros Ventre of Montana. **Ethnos** 26: 12-29.
- 105000 Dustin, Fred 1929 Some Ancient Fire-Beds in Saginaw County, Michigan. Michigan History Magazine 13(2): 301-307. (republished in Michigan Archaeologist 14(1-2))

- 107000 Dustin, Fred 1931 Indian Pipes Collected in Saginaw County, Michigan. Papers of the Michigan Academy of Science, Arts and Letters 14: 35-45. (republished in Michigan Archaeologist 14(1-2))
- 108500 Duys, John H. 1902 The Comic History of Tobacco: Chapter 7 - No Heaven Without Tobacco. Canadian Cigar and Tobacco Journal 8(6): 327, 329.
- 108630 Eastwood, Alice 1938 The Tobacco Collected by Archibald Menzies on the Northwest Coast of America. Leaflets in Western Botany 2(6): 92-94.
- 108640 Eastwood, Alice 1939 Early Botanical Explorers on the Pacific Coast and the Trees They Found There. California Historical Society Quarterly 18: 335-346.
- 108643 Eccles, William J. 1969 **The Canadian Frontier, 1534-1760.** Holt, Rinehart and Winston, Toronto.
- 108650 Eccles, William J. 1972 France in America. Fitzhenry and Whiteside, Vancouver.
- 108700 Edinger, George 1941 Things of Every Day: Tobacco. World Review (London) April: 49-53.
- 109000 Ehwa, Carl Jr. 1974 The Book of Pipes and Tobacco. Random House, New York.
- 109100 Ehwa, Mary 1985 Tobacco for the Pipe Smoker. Pipe Smoker Spring 1985: 14-15.
- 110200 Elaine Horwitch Galleries 1987 Advertisement for a Buffalo Spirit Pipe. American Indian Art Magazine 12(3): 4.
- 110250 Elferink, Jan G.R. 1983 The Narcotic and Hallucinogenic use of Tobacco in Pre-Columbian Central America. Journal of Ethnopharmacology 7: 111-122.
- 110800 Elliot, Jack 1972 Tobacco Pipes Among the Hivernant Hide Hunters: A.D. 1860-1882. The Western Canadian Journal of Anthropology 3(1): 146-157.

i 🖌

## Bibliography

- 110930 Ellis, David M., J.A. Frost, H.C. Syrett and H.J. Carman 1967 A History of New York State. Cornell University Press, Ithaca, New York.
- 110950 Ellis, H. Holmes 1944 Two New Specimens From Ohio: The Allen Tablet; Mound City Otter Pipe. American Antiquity 9: 449.
- 111700 Emboden, William 1979 Narcotic Plants. Macmillan, New York.
- 116500 Engelbrecht, William 1975 Review of: Smoking Technology of the Aborigines of the Iroquois Area of New York State by Edward S. Rutsch (1973). American Anthropologist 77:453.
- 116600 Erichsen-Brown, Charlotte 1979 Use of Plants for the Past 500 Years. Breezy Creeks Press, Aurora, Ontario.
- 116700 Erickson, Clifford S. 1966 Catlinite. Central States Archaeological Journal 13: 132-136.
- 117500 Estienne, Charles and J. Liébault 1567 L'Agriculture et maison rustique. Paris.
- 118000 Eteson, Marie, M.D. Crary and M.F. Chase 1978 The Mattaquason Purchase Site (M48N6), North Chatham. Bulletin of the Massachusetts Archaeological Society 39(1).
- 118100 Ethridge, Robbie F. 1978 Tobacco Among the Cherokees. Journal of Cherokee Studies 3: 76-86.
- 118350 Everaerts, Gilles 1587 De herba panacea quam alii Tabacum. Antwerp.
- 118360 Everard, Gilles 1659 Panacea; or the Universal Medicine, Being a Discovery of the Wonderfull Vertues of Tobacco Taken in a Pipe... London.
- 118400 Ewan, Joseph 1976 The Columbian Discoveries and the Growth of Botanical Ideas with Special Reference to the Sixteenth Century. In **First Images of America**, Volume 2, edited by Fredi Chiappelli. University of California Press, Berkeley.

- 118420 Ewan, Joseph and N. Ewan 1970 John Banister and His Natural History of Virginia 1678-1692. University of Illinois Press, Urbana and Chicago.
- 118500 Ewers, John C. 1963 Blackfoot Indian Pipes and Pipemaking. Bureau of American Ethnology Bulletin 186: 31-60. Anthropological Papers 64. Smithsonian Institution.
- 118570 Ewers, John C. 1972 The Influence of the Fur Trade Upon the Indians of the Northern Plains. In **People and Pelts, Selected Papers:** Second North American Fur Trade Conference, edited by Malvina Bolus, pp. 1-26. Peguis, Winnipeg.
- 118600 Ewers, John C. 1978 Three Effigy Pipes by an Eastern Dakota Master Carver. American Indian Art Magazine 3(4): 51-55, 74.
- 118700 Ewers, John C. 1979 Indian Art in Pipestone: George Catlin's Portfolio in the British Museum. Smithsonian Institution Press, Washington.
- 118800 Ewers, John C. 1981 Pipes for the Presidents. American Indian Art Magazine Summer 1981: 62-70.
- 119000 Fairholt, F.W. 1859 **Tobacco: Its History and Associations.** London. (republished in 1876 by Chatto and Windus, London)
- 119100 Falconer, Wm. 1768-1769 Journal of Wm. Falconer (Hudson Bay Company Trader at Severn). Unpublished manuscript in Public Archives of Canada. Severn - MG 19 D2, Volume 1, Part 2: 19-62. (transcribed in the 1930s)
- 119140 Farnham, Thomas J. 1906 Travels in the Great Western Prairies, the Anahuac and Rocky Mountains, and in the Oregon Territory. In Early Western Travels 1748-1846, Volume 28, edited by R. G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 119150 Fraquharson, R.J. 1880 The Elephant Pipe. American Antiquarian 2(1): 67-69.
- 119200 Faucette, Charles K. 1902 The Comic History of Tobacco: Chapter 3 - The Aggravating Superiorities of Sir Walter Raleigh. Canadian Cigar and Tobacco Journal 8(4): 187.

- 119230 Faux, W. 1905 Memorable Days in America: Being a Journal of a Tour to the United States. In **Early Western Travels 1748-1846**, Volumes 11-12, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 119320 Feest, Christian 1978 North Carolina Algonquians. In Northeast, edited by Bruce G. Trigger, pp. 271-281. Handbook of North American Indians, Volume 15, William G. Sturtevant, general editor. Smithsonian Institution, Washington.
- 119400 Feinhandler, Sherwin J., H.C. Fleming and J.M. Monahon 1979 Pre-Columbian Tobaccos in the Pacific. Economic Botany 33(2): 213-226.
- 119600 Feldser, Bill 1987
  Flying Eagle Great Pipe. Indian-Artifact Magazine 6(1):
  29.
- 119720 Fenton, William N. 1940 Problems arising from the Historic Northeastern Position of the Iroquois. In Essays in Historical Anthropology of North America, Smithsonian Miscellaneous Collections 100: 159-251.
- 119750 Fenton, William N. 1942 Contacts Between Iroquois Herbalism and Colonial Medicine. Annual Report of the Smithsonian Institution, 1941: 503-526.
- 119800 Fenton, William N. 1953 The Iroquois Eagle Dance, an Offshoot of the Calumet Dance. Bureau of American Ethnology Bulletin 156.
- 120100 Fenton, William N. (editor) 1969 Answers to Governor Cass's Questions by Jacob Jameson, A Seneca (ca. 1821-1825). Ethnohistory 16(2): 113-139.
- 120130 Fenton, William N. 1971 The Iroquois in History. In North American Indians in Historical Perspective, edited by E.B. Leacock and N.O. Lurie, pp. 129-168. Random House, New York.
- 120203 Fenton, William N. 1985 Structure, Continuity, and Change in the Process of Iroquois Treaty Making. In The History and Culture of Iroquois Diplomacy, edited by Francis Jennings, pp. 3-36. Syracuse University Press, Syracuse, New York.
- 120630 Ferrant, Louis 1655 Traicté du tabac en sternutatoire. Bourges.

120645 Ferris, Neal 1987

Preliminary Findings from Enniskillen: A Mid-Nineteenth Century Ojibwa Reserve. **Kewa (**Newsletter of the London Chapter of the Ontario Archaeological Society) 87(1): 4-11.

- 120650 Ferris, Neal, I. Kenyon, R. Prevec and C. Murphy 1985 Bellamy: A Late Historic Ojibwa Habitation. Ontario Archaeology 44: 3-21.
- 121100 Finley, James B. 1857 Life Among the Indians; or, Personal Reminiscences and Historical Incidents Illustrative of Indian Life and Character. Cincinnati.
- 121400 Fioravanti, Leonardo 1582 Della Fisica. Venice.
- 122000 Fisher, Charles 1976 A Preliminary Report on the Prehistoric Archaeological Resources of the Onesquethaw Creek Historic District. New York State Archeological Association Bulletin 68.
- 122200 Fisher, Robert L. 1939 The Odyssey of Tobacco. The Prospect Press, Litchfield, Connecticut.
- 122800 Fitting, James E. 1964 Ceramic Relationships of Four Late Woodland Sites in Northern Ohio. The Wisconsin Archeologist 45(4).
- 127000 Fitting, Jac s E. and M.J. Lynott 1974 The Norge V lage Site (SIS-16). The Michigan Archaeologist 20(3-4).
- 129000 Fitting, James E. 1976 Archaeological Excavations at the Marquette Mission Site, St. Ignace Michigan, in 1972. The Michigan Archaeologist 22(2-3).
- 130000 Fitzgerald, William R. 1982 Lest the Beaver Run Loose: The Early 17th Century Christianson Site and Trends in Historic Neutral Archaeology. National Museum of Man Mercury Series, Archaeological Survey of Canada Paper 111, Ottawa.
- 131500 Flannery, Regina 1939 An Analysis of Coastal Algonquian Culture. The Catholic University of America Press, Anthropological Series no. 7, Washington, D.C.
- 131600 Fleming, Stuart 1984 The Life and Times of a Williamsburg Apothecary. Archaeology 37(3): 62-63, 81.

- 131700 Fletcher, Alice C. 1884 Observations Upon the Usage, Symbolism and Influence of the Sacred Pipes of Fellowship Among the Omahas. Proceedings of the American Association for the Advancement of Science 33: 615-617.
- 131800 Fletcher, Alice C. 1884 The "Wawan," or Pipe Dance of the Omahas. Annual Report of the Peabody Museum of American Archaeology and Ethnology 3(3-4): 308-333.
- 131805 Fletcher, Alice C. 1893
  Personal Studies of Indian Life: Politics and
  "Pipe-Dancing." The Century Illustrated Monthly Magazine
  (0.s.) 45: 441-455, (n.s.) 23: 441-455.
- 131807 Fletcher, Alice 1904 The Hako: a Pawnee Ceremony. 22d Annual Report of the Bureau of American Ethnology, Pt. 2. Smithsonian Institution, Washington, D.C.
- 131810 Fletcher, Hewitt G. Jr. 1941 The History of Nicotine. Journal of Chemical Education 18: 303-308.
- 131815 Flint, Timothy (editor) 1905 The Personal Narrative of James O. Pattie. In Early Western Travels 1748-1846, Volume 18, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 131820 Fluckiger, Friedrich A. and Daniel Hanbury 1874 Pharmacographia: A History of the Principal Drugs of Vegetable Origin. Macmillan and Co., London.
- 131847 Fogelman, Gary L. 1983 Clay Pipes. The Pennsylvania Artifact Series Booklet 67.
- 131857 Fogelman, Gary 1987 Pipe a Fake? Indian-Artifact Magazine 6(1): 3.
- 131858 Fogelman, Gary 1987
  Rare Northeast Artifacts (Pipes For Sale).
  Indian-Artifact Magazine 6(1): 55 and 6(2): 50.
- 131876 Folkard, Richard Jr. 1884 Plant Lore, Legends, and Lyrics. London.

- 131890 Forbes, W.F., R.C. Frecker and D. Nostbakken (editors) 1986 Tobacco Use Among Students of the Northwest Territories. In Proceedings of the Fifth World Conference on Smoking and Health, Winnipeg, Canada, 1983, Volume 2: 347-349. Canadian Council on Smoking and Health, Ottawa. (Abstracted in: Smoking and Health Bulletin Sept.-Oct. 1986: 347)
- 133800 Fournier, Paul 1932 Voyages et découvertes scientifiques des missionnaires naturalistes français. Paris.
- 134030 Fowke, Gerard 1910 Tubes. In Handbook of American Indians North of Mexico, Volume 2, edited by F.W. Hodge, pp. 830-831. Bureau of American Ethnology Bulletin 30.
- 134700 Fowler, Orin 1842 A Disquisition on the Evils of Using Tobacco, and the Necessity of Immediate and Entire Reformation, 3rd edition. Boston.
- 134920 Fowler, William S. 1951 Pipes and Rare Products of the Stone Bowl Industry. Bulletin of the Massachusetts Archaeological Society 13(1): 13-20.
- 134950 Fowler, William S. 1965 Significant Ceramic Pipe Recoveries. Bulletin of the Massachusetts Archaeological Society 26(3-4): 49-52.
- 135500 Fowler, William S. 1967 Oaklawn Quarry: Stone Bowl and Pipe Making. Bulletin of the Massachusetts Archaeological Society 29(1): 1-17.
- 138000 Fowler, William S. 1969 A Stone Pipe From Plymouth. Bulletin of the Massachusetts Archaeological Society 30 (3-4): 26-27.
- 138500 Fowler, William S. 1971 A Rare Stone Pipe from Rhode Island. Bulletin of the Massachusetts Archaeological Society 32(1-2): 23-25.
- 140000 Fowler, William S. 1973-1974 Otstungo Effigy Ceramic Pipes. Bulletin of the Massachusetts Archaeological Society 35(1-2): 28-31.
- 143000 Fowler, William S. 1976 A Rare Pipe Discovery. Bulletin of the Massachusetts Archaeological Society 37(3-4): 42-45.

680

## Bibliography

- 144500 Fox, J.W. 1972 Kaolin Pipes from Indian Island. Man in the Northeast no. 3.
- 146050 Franchere, Gabriel 1904 Narrative of a Voyage to the Northwest Coast of America in the years 1811-1814. In Early Western Travels 1748-1846, Volume 6, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 146080 Francis, Daniel and T. Morantz 1983 Partners in Furs: A History of the Fur Trade in Eastern James Bay, 1600-1870. McGill-Queen's University Press, Kingston and Montreal.
- 147000 Franz, Harvey 1965 Glazed Crockery Pipes. Michigan Archaeologist 11(2): 57-58.
- 147050 Frazer, James G. 1981 **The Golden Bough: The Roots of Religion and Folklore,** 2 volumes. Avenel, New York. (republication of 1890 edition)
- 147440 Fuller, Steve 1978 Glacial Kame Slate (Pipes). Ohio Archaeologist 28(4): 9.
- 147500 Fundaburk, Emma L. and M.D.Fundaburk Foreman (editors) 1957 Sun Circles and Human Hands: The Southeastern Indians Art and Industries. Emma L. Fundaburk, Luverne, Alabama.
- 148000 Funk, Robert E. and R.A. Johnson 1964 Archeological Investigations at the Dennis Site, Albany County, New York. New York State Archeological Association Bulletin 32.
- 151000 Funk, Robert E., T.P. Weinman and P.L. Weinman 1967 The Knapp Site: A Small Multicomponent Camp on Lake George, New York. New York State Archeological Association Bulletin 41.
- 151500 Funk, Robert E., G.R. Walters and W.E. Scott 1971 A Stratified Rockshelter in the Upper Delaware Valley. Man in the Northeast 2: 23-50.
- 152390 Furst, Peter T. 1972 Flesh of the Gods. Praeger, New York.

- 152400 Furst, Peter T. 1972 Inroduction. In Flesh of the Gods, edited by Peter T. Furst, pp. vii-xvi. Praeger, New York.
- 152800 Furst, Peter T. 1976 Hallucinogens and Culture. Chandler and Sharp, Novato, California.
- 152900 Furst, Peter T. 1976 Tobacco: "Proper Food of the Gods." In **Hallucinogens and Culture,** Peter T. Furst, pp. 23-32. Chandler and Sharp, Novato, California.
- 152940 Gager, Forrest L. Jr., V. Johnson and J. C. Holmes 1960 Ancient Tobacco Smokers. Science 132: 1021.

Galinée, B. de see 076565

Garcés, Francisco see 076550

- 152945 Gardiner, Edmund 1610 The Triall of Tabacco. London.
- 152950 Garner, Wightman W. 1951 The Production of Tobacco. The Blakiston Co., New York.
- 153115 Garrad, Charles 1986 Some Notes on the Chippewa of Beaver Islands in Lake Michigan. Arch Notes (Newsletter of the Ontario Archaeological Society) 86(3): 35-38.
- 153400 Gehlbach, D. R. 1976 A Female "Flint Knapper" Pipe. Ohio Archaeologist 26(4): 13.
- 153420 Gehlbach, D.R. 1978 A Late Prehistoric Female Effigy Pipe. Ohio Archaeologist 28(1): 4.
- 153421 Gehlbach, D.R. 1978 Two Remarkably Similar Effigy Pipes from Ohio. Ohio Archaeologist 28(1): 23.
- 153422 Gehlbach, D.R. 1978 Prehistoric Pipes, A New Fascination. Ohio Archaeologist 28(1): 28.
- 153425 Gehlbach, D.R. 1978 A Hawk Effigy Pipe From Northern Ohio. Ohio Archaeologist 28(2): 30.
- 153427 Gehlbach, D.R. 1978 A Highly Sculptured Effigy Pipe From Indiana. Ohio Archaeologist 28(3): 14.

- 153430 Gehlbach, D.R. 1978 An Exceptional Effigy Pipe in Human Form. Ohio Archaeologist 28(4): 5.
- 153500 Gehring, Charles T. and W.A. Starna 1985 A Case of Fraud: The Dela Croix Letter and Map of 1634. New York History July 1985: 249-261.
- 153600 Geier, Clarence R. 1975 Early Historic Sites in the Big Platte and Platte River Valleys of Grant County, Wisconsin. The Wisconsin Archeologist 56(3).
- 157500 Gerard, John 1597 The Herball or General Historic of Plants. London. (reprinted in 1927 by Gerald Howe, London)
- 159500 Gifford, Stanley 1940 Tobacco Pipes Found at Fort Ticonderoga. The Bulletin of the Fort Ticonderoga Museum 5(4): 120-133.
- 159700 Gill, Sam D. 1982 Native American Religions: An Introduction. Wadsworth Publishing Co., Belmont, California.
- 159800 Gillum, R.F., B.S. Gillum and N. Smith 1984 Cardiovascular Risk Factors Among Urban American Indians: Blood Pressure, Serum Lipids, Smoking, Diabetes, Health Knowledge, and Behavior. American Heart Journal 107(4): 765-776. (Abstracted in Smoking and Health Bulletin Sept.-Oct. 1985: 302)
- 159850 Gilman, Carolyn 1982 Where Two Worlds Meet: The Great Lakes Fur Trade. Publications of the Minnesota Historical Society, Museum Exhibit Series no. 2. Minnesota Historical Society, St. Paul.
- 159870 Gilman, Rhoda R. 1972 Last Days of the Upper Mississippi Fur Trade. In People and Pelts: Selected Papers of the Second North American Fur Trade Conference, edited by Malvina Bolus, pp. 103-135. Peguis Publishers, Winnipeg, Manitoba.
- 160000 Gilmore, Melvin R. 1922 Discussion and Correspondence: Some Comments on "Aboriginal Tobaccos." American Anthropologist 24(4): 480-481.
- 163000 Gilmore, Melvin R. 1926 Indian Custom of "Carrying the Pipe." Indian Notes (Museum of the American Indian, Heye Foundation) 3: 89-95.

and the second

- 167000 Gilmore, Melvin R. 1929 Arikara Account of the Origin of Tobacco and Catching of Eagles. Indian Notes (Museum of the American Indian, Heye Foundation) 6: 26-29.
- 168200 Gilmore, Melvin R. 1933 The Dakota Ceremony of Presenting a Pipe to Marshal Foch and Conferring a Name Upon Him. **Papers of the Michigan** Academy of Science, Arts and Letters 18: 15-21.
- 168600 Glass, S.A. 1984 A Few More Hopewell Effigy Pipes. Indian-Artifact Magazine 3(1-2): 40.
- 168601 Glass, S.A. 1984 A Few More Hopewell Effigy Pipes. Indian-Artifact Magazine 3(3): 16.
- 168650 Glass, S.A. and G.L. Fogelman 1983
  Hopewell Effigy Pipes. Indian-Artifact Magazine 2(6):
  26-27.
- 168900 Gleason, Henry A. 1952 **The New Britton and Brown Illustrated Flora of the Northeastern United States and Adjacent Canada,** Volume 3. Hafner Press, New York Botanical Garden, New York.
- 170600 Godefroy, Frédéric 1938 Dictionnaire de l'ancienne langue Française et de tous ses dialectes du IXe au XVe siècle. Librairie des sciences et des arts, Paris.
- 170630 Gohory, Jacques 1572 Instruction sur l'herbe petum ditte en France l'herbe de la Royne ou Medicée. Paris.

Gohory, Jacques see also 029250

8 B 1

- 170650 Gokhale, B.G. 1974 Tobacco In Seventeenth-Century India. Agricultural History 48(4): 484-492.
- 170750 Goldring, William 1973 The Pipe Book. Drake Publishers, New York.
- 170753 Gondolff, E. 1910 Le Tabac dans le nord de la France, 1587-1814. Vesoul.
- 170754 Gondolff, E. 1914 Le tabac dans l'ancienne monarchie: la Ferme Royal, 1629-1791. Vesoul.

- 170790 Goodrich, L. Carrington 1938 Early Prohibitions of Tobacco in China and Manchuria. Journal of the American Oriental Society 58: 648-657.
- 170850 Goodspeed 1917 Goodspeed's Catalogue no. 120. Boston, Massachusetts.
- 170930 Goodwin, A.J.H. 1939 The Origins of Certain African Food-Plants. The South African Journal of Science 36: 445-463.
- 170950 Goodwin, Guy 1969 Wise Man of Algonquins Sees Tobacco Tranquilizer. The Bright Leaf April-May 1969: 35, 45.

Graham, Andrew see 524700

- 172000 Graham, Robert and Charles F. Wray 1961 The Percentage of Recovery in Salvaging Beads From Disturbed Burials. New York State Archeological Association Bulletin 23: 13-16.
- 174300 Gray, Asa 1878 Synoptical Flora of North America. New York.
- 174750 Green, Jonathan S. 1915 Journal of Tour on the North West Coast of America in the Year 1829. C.F. Heartman, New York.
- 175200 Gregg, Josiah 1905 Commerce of the Prairies... In Early Western Travels, 1748-1846, Volumes 19-20, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 175800 Griffin, James B. (editor) 1952 Archeology of Eastern United States. University of Chicago Press, Chicago.
- 177900 Grimm, Elmer 1974 A Pipe From the Eiden Site. Ohio Archaeologist 24(1): 5.
- 178880 Guerra, Francisco 1967 Mexican Phantastica -- A Study of the Early Ethnobotanical Sources on Hallucinogenic Drugs. The British Journal of Addiction 62: 171-187.
- 178930 Gundersen, James N. and J.A. Tiffany 1986 Nature and Provenance of Red Pipestone from the Wittrock Site (130B4), Northwest Iowa. North American Archaeologist 7(1): 45-67.

179100 Gutierrez, Helen M. 1985

A Brief Description of Smoking Pipes From the Elwood Site. In **The Mohawk Valley Project: 1982 Field Season Report,** edited by Dean R. Snow, pp. 59-61. The Institute for Northeast Anthropology, State University of New York at Albany.

- 179430 Haberman, Thomas W. 1984 Evidence for Aboriginal Tobaccos In Eastern North America. American Antiquity 49: 269-287.
- 179450 Hacker, Richard C. 1984 **The Ultimate Pipe Book.** Autumngold Publishing, Beverly Hills, California.
- 179470 Hacket, Thomas (editor and translator) 1568 The New Found World, or Antarctike...by that excellent learned man, Master Andrewe Thevet, and now newly translated into Englishe. London. (translation of 469155; see also 417020)
- 179500 Haddon, A.C. 1931 Tobacco in New Guinea. American Anthropologist (n.s.) 33: 657-659.
- 179700 Haddon, A.C. 1947 Smoking and Tobacco Pipes in New Guinea. Philosophical Transactions of the Royal Society of London Series B, 232: 1-278.
- 179800 Hadlock, Wendell S. 1947 Eight Platform or "Monitor" Pipes in the Peabody Museum, Salem, Massachusetts. Bulletin of the Massachusetts Archaeological Society 8(4): 49-52.
- 179830 Hafner, Gertrude 1962 Das Calumet und seine Beziehungen zum nordamerikanischen Südwesten. Akten des 34. Internationalen Amerikanistenkongresses, Vienna, 1960, pp. 564-568.
- 179870 Hakluyt, Richard 1589 The Principall Navigations, Voiages and Discoveries of the English Nation. London.
- 179900 Haldane, R.A. 1980 Smoking Through the Centuries. Blackwood's Magazine 328(1982): 430-434.
- 183530 Hall, Clayton C. (editor) 1910 Narratives of Early Maryland 1633-1684. Charles Scribner's Sons, New York.
- 183670 Hall, R.H. 1924 Wondaw. **The Beaver** 4(10): 366-367.

- 184000 Hall, Robert L. 1977 An Anthropocentric Perspective for Eastern United States Prehistory. American Antiquity 42: 499-518.
- 184400 Hall, Robert L. 1982 A Second Look at Gunstock Warclubs. The Wisconsin Archeologist 63(3): 246-253.
- 184500 Hall, Robert L. 1982 **The Evolution of the Calumet-Pipe.** Unpublished Manuscript.
- 184755 Hallowell, A. Irving 1963 American Indians, White and Black: The Phenomenon of Transculturalization. Current Anthropology 4(5): 519-531.
- 184995 Hamell, George R. 1980 Gannagaro State Historic Site: A Current Perspective. In Studies in Iroquoian Culture, edited by N. Bonvillain. Occasional Publications in Northeastern Anthropology 6.
- 185000 Hamell, George R. 1983 Trading in Metaphors: The Magic of Beads. In Proceedings of the 1982 Glass Trade Bead Conference, edited by C.F. Hayes III, pp. 5-28. Rochester Museum and Science Center, Rochester, New York.
- 185200 Hamer, John H. 1969 Guardian Spirits, Alcohol, and Cultural Defense Mechanisms. Anthropologica (n.s.) 11(2): 215-241.
- 185250 Hamilton, A.E. 1927 This Smoking World. The Century Co., New York.
- 185270 Hamilton, Earl J. 1976 What the New World Gave the Economy of the Old. In First Images of America, Volume 2, edited by Fredi Chiappelli, p.853. University of California Press, Berkeley, California.
- 185300 Hamilton, Henry W. 1967 Tobacco Pipes of the Missouri Indians. Missouri Archaeological Society Memoir No. 5.
- 185400 Hamilton, Jennifer F.A. and K. Lunn 1984 Three Centuries of Clay Tobacco Pipes from London, England. Parks Canada Research Bulletin 227.
- 185450 Hammond, George P. and Agapito Rey 1940 Narratives of the Coronado Expedition 1540-1542. The University of New Mexico Press, Albuquerque.

- 185450 Hamor, Ralph 1615 A True Discourse of the Present Estate of Virginia. London.
- 185650 Harcourt, Robert 1613 A Relation of a Voyage to Guiana. London.
- 185655 Harcourt, Robert 1926 A Relation of a Voyage to Guiana, edited by C.A. Harris. Hakluyt Society 2d series, no. 60. Hakluyt Society, London.
- 185750 Hardy, W.J. 1888 Tobacco Culture in England During the Seventeenth Century. Archaeologia (London) 51: 157-166.
- 185795 Hariot, Thomas 1588 A Brief and True Report of the New Found Land of Virginia. London.
- 185800 Hariot, Thomas 1590 A Brief and True Report of the New Found Land of Virginia. London. (republished in 1888 by Harry W. Rylands (editor), A. Brothers, Manchester)

Hariot, Thomas see also 377490

- 185860 Harper, Francis (annotator) 1942 Diary of a Journey Through the Carolinas, Georgia, and Florida from July 1, 1765 to April 10, 1766 by John Bartram. Transactions of the American Philosophical Society (n.s.) 33 (part I): 1-120.
- 185862 Harper, Francis (annotator) 1943 Travels in Georgia and Florida, 1773-1774. A Report to Dr. John Fothergill by William Bartram. Transactions of the American Philosophical Society (n.s.) 33 (part II): 123-242.
- 185870 Harrington, Jean C. 1952 Historic Site Archeology in the United States. In Archeology of Eastern United States, edited by James B. Griffin, p. 335. University of Chicago Press, Chicago.
- 185900 Harrington, John P. 1932 Tobacco Among the Karuk Indians of California. Bureau of American Ethnology Bulletin 94: 1-284. Smithsonian Institution, Washington.
- 186000 Harrington, M.R. 1909 The Rock-Shelters of Armonk, New York. Anthropological Papers of the American Museum of Natural History 3.

- 187100 Harrington, M.R. 1924 An Ancient Village Site of the Shinnecock Indians. Anthropological Papers of the American Museum of Natural History 22: 227-283.
- 187300 Harrington, M.R. 1945 Sitting Bull's Pipe. The Masterkey 19(1): 23-24.
- 187400 Harrington, M.R. 1945 Rare Red Pipe. The Masterkey 19(1): 30.
- 187417 Harris, Marvin 1968 The Rise of Anthropological Theory. T.Y. Crowell, New York.
- 187425 Harris, R. Cole (editor) 1987 Historical Atlas of Canada, Volume 1: From the Beginning to 1800. University of Toronto Press, Toronto.
- 187437 Hart, Gordon L. 1973 "Great Pipes" of the Woodland Period. Ohio Archaeologist 23(3): 23.
- 187440 Hart, Gordon 1975 The Cattaraugus Pipe. Ohio Archaeologist 25(3): 18-19.
- 187445 Hart, Gordon 1976 Crofoot Shoveller Duck Pipe. Ohio Archaeologist 26(1): 4-5.
- 187450 Hart, Gordon 1978 Hart's Prehistoric Pipe Rack: Prehistoric Pipes of the Mississippi River Waterways. Hart Publishers, Bluffton, Indiana.
- 187500 Hart, Gordon 1983
  Resting Bird Effigy Pipes. Indian-Artifact Magazine
  2(4): 12-15, 23, 42.
- 187520 Hart, Gordon 1984 Small Great Pipes? Indian-Artifact Magazine 2(6): 20-21.
- 188640 Hartwich, C. 1911 Die Menschlichen Genussmittel. Chr. Herm. Tauchnitz, Leipzig.
- 188650 Harvey, Henry 1855 History of the Shawnee Indians. Cincinnati. (reprinted in 1971 by Kraus, New York)

- 188700 Hatch, Charles E. Jr. 1942 Review of: Tobacco: Its History Illustrated By the Books, Manuscripts and Engravings In the Library of George Arents, Jr., by Jerome E. Brooks. William and Mary College Quarterly Historical Magazine (series 2) 22(2): 101-113.
- 188750 Hatcher, Mattie A. (editor) 1927 Descriptions of the Tejas or Asinai Indians, 1691-1722 Part IV: Fray Isidro Felis de Espinosa on the Asinai and their Allies. Southwestern Historical Quarterly 31(2): 150-180.
- 188900 Hatzan, A Leon 1925 The True Story of Hiawatha and History of the Six Nation Indians. McClelland and Stewart, Toronto.
- 189000 Hauser, Judith A. and W.K. Wilkins 1977 A Study of the Historic Clay Pipes Excavated on the Draper Park (AFB, 20SC40) and Fort Gratoit (AFD, 20SC41) Sites, Port Huron, Michigan. The Michigan Archaeologist 23(4): 143-156.
- 189370 Hawkins, Jeanne 1979 Nicotianas: The History, Cultivation and Uses of Tobacco. American Horticulturalist 58: 8-9.
- 189400 Hawkins, John 1893 The Ceremonial Use of Tobacco. The Popular Science Monthly 43: 173-183.
- 193000 Hayes, Charles F. III 1965 The Orringh Stone Tavern and Three Seneca Sites of the Late Historic Period. Research Records of the Rochester Museum of Arts and Sciences no. 12.
- 194200 Hays, Terence 1984 Tobacco in the New Guinea Highlands. Unpublished manuscript.
- 194580 Heck, L.W. 1941 Augustine Herrman: Beginner of the Virginia Tobacco Trade. William Byrd Press, Richmond Virginia.
- 194695 Heckewelder, John 1819 History, Manners, and Customs of the Indian Nations Who Once Inhabited Pennsylvania and the Neighbouring States. Philadelphia. (reprinted in 1876 by the Historical Society of Pennsylvania, Philadelphia, and in 1971 by Arno)

- 194710 Heckewelder, John 1841 Indian Tradition of the First Arrival of the Dutch at Manhattan Island, Now New-York. **Collections of the New-York Historical Society** 2d series, 1: 69-74.
- 194800 Hedrick, Ulysses P. 1933 A History of Agriculture in the State of New York. New York State Agricultural Society, Albany, New York.
- 195200 Heidenreich, Conrad E. 1978 Huron. In Northeast, edited by Bruce G. Trigger, pp. 368-388. Handbook of North American Indians, Volume 15, William G. Sturtevant, general editor. Smithsonian Institution, Washington, D.C.
- 195600 Heimann, Robert K. 1960 Tobacco and Americans. McGraw-Hill, New York.
- 195800 Heiser, Charles B. Jr. 1969 Nightshades: The Paradoxical Plants. W.H. Freeman and Co., San Francisco.
- 196000 Heisey, Henry W. and J.P. Witmer 1962 Of Historic Susquehannock Cemeteries. Pennsylvania Archaeologist 32(3-4).
- 196450 Heizer, Robert F. 1940 The Botanical Identification of Northwest Coast Tobacco. American Anthropologist 42(4): 704-706.
- 196500 Heizer, Robert F. 1947 Francis Drake and the California Indians, 1579. University of California Press, Berkeley and Los Angeles.
- 196705 Helm, June (editor) 1981 Subarctic. Handbook of North American Indians, Volume 6, William G. Sturtevant, general editor. Smithsonian Institution, Washington, D.C.
- 196710 Helm, June, E.S. Rogers and J.G.E. Smith 1981 Intercultural Relations and Cultural Change in the Shield and Mackenzie Borderlands. In Subarctic, edited by June Helm, pp. 146-157. Handbook of North American Indians, Volume 6, William G. Sturtevant general editor. Smithsonian Institution, Washington.

Hendry (Henday), Anthony see 058000

196742 Hennepin, Louis 1683 Description de la Louisiane, nouvellement decouverte au Sud'Ouest de la Nouvelle France. Paris.

- 196743 Hennepin, Louis 1697 Nouvelle Decouverte d'un tres grand Pays Situé dans l'Amerique, entre Le Nouveau Mexique, et La Mer Glaciale. Utrecht.
- 196744 Hennepin, Louis 1698 Nouveau Voyage d'un Pais plus grand que l'Europe Avec les reflections des entreprises du Sieur de la Salle, sur les Mines de St. Barbe, &c. Utrecht.
- 196745 Hennepin, Louis 1698 A New Discovery of a Vast Country in America, Extending above Four Thousand Miles, between New France and New Mexico... With a Continuation, Giving an Account of the Attempts of the Sieur De La Salle upon the Mines of St. Barbe, &c. London.
- 196748 Hennepin, Louis 1903 A New Discovery of a Vast Country in America, 2 volumes, edited by Reuben G. Thwaites. A.C. McClurg, Chicago.
- 196753 Henry, Alexander 1901 **Travels & Adventures In Canada and the Indian Territories Between the Years 1760 and 1776,** edited by James Bain. George N. Morang, Toronto.
- 196765 Henry, Susan L. 1979 Terra-Cotta Tobacco Pipes in 17th Century Maryland and Virginia: A Preliminary Study. Historical Archaeology 13.
- 196770 Henry, Thomas R. 1955 Wilderness Messiah: The Story of Hiawatha and the Iroquois. William Sloane, New York.
- 196780 Henshaw, H.W. 1883 Animal Carvings from Mounds of the Mississippi Valley. Bureau of Ethnology Annual Report 2: 123-166.
- 197100 Herment, Georges 1955 The Pipe. Simon and Schuster, New York.
- 197170 Herndon, Melvin 1957 **Tobacco in Colonial Virginia: "The Sovereign Remedy."** Virginia 350th Anniversary Celebration Corporation, Williamsburg, Virginia.
- 197200 Herndon, G. Melvin 1969 William Tatham and the Culture of Tobacco. University of Miami Press, Coral Gables, Florida.
- 198000 Herrick, Ruth 1958 A Report on the Ada Site, Kent County, Michigan. The Michigan Archaeologist 4(1).

- 199000 Hesse, Franklin J. 1975 The Egli and Lord Sites: The Historic Component -"Unadilla" 1753-1778. New York State Archeological Association Bulletin no. 63.
- 199500 Heward, Edward Vincent 1909 St. Nicotine of the Peace Pipe. George Routledge and Sons, London. E.P. Dutton and Company, New York.
- 200330 Hewitt, J.N.B. 1907 Calumet. In Handbook of American Indians North of Mexico, Volume 1, edited by F.W. Hodge, pp. 191-195. Bureau of American Ethnology Bulletin 30.
- 201000 Heye, George G. 1925 Andrew Jackson's Indian Pipes. Indian Notes (Museum of the American Indian, Heye Foundation) 2: 116-118.
- 201050 Hickerson, Harold (editor) 1959 Journal of Charles Jean Baptiste Chaboillez, 1797-1798. Ethnohistory 6: 265-316, 363-427.
- 201400 Hill-Tout, Charles 1935 The "Moses Coulee" Pipe. Transactions of the Royal Society of Canada 29 (section 2): 219-224.
- 201430 Hillen, Billy L. 1974 Surface Find of a Hopewell Platform Pipe. Ohio Archaeologist 24(3): 30.
- 201550 Hinsley, Curtis M. Jr. 1981 Savages and Scientists: The Smithsonian Institution and the Development of American Anthropology 1846-1910. Smithsonian Institution Press, Washington, D.C.
- 202000 Hodge, F.W. (editor) 1907, 1910 Handbook of American Indians North of Mexico, 2 volumes. Bureau of American Ethnology Bulletin 30.
- 202200 Hodge, F.W. 1946 Chumash Steatite Pipes. The Masterkey 20(2): 62-64.
- 203000 Hoffman, Albert J. 1967 Additional Data on Historic Burials at the Boughton Hill Site (Can 2-2), Victor Township, Ontario County, New York. New York State Archeological Association Bulletin 40: 17-22.
- 203480 Hoffman, Bernard G. 1961 Cabot to Cartier: Sources for a Historical Ethnography of Northeastern North America, 1497-1550. University of Toronto Press, Toronto.

١.

- 203502 Hoffman, Bernard G. 1964 Observations on Certain Ancient Tribes of the Northern Appalachian Province. Bureau of American Ethnology Bulletin 191.
- 205000 Hogg, Victor and B. Darling 1959 An Indian Burial Site of the Historic Period in Ingham County. **The Michigan Archaeologist** 5(1).
- 205070 Holland C.G. 1949 Contributions to the Archeology of Albemarle County, Virginia. No. 3 -- Pipes. Quarterly Bulletin of the Archaeological Society of Virginia 3(4).
- 205120 Holm, Thomas C. 1834 Description of the Province of New Sweden (1702), edited by P.S. Du Ponceau. Philadelphia. (reprinted in 1975 by Kraus, New York)
- 205170 Holmes, George K. 1923 Some Features of Tobacco History. Annual Report of the American Historical Association 1: 387-407.
- 205190 Holmes, William H. 1884 Illustrated Catalogue of a Portion of the Collections Made by the Bureau of Ethnology During the Field Season of 1881. Bureau of American Ethnology Annual Report 3: 427-492.
- 205300 Holmes, W.H. 1903 Aboriginal Pottery of the Eastern United States. Annual Report of the Bureau of American Ethnology 20.
- 205310 Holmes, William H. 1907 Catlinite. In Handbook of American Indians North of Mexico, Volume 1, edited by F.W. Hodge, pp. 217-219. Bureau of American Ethnology Bulletin 30.
- 205550 Hooper, William H. 1853 Ten Months among the Tents of the Tuski. London.
- 206200 Hopkins, Vivian C. 1961 De Witt Clinton and the Iroquois. Ethnohistory 8: 113-143, 213-241.
- 206500 Horan, James D. 1972 The McKenney-Hall Portrait Gallery of American Indians. Crown Publishers, New York.
- 207000 Horner, George R. 1979 The Excavation of the Glass Furnace in Quincy, Massachusetts. Bulletin of the Massachusetts Archaeological Society 40(2).

- 208000 Hothem, Lar 1978 A Collector's Identification and Value Guide: North American Indian Artifacts. Books Americana, Florence, Alabama.
- 208050 Hough, Franklin B. 1853 A History of St. Lawrence and Franklin Counties, New York, from the Earliest Period to the Present Time. Albany.
- 208400 Houghton, Frederick 1912 The Seneca Nation from 1655 to 1687. Bulletin of the Buffalo Society of Natural Sciences 10(2).
- 209700 Howes, William J. 1942 An Unusual Pipe From Hadley, Massachusetts. American Antiquity 8: 175-176.
- 209870 Hubbard, William 1677 A Narrative of the Troubles with the Indians in New England, from the first planting thereof in the year 1607 to this present year 1677. Boston. (reprinted in 1865 by Samuel G. Drake (editor), Roxbury, Massachusetts)
- 209950 Huey, Paul R. 1974 Reworked Pipe Stems: A 17th Century Phenomenon from the Site of Fort Orange, Albany, New York. Journal of the Society of Historical Archaeology 8.
- 210000 Huey, Paul R., L.M. Feister and J.E. McEvoy 1977 Archeological Investigations in the Vicinity of "Fort Crailo" During Sewer Line Construction Under Riverside Avenue in Rensselaer, New York. New York State Archeological Association Bulletin 69.
- 210500 Huguet, Edmond 1932-1967 Dictionnaire de la langue française du seizième siècle. Librairie Ancienne Honoré Champion, Paris.
- 212018 Hultkrantz, Ake 1983 **The Study of American Indian Religions.** Crossroad Publishing Company and Scholars Press, New York.
- 212300 Hulton, Paul and D.B. Quinn 1964 The American Drawings of John White 1577-1590 With Drawings of European and Oriental Subjects, 2 volumes. Trustees of the British Museum, London. University of North Carolina Press, Chapel Hill, North Carolina.
- 212800 Hunt, Edgar 1961 Some Light on the Chalumeau. The Galpin Society Journal 14: 41-44.

- 213000 Hunt, George T. 1940 The Wars of the Iroquois: A Study in Intertribal Trade Relations. The University of Wisconsin Press, Madison, Wisconsin.
- 214300 Hurtado, Tomas 1642 Chocolate Y Tabaco. Madrid.
- 215110 Hutton, Laurence 1895 Tobacco, and the Beginnings Thereof. Harper's Weekly 39: 350-351.
- 215170 Innis, Harold A. 1962 **The Fur Trade in Canada.** Yale University Press, New Haven. (revised edition published in 1962 by University of Toronto Press, Toronto)
- 215215 Irving, Washington 1809 A History of New York. New York. (republished in 1964 by Edwin T. Bowden (editor), College and University Press, New Haven, Connecticut)
- 215230 Irwin, Sara 1984 Tobacco in China: Golden-Thread Smoke and Bottles of Snuff. Rotunda (Royal Ontario Museum) 17(1): 34-37, 39.
- 215400 Isham, James 1949 Observations on Hudsons Bay, 1743, and Notes on a Book Entitled A Voyage to Hudsons Bay in the Dobbs Galley, 1749, edited by E.E. Rich. The Champlain Society, Foronto.
- 216950 Jackman, Rob 1978 An Effigy Owl Pipe. Ohio Archaeologist 28(3): 4-5.
- 218500 Jackson, Melvin 1982 Ships and the Sea: Voyaging to the Chesapeake. In Early Maryland in a Wider World, edited by David B. Quinn, pp. 33-57. Wayne State University Press, Detroit.
- 218800 Jacobs, Wilbur R. 1950 Diplomacy and Indian Gifts: Anglo-French Rivalry Along the Ohio and Northwest Frontiers, 1748-1763. Stanford University Press, Stanford, California. (see also 218810)
- 218810 Jacobs, Wilbur R. 1967 Wilderness Politics and Indian Gifts, The Northern Colonial Frontier, 1748-1763. University of Nebraska Press, Lincoln, Nebraska. (reprint of 218800)
- 219200 Jacobstein, Meyer 1907 The Tobacco Industry in the United States. Studies in History, Economics and Public Law 26(3): 5-208. (reprinted in 1968 by AMS Press, New York)

- 219230 Jaenen, Cornelius J. 1973 Friend and Foe: Aspects of French-Amerindian Cultural Contact in the Sixteenth and Seventeenth Centuries. McClelland and Stewart, Toronto.
- 219300 Jahn, Raymond (editor) 1954 Tobacco Dictionary. Philosophical Library, New York.
- 219430 James I, King of England 1604 **A Counter-Blaste to Tobacco.** London. (reprinted in 1884 by E. Goldsmid (editor), Edinburgh; see also 219450 and 219500)
- 219450 James I, King of England 1895 A Counterblaste to Tobacco, edited by E. Arber. Westminster. (see also 219430 and 219500)
- 219500 James I, King of England 1954 **A Counter-blaste to Tobacco.** Rodale Books, London. (see also 219430 and 219450)
- 220100 James, Edwin 1905 Account of an Expedition from Pittsburgh to the Rocky Mountains performed in the Years 1819, 1820. Based on S. H. Long's notes. In Early Western Travels 1748-1846, Volumes 14-17, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 220210 Jameson, A.B. 1852 Sketches in Canada, and Rambles Among the Red Men. London.
- 220230 Jameson, J. Franklin (editor) 1909 Narratives of New Netherland 1609-1664. Charles Scribner's Sons, New York.

Jameson, Jacob see 120100

- 220290 Janiger, Oscar and M. Dobkin de Rios 1973 Suggestive Hallucinogenic Properties of Tobacco. Medical Anthropology Newsletter 4(4): 6-11.
- 220300 Janiger, Oscar and M. Dobkin de Rios 1976 Nicotiana an Hallucinogen? Economic Botany 30(2): 149-151.
- 220550 Jeffreys, M.D.W. 1971 Maize and Mande Myth. Current Anthropology 12: 291-320.
- 221600 Jennings, Francis 1975 The Invasion of America: Indians, Colonialism, and the Cant of Conquest. University of North Carolina Press, Chapel Hill, North Carolina.

- 221610 Jennings, Francis 1982 Indians and Frontiers in Seventeenth-Century Maryland. In: Early Maryland in a Wider World, edited by David B. Quinn, pp. 216-241. Wayne State University Press, Detroit.
- 221615 Jennings, Francis 1984 The Ambiguous Iroquois Empire. W.W. Norton, New York.
- 221620 Jennings, Francis (editor) 1985 The History and Culture of Iroquois Diplomacy. Syracuse University Press, Syracuse.

Jesuit Relations see 471001 - 471072

- 222100 Jewitt, Llewellynn 1882-1883 A Word or Two Upon Some Quaint Forms of Smoking-Pipes From the Mound-Cities and Elsewhere. Reliquary 23: 202-206.
- 222101 Jewitt, Llewellynn 1883-1884 An Additional Word Upon Some Quaint Forms of Smoking-Pipes From the Mound-Cities. **Reliquary** 24: 55.
- 222200 Jilek, Wolfgang G. 1982 Altered States of Consciousness in North American Indian Ceremonials. **Ethos** 10(4): 326-343.
- 223050 Johnson, Amandus 1911 **The Swedish settlements on the Delaware,** 2 Volumes. Americana Germanica 13, University of Pennsylvania Press, Philadelphia.
- 223100 Johnson, Arthur F. 1960 An Unusual Steatite Pipe. Quarterly Bulletin of the Archaeological Society of Virginia 15: 7.
- 223130 Johnson, Dick 1972 Glacial Kame Birdstones and A Tubular Pipe. Ohio Archaeologist 22(4): 19.
- 223200 Johnson, P.W. 1983 Tobacco. Unpublished manuscript.

•

- 223350 Johnston, T. Harvey and J.B. Cleland 1933-1934 The History of the Aboriginal Narcotic, Pituri. Oceania 4: 201-289.
- 223390 Jolly, Fletcher III 1973 A Catlinite Disk Pipe and Associated Vessels from Lowland Eastern Arkansas. Arkansas Archeologist 14(1): 1-12.

- 223400 Jolly, Fletcher III 1975 A Late Hopewell Platform Pipe From a Copena Burial Cave in Northern Alabama. Central States Archaeological Journal 22: 56-58.
- 223487 Jones, Volney H. 1935 Ceremonial Cigarettes. Department of the Interior, National Park Service, Southwestern Monuments Monthly Report Supplement October: 287-291.
- 223500 Jones, Volney H. 1944 Was Tobacco Smoked in the Pueblo Region in Pre-Spanish Times? **American Antiquity** 9: 451-456.
  - 223600 Jones, Volney H. and E.A. Morris 1960 A Seventh-Century Record of Tobacco Utilization in Arizona. **El Palacio** 67(4): 115-117.
  - 223700 Jordan, Douglas F. 1959 Adena and Blocked-End Tubes in the Northeast. Bulletin of the Massachusetts Archaeological Society 20(4): 49-61.
  - 223730 Josselyn, John 1674 An Account of Two Voyages to New-England. London.
  - 223735 Josselyn, John 1865 An Account of Two Voyages to New-England, Made during the years 1638, 1663. Boston.

Joutel see 454455

- 223750 Joyce, Daniel J. 1981 Tobacco and Pipe Use Among the Indians of the Northwest Coast. Field Museum of Natural History Bulletin October 1981: 14-15.
- 223830 Juny, Paul 1986 An Akron Smoking Pipe Company Shipping Box. In Historic Clay Tobacco Pipe Studies, Volume 3, edited by Byron Sudbury, pp. 76-78. Ponca City, Oklahoma.
- 227000 Jury, Wilfrid and E.M. Jury 1954 Sainte-Marie among the Hurons. Oxford University Press, Toronto. (reprinted in 1965)
- 229200 Kalm, Peter 1770-1771 Travels Into North America... 3 Volumes. Warrington and London.

Kalm, Peter see also 237400

- 229300 Kamen-Kaye, Dorothy 1971 Chimó: An Unusual Form of Tobacco in Venezuela. Botanical Museum Leaflets (Harvard University) 23(1): 1-59.
- 229500 Kane, Lucile M., J.D. Holmquist and C. Gilman (editors) 1978 The Northern Expeditions of Stephen H. Long. The Journals of 1817 and 1823 and Related Documents. Minnesota Historical Society Press, St Paul, Minnesota.
- 229700 Kane, Robert J. 1931 Anthony Chute, Thomas Nashe, and the First English Work on Tobacco. **Review of English Studies** 7(26): 151-159.
- 230000 Kapches, Mima 1980 Iroquois Effigy Rattle Pipes. Ontario Archaeology 33: 59-68.
- 231000 Kell, Katherine T. 1965 Tobacco in Folk Cures in Western Society. Journal of American Folklore 78(308): 99-114.
- 231010 Kell, Katharine T. 1966 Folk Names for Tobacco. Journal of American Folklore 79(314): 590-599.
- 231080 Kellogg, Louis P. (editor) 1917 Early Narratives of the Northwest 1634-1699. Charles Scribner's Sons, New York.
- 232400 Kent, Barry C. 1984 Susquehanna's Indians. Anthropological Series of the Pennsylvania Historical and Museum Commission 6.
- 232500 Kent, Barry C. 1981 A Map of 18th Century Indian Towns in Pennsylvania. Pennsylvania Archaeologist 51(4).
- 232765 Kenyon, Ian 1986 Sagard's Rassade Rouge of 1624. In Studies in Southwestern Ontario Archaeology. Occasional Publications no. 1 of the London Chapter of the Ontario Archaeological Society, pp. 53-59.
- 232768 Kenyon, Ian 1987 Levi Turkey and the Tuscarora Settlement on the Grand River. Kewa Newsletter of the London Chapter, Ontario Archaeological Society) 87(1): 20-25.

- 232770 Kenyon, Ian 1987 An Archaeological Study of 19th Century European Settlement in the Gore of Camden, Kent County. Kewa (Newsletter of the London Chapter, Ontario Archaeological Society) 87(4): 8-16.
- 232800 Kenyon, Ian and Neal Ferris 1984 Investigations at Mohawk Village, 1983. Arch Notes (Ontario Archaeological Society) 84(1): 19-49.
- 232820 Kenyon, Ian and T. Kenyon 1986 Echo the Firekeeper: A Nineteenth Century Iroquois Site. In Studies in Southwestern Ontario Archaeology. Occasional Publications No. 1 of the London Chapter of the Ontario Archaeological Society, pp. 68-91.
- 233000 Kenyon, T. (n.d.) Clay Smoking Pipes. In **The A.C.O. Guide to 19th Century Sites.** Ontario Ministry of Culture and Recreation, Historical Planning and Research Branch, London Office.
- 235100 Kenyon, Walter 1972 White-Water Archaeology. In People and Pelts: Selected Papers of the Second North American Fur Trade Conference, edited by Malvina Bolus, pp. 145-153. Peguis Publishers, Winnipeg, Manitoba.
- 235200 Kenyon, W.A. 1982 The Grimsby Site: A Historic Neutral Cemetery. The Royal Ontario Museum, Toronto.
- 237400 Kerkkonen, Martti 1959 Peter Kalm's North American Journey: Its Ideological Background and Results. Finnish Historical Society Studia Historica 1. Finnish Historical Society, Helsinki.
- 237500 Keslin, Richard O. 1958 A Preliminary Report of the Hahn (Dg 1 and Dg 2) and Horicon (Dg 5) Sites, Dodge County, Wisconsin. The Wisconsin Archeologist 39(4).
- 237795 Kessel, John L. 1978 Diego Romero, the Plains Apaches, and the Inquisition. The American West 15: 12-16.
- 237800 Kessell, John L. 1979 Kiva, Cross, and Crown. National Park Service, Washington, D.C.
- 240000 Kidd, Kenneth E. 1954 Fashions in Tobacco Pipes Among the Iroquois Indians of Ontario. Bulletin of the Royal Ontario Museum of Archaeology 22: 15-21.

- 240500 Kidd, Robert S. 1970 Fort George and the Early Fur Trade in Alberta. Provincial Museum and Archives of Alberta Publication no. 2, Edmonton.
- 241000 Kidder, Alfred Vincent 1928 A Pipe of Unique Form from Pecos, New Mexico. Indian Notes (Museum of the American Indian, Heye Foundation) 5: 293-295.
- 241300 Kientz, Philip 1967 The Schisler Pipe. Ohio Archaeologist 17(1): 4-6.

- 241400 Killan, Gerald 1983 David Boyle: From Artisan to Archaeologist. University of Toronto Press, Toronto.
- 241450 Killebrew, J.B. and H. Myrick 1923 Tobacco Leaf: Its Culture and Cure, Marketing and Manufacture. Orange Judd, New York.
- 241500 Kimm, Silas C. 1900 The Iroquois: A History of the Six Nations of New York. Pierre W. Danforth, Middleburgh, New York.
- 241600 King, J.C.H. 1977 Smoking Pipes of the North American Indian. British Museum Publications, London.
- 241700 King, Marvin 1970 A Richland County Effigy Pipe. Ohio Archaeologist 20(3): 235.
- 241750 King, Titus 1938 Narrative of Titus King of Northampton, Mass.: A Prisoner of the Indians in Canada 1755-1758. Connecticut Historical Society, Hartford, Connecticut.
- 241800 Kinietz, W. Vernon 1940 The Indians of the Western Great Lakes 1615-1760. Occasional Contributions from the Museum of Anthropology of the University of Michigan no. 10. (reprinted in 1965 by the University of Michigan Press)
- 244000 Kinsey, W. Fred and J.R. Graybill 1971 Murry Site and its Role in Lancaster and Funk Phases of Shenks Ferry Culture. **Pennsylvania Archaeologist** 41(4).
- 245000 Kinsey, W. Fred III (editor) 1972 Archeology in the Upper Delaware Valley: A Study of the Cultural Chronology of the Tocks Island Reservoir. The Pennsylvania Historical and Museum Commission Anthropological Series no. 2, Harrisburg, Pennsylvania.

245400 Klinck, Carl F. and J.J. Talman (editors) 1970 The Journal of Major John Norton 1816. The Champlain Society, Toronto.

- 246500 Knight, Vernon J. Jr. 1975 Some Observations Concerning Plant Materials and Aboriginal Smoking in Eastern North America. Journal of Alabama Archaeology 21(2): 120-144.
- 247000 Kochan, Edward 1961 Riverhaven Sites #1 and #2, Grand Island, New York. New York State Archeological Association Bulletin no. 22.
- 247560 Kolodny, Joseph 1953 4000 Years of Service: The Story of the Wholesale Tobacco Industry and its Pioneers. Farrar, Straus and Young, New York.
- 247700 Koskowski, W. 1955 The Habit of Tobacco Smoking. Staples Press, London.
- 249000 Kraft, Herbert C. 1972 The Miller Field Site, Warren County, New Jersey. In Archeology in the Upper Delaware Valley: A Study of the Cultural Chronology of the Tocks Island Reservoir, edited by Fred Kinsey III. The Pennsylvania Historical and Museum Commission, Anthropological Series no. 2. Harrisburg, Pennsylvania.
- 250000 Kraft, Herbert C. 1975 **The Archaeology of the Tocks Island Area.** Archaeological Research Center, Seton Hall University Museum, South Orange, New Jersey.
- 251000 Kraft, Herbert C. 1978 The Minisink Site: A Reevaluation of a Late Prehistoric and Early Historic Contact Site in Sussex County, New Jersey. Archaeological Research Center, Seton Hall University Museum, South Orange, New Jerey.
- 253300 Kraus, Bertram S. 1944 Acculturation, A New Approach to the Iroquoian Problem. American Antiquity 9: 302-318.
- 253500 Krickeberg, W. 1954 Altere Ethnographica aus Nordamerika: Tabakspfeife und Calumet. **Baessler-Archive: Beiträge zur Völkerkunde** (n.s.) 2: 196-218.
- 254020 Kroeber, Alfred V. 1941 Culture Element Distributions: XV Salt, Dogs, Tobacco. University of California Publications in Anthropological Records 6(1): 1-20.

- 254040 Kroll, Oskar 1932-33. Das Chalumeau. Zeitschrift für Musikwissenschaft 15: 374-378.
- 254100 Kuhm, Herbert W. 1951 The Mining and Use of Lead by the Wisconsin Indians. The Wisconsin Archeologist 32(2).
- 254407 Kuhn, Robert D. 1987 Trade and Exchange Among the Mohawk-Iroquois: A Trace Element Analysis of Ceramic Smoking Pipes. North American Archaeologist 8(4): 305-315.
- 254425 Kuper, Adam 1973 Anthropologists and Anthropology: The British School 1922-1972. Allen Lane, London.
- 254480 La Barre, Weston 1970 Old and New World Narcotics: A Statistical Question and an Ethnological Reply. **Economic Botany** 24: 73-80.
- 254490 La Barre, Weston 1970 **The Ghost Dance: Origins of Religion.** Doubleday, New York. (reprinted in 1972 by George Allen and Unwin, London)
- 254500 La Barre, Weston 1972 Hallucinogens and the Shamanic Origins of Religion. In Felsh of the Gods, edited by Peter T. Furst, pp. 261-278. Praeger Publishers, New York.
- 254590 Labat, Jean Baptiste 1779 Treatise On The...Tobacco Plant. Montego-Bay, Jamaica.
- 257900 Lafitau, Joseph F. 1724 Moeurs des sauvages Ameriquains, comparées aux moeurs des premiers temps, 4 volumes. Paris.
- 258000 Lafitau, Joseph F. 1974, 1977 Customs of the American Indians Compared with the Customs of Primitive Times, 2 volumes, edited and translated by W.N. Fenton and E.L. Moore. The Champlain Society, Toronto.
- 258500 LaFlesche, Francis 1884 The Sacred Pipes of Friendship. Proceedings of the American Association for the Advancement of Science 33: 613-615.
- 258600 Lahontan, Baron de 1905 **Two Voyages to North America,** 2 volumes, edited by Reuben G. Thwaites. A.C. McClurg and Co., Chicago.

- 258610 Laidlaw, George E. 1902 Bird Pipes. Annual Archaeological Report for 1901, pp. 103-106. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 258612 Laidlaw, George E. 1903 Effigy Pipes in Stone. Annual Archaeological Report for 1902, pp. 37-57. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 258617 Laidlaw, George E. 1913 Ontario Effigy Pipes in Stone: 2nd Paper. Annual Archaeological Report for 1913, pp. 37-67. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 258620 Laidlaw, George E. 1914 Ontario Effigy Pipes in Stone: Third Paper. Annual Archaeological Report for 1914, pp. 44-76. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 258622 Laidlaw, George E. 1915 Ontario Effigy Pipes in Stone: Fourth Paper. Annual Archaeological Report for 1915, pp. 58-62. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 258624 Laidlaw, George E. 1916 Ontario Effigy Pipes in Stone: Fifth Paper. Annual Archaeological Report for 1916, pp. 63-83. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 258627 Laidlaw, George E. 1924 Effigy Pipes in Stone: 6th Paper. Annual Archaeological Report for 1923, pp. 57-80. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 258630 Laidler, Graham. 1942 Pont. Collins, London.
- 258650 Lambert, Marjorie F. 1956 A Prehistoric Stone Elbow Pipe from the Taos Area. El Palacio 63(3): 67-68.
- 258700 Lame Deer (John Fire) and R. Erdoes 1972 Lame Deer: Seeker of Visions. Simon and Schuster, New York.
- 263400 Lange, Frederick W. 1968 "Coffee Bean" Style Pipe From Beloit, Wisconsin. Southern Indian Studies 20: 6-11.

263600 Lange, Frederick W. 1969 The Bigelow Site (47-Pt-29) Portage County, Wisconsin: An Ethnohistoric Analysis of the Historic Artifacts. **The Wisconsin Archeologist** 50(4).

La Salle, R.R.C. Sieur de see 076560 and 454455

- 265000 Latham, Roy 1961 Three Mile Harbor Sites, East Hampton, Long Island, New York. New York State Archeological Association Bulletin no. 23.
- 266000 Latham, Roy 1965 Late Indian Graves in Laurel, Long Island, N.Y. New York State Archeological Association Bulletin no. 33.
- 267200 Latta, Martha A. 1976 **The Iroquoian Cultures of Huronia: A Study of Acculturation Through Archaeology.** Unpublished Ph.D. dissertation, University of Toronto, Toronto.
- 267222 Latta, Martha A. 1985 Identification of the 17th Century French Missions in Eastern Huronia. Canadian Journal of Archaeology 9(2): 147-171.

٠÷

- 267400 Laufer, Berthold 1924 Tobacco and Its Use in Asia. Field Museum of Natural History Anthropology Leaflet 18: 57-95.
- 267500 Laufer, Berthold 1924 Introduction of Tobacco into Europe. Field Museum of Natural History Anthropology Leaflet 19: 97-162.
- 267700 Laufer, Berthold, W.D. Hambly and R. Linton 1930 Tobacco and Its Use in Africa. Field Museum of Natural History Anthropology Leaflet 29: 163-207.
- 267800 Laufer, Berthold 1931 Tobacco in New Guinea: An Epilogue. American Anthropologist (n.s.) 33: 138-140.
- 267830 Lavadière, C.H. 1870 Oeuvres de Champlain, 3 volumes. Québec.
- 267850 Lawson, Colin 1979 The Chalumeau: Independent Voice or Poor Relation? Early Music 7: 351-354.
- 267875 Lawson, John 1967 A New Voyage to Carolina, edited by H.T. Lefler. University of North Carolina Press, Chapel Hill.

268550 Le Clercq, Chrestien 1881 First Establishment of the Faith in New France, 2 volumes, edited by J.G. Shea. New York.

- 271050 Leechman, Douglas 1944 Further Light On "Wooden Tubes" From Oregon. American Antiquity 9: 451.
- 272500 Lehner, Ernst and J. Lehner 1962 Folklore and Odysseyes of Food and Medicinal Plants. Tudor Publishers, New York.
- 275000 Lenig, Wayne 1977 Archaeology, Education and the Indian Castle Church. New York State Archeological Association Bulletin no. 69.
- 276000 Lenik, Edward J. 1974 Charlotteburg Middle Forge. Bulletin of the Archaeological Society of New Jersey no. 30.
- 277000 Lenik, Edward J. 1975 The Ford Powder Mill Site. Bulletin of the Archaeological Society of New Jersey no. 32.
- 277010 Lenik, Edward J. 1977 The Spirit Pond Shellheap. Archaeology of Eastern North America 5: 94-107.
- 278000 Lennox, Paul A. 1981 The Hamilton Site: A Late Historic Neutral Town. National Museum of Man Mercury Series, Archaeological Survey of Canada no. 103.
- 278050 Lennox, P.A., C.F. Dodd and C.R. Murphy n.d. The Wiacek Site: A Late Middleport Component, Simcoe County, Ontario. The Ontario Ministry of Transportation and Communications Environmental Unit, Planning and Design Section Southwest Region, London.
- 278100 Le Page Du Pratz, Antoine S. 1758 Histoire de la Louisiane..., 3 volumes. Paris.
- 278900 Lescarbot, Marc 1609 Histoire de la Nouvelle France. Paris. (other editions in 1611 and 1618)
- 279000 Lescarbot, Marc 1907-1914 **The History of New France**, 3 volumes, translated and edited by W.L. Grant. The Champlain Society, Toronto. (translation of the 1618 edition)

279020 Lescarbot, Marc 1928 Nova Francia: A Description of Acadia, 1606. George Routledge and Sons, London. (reprint of 1609 English edition by P. Erondelle)

Į.

- 279100 Leslie, Vernon 1970 The Pointillé Pipe In the Upper Delaware Valley: Contribution No. 5, To Tocks Island Reservoir Area Archaeology. **The Chesopiean** 8: 57-66.
- 279500 le Strange, Richard 1977 A History of Herbal Plants. Arco Publishers, New York.
- 280000 Le Sueur, Jacques 1952 History of the Calumet and of the Dance (1744). Contributions from the Museum of the American Indian (Heye Foundation), 12(5): 1-22.
- 280050 Levermore, Charles H. (editor) 1912 Forerunners and Competitors of the Pilgrims and Puritans...1601-1625, 2 volumes. New England Society, Brooklyn, New York.
- 280250 Lewin, Louis 1964 **Phantastica: Narcotic and Stimulating Drugs.** Rutledge and Kegan Paul, London.
- 280300 Lewis, Albert, B. 1924 Use of Tobacco in New Guinea and Neighboring Regions. Field Museum of Natural History Anthropology Leaflet 17: 45-54.
- 280400 Lewis, Albert B. 1931 Tobacco in New Guinea. American Anthropologist (n.s.) 33: 134-138.
- 280430 Lewis, Walter H. and M.P.F. Elvin-Lewis 1977 Medical Botany. John Wiley, New York.
- 280453 Libermann, Gisèle and Conrad Libermann 1975 Les civilisations du tabac: signification rituelle et sociale chez les indiens d'Amérique. Flammes et Fumées 73(1): 1-72.
- 280469 Lindeström, Peter 1925 Geographia Americae with an Account of the Delaware Indians based on Surveys and Notes Made in 1654-1656 (1691), edited by Amandus Johnson. The Swedish Colonial Society, Philadelphia.
- 280480 Linton, Adelin and C. Wagley 1971 Ralph Linton. Columbia University Press, New York.

- 280500 Linton, Ralph 1924 Use of Tobacco among North American Indians. Field Museum of Natural History Anthropology Leaflet 15: 1-27.
- 280650 Livesay, James A. Jr. 1971 An Unfinished Platform Pipe, Buckingham County, Virginia. Quarterly Bulletin of the Archaeological Society of Virginia 25: 281.
- 280760 Long, John 1904 Voyages and Travels of an Indian Interpreter and Trader, Describing the Manners and Customs of the North American Indians. In Early Western Travels, 1748-1846, Volume 2, edited by Reuben G. Thwaites. A.H. Clark, Cleveland, Ohio.

Long, Stephen H. see 220100 and 229500

- 280780 Longfellow, Henry W. 1855 The Song of Hiawatha. Boston.
- 283000 Lopez, Julius and S. Wisniewski 1972 The Ryders Pond Site II. New York State Archeological Association Bulletin no. 53.
- 284200 Loring, Stephen 1985 Boundary Maintenance, Mortuary Ceremonialism and Resource Control in the Early Woodland: Three Cemetery Sites in Vermont. Archaeology of Eastern North America 13: 93-127.
- 284500 Louden, J.C. (editor) A Catalogue of All the Plants Indigenous, Cultivated in, or introduced to Britain. Longman, Brown, Green, and Longmans, London.
- 284600 Loudon, Archibald 1808 A Selection of Some of the Most Interesting Narratives, of Outrages, Committed by the Indians, in Their Wars with the White People, 2 volumes. Carlisle. (reprint edition by Arno Press, 1971)
- 287500 Lowie, Robert H. 1919 The Tobacco Society of the Crow Indians. Anthropological Papers of the American Museum of Natural History 21(2): 99-200.
- 289250 Lubbock, John 1869 Pre-Historic Times as Illustrated by Ancient Remains, and the Manners and Customs of Modern Savages, second edition. London.

- 289255 Lubbock, John 1913 Prehistoric Times as Illustrated by Ancient Remains and the Manners and Customs of Modern Savages, seventh edition. Williams and Norgate, London.
- 290320 Luedtke, Barbara E. 1980 The Calf Island Site and the Late Prehistoric Period in Boston Harbor. Man in the Northeast 20: 25-76.
- 290350 Lukosevicius, P.P. 1980 Tobacco Culture in Quebec. The Lighter (Agriculture Canada) 50(3): 5-11.
- 290400 Lumholtz, Carl 1912 New Trails in Mexico: An Account of One Year's Exploration in North-Western Sonora, Mexico, and South-Western Arizona, 1909-1910. Charles Scribner's Sons, New York.
- 290700 Lydekker, John W. 1938 **The Faithful Mohawks.** Cambridge University Press, Cambridge.
- 291000 Lynott, Mark J. 1974 The Ferrier Site (SIS-33). The Michigan Archaeologist 20(3-4).
- 291100 Lyons, A.P. 1953 Whence Came New Guinea's "Native" Tobacco? Pacific Islands Monthly 23(9): 65.
- 291300 Machen, Arthur (under pseud. Leolinus Siluriensis) 1884 The Anatomy of Tobacco. London. (republished in 1926 by Alfred A. Knopf, New York)
- 291400 MacInnes, C.M. 1926 **The Early English Tobacco Trade.** Kegan, Paul, Trench, Trubner and Co., London.
- 291455 Mackenzie, Alexander 1927 Voyages From Montreal on the River St. Lawrence Through The Continent of North America to the Frozen and Pacific Oceans in the Years 1789 and 1793. Radisson Society of Canada, Toronto.
- 291500 Mackenzie, Compton 1958 Sublime Tobacco. Chatto and Windus, London.
- 291802 Mackenzie, R. 1986 Tobacco Still Smells Sweet to North Carolina Farmers. Insight 2(20): 10-12. Abstracted in Smoking and Health Bulletin March-April 1987: 145.

- 292000 Mackenzie, Robert 1882 America: A History. London.
- 292300 MacLean, John 1896 Canadian Savage Folk. Toronto.
- 292500 MacLeod, W.C. 1930 The Chewing of Tobacco in Southeastern North America. American Anthropologist (n.s.) 32(3): 574-575.
- 292700 MacNeish, Richard S. 1952 The Archeology of the Northeastern United States. In Archeology of Eastern United States, edited by James B. Griffin. University of Chicago Press, Chicago.
- 292800 Magnen, Johann C. 1648 Exercitationes de Tabaco. Pavia.
- 292900 Maher, Robert F. 1981 The Boatworks Site (DA-11) on the Yahara River, Dane County. The Wisconsin Archeologist 62(2): 135-167.
- 292970 Main, Gloria L. 1982 **Tobacco Colony: Life in Early Maryland 1650-1720.** Princeton University Press, Princeton, New Jersey.
- 292975 Mainfort, Robert C. Jr. 1985 Wealth, Space, and Status in A Historic Indian Cemetery. American Antiquity 50: 555-579.
- 292980 Malefijt, Annemarie de Waal 1974 Images of Man: A History of Anthropological Thought. Alfred A. Knopf, New York.
- 293000 Mallery, Garrick 1889 Drinking Tobacco. American Anthropologist 2(2): 141-142.
- 293500 Manning, T.H. 1948 Pipestems of the Caribou Eskimos. American Anthropologist 50(1): 162-163.
- 293950 Marbecke, Roger 1602 A Defence of Tabacco. London.
- 294000 Marchiando, Patricia 1972 Bell-Browning Site 28-Sx-19. In Archeology in the Upper Delaware Valley: A Study of the Cultural Chronology of the Tocks Island Reservoir, edited by W. Fred Kinsey III. The Pennsylvania Historical and Museum Commission Anthropological Series no. 2, Harrisburg, Pennsylvania.

- 294500 Marin, Carmen M. 1079 Tobacco Literature: A Bibliography. **Tobacco Literature Service Technical Bulletin** no. 258. North Carolina Agricultural Research Service.
- 294600 Marin, Carmen M. 1982 **Theses on Tobacco.** Tobacco Literature Service, D.H. Hill Library, North Carolina State University, Raleigh, North Carolina.
- 295000 Martin, Robert A. 1977 The Ponkapoag Site: M-35-7. Bulletin of the Massachusetts Archaeological Society 38(3).

- 296000 Martinez, Charles H. 1977 Archeological Investigations at the Daniel Broughton House, Franklin Village, Michigan. **The Michigan** Archaeologist 23(4).
- 296300 Martyn, Howe 1933(?) **Tobacco In Canada: Notes on the Economic History.** Unpublished manuscript, Toronto, Canada.
- 296500 Mason, J. Alden 1924 Use of Tobacco in Mexico and South America. Field Museum of Natural History Anthropology Leaflet 16: 29-43.
- 296800 Mason, Ronald J. 1968 Fox Valley Archaeology 1: James Island Site. The Wisconsin Archeologist 49(2).
- 296850 Mason, Ronald J. 1981. Great Lakes Archaeology. Academic Press, Toronto.
- 296950 Massicotte, E.Z. 1921 Notes sur la culture et l'usage du tabac dans la Nouvelle-France. Bulletin des Recherches Historiques 27(10): 289-297.
- 296980 Mather, Cotton 1721 The Christian Philosopher: A Collection of the Best Discoveries in Nature, With Religious Improvements. Republished in 1968 by Scholars' Facsimiles, Gainesville, Florida.
- 297000 Mathews, Zena Pearlstone 1976 Huron Pipes and Iroquoian Shamanism. Man in the Northeast 12: 15-31.
- 298000 Mathews, Zena Pearlstone 1978 The Relation of Seneca False Face Masks to Seneca and Ontario Archaeology. Garland Publishing, New York.

- 299000 Mathews, Zena Pearlstone 1979 Pipes With Human Figures From Ontario and Western New York. American Indian Art Magazine Summer 1979: 42-47, 89.
- 300000 Mathews, Zena Pearlstone 1980 Of Man and Beast: The Chronology of Effigy Pipes Among Ontario Iroquoians. **Ethnohistory** 27(4): 295-307.
- 301000 Mathews, Zena Pearlstone 1981 The Identification of Animals on Ontario Iroquoian Pipes. **Canadian Journal of Archaeology** 5: 31-48.
- 302000 Mathews, Zena Pearlstone 1981 Janus and Other Multiple-Image Iroquoian Pipes. Ontario Archaeology 35: 3-22.
- 302200 Mathews, Zena Pearlstone 1981 Art Historical Photodocumentation of Iroquoian Effigy Pipes. Annals of the New York Academy of Sciences 376: 161-176.
- 302500 Mathews, Zena Pearlstone 1982 On Dreams and Journeys: Iroquoian Boat Pipes. American Indian Art Magazine Summer 1982: 46-51, 80.
- 303340 Matlack, Harry 1985 Clearfield County Pipes. Indian-Artifact Magazine 4(2): 4-6.
- 303650 Mauss, Marcel 1969 The Gift: Forms and Functions of Exchange in Archaic Societies. Routledge and Kegan Paul, London and Henley.
- 303700 Maximilian, Prince of Wied 1906 Travels in the Interior of North America. In Early Western Travels 1748-1846, Volumes 22-24, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 304000 Maxwell, Moreau S. 1964 Indian Artifacts at Fort Michilimackinac, Mackinaw City, Michigan. The Michigan Archaeologist 10(2).
- 304200 May, Alan G. 1942-43 The Moses Coulee Pipe. American Antiquity 8: 167-169.
- 304300 Mayne, Roger 1975 A Pipe from the Meuser Collection. Ohio Archaeologist 25(2): 22.
- 304800 McAdie, Alexander 1930 Shakespeare On Smoking. Harvard Graduates' Magazine 38(151): 281-286.

- 304900 McCary, Ben C. and N.F. Barka 1977 The John Smith and Zuniga Maps in the Light of Recent Archaeological Investigations along the Chickahominy River. Archaeology of Eastern North America 5: 73-86.
- 305000 McCashion, John H. 1975 The Clay Tobacco Pipes of New York State Part One: Caughnawaga 1667-1693. New York State Archeological Association Bulletin 65: 1-19.
- 305050 McCashion, John H. 1979 A Unique Dutch Clay Tobacco Pipe from the Blowers Oneida Site and a Preliminary Statement on the Seventeenth Century Oneida Sequence Based on The Pipe Data. New York State Archeological Association, Chenango Chapter Bulletin 18(1).
- 305060 McCashion, John H. 1979 A Preliminary Chronology and Discussion of Seventeenth and Early Eighteenth Century Clay Tobacco Pipes From New York State Sites. In **The Archaeology of the Clay Tobacco Pipe**, Volume 2, edited by Peter Davey, pp. 63-149. B.A.R. International Series 60.
- 306000 McCashion, John H. and T. Robinson 1977 The Clay Tobacco Pipes of New York State Part 2. Under the Sidewalks of New York: Archaeological Investigations Near the U.S. Customs House on Manhattan Island, New York. New York State Archeological Association Bulletin 71: 2-19.
- 306600 McClintock, Walter 1948 Blackfoot Medicine-Pipe Ceremony. Southwest: Museum Leaflets (Los Angeles) 21: 1-11.
- 306700 McCullen, J.T. Jr. 1962 The Tobacco Controversy, 1571-1961. North Carolina Folklore 10: 30-35.
- 306730 McCullen, J.T. Jr. 1966 Shakespeare and the Tobacco Controversy. Kentucky Folklore Record 12(1): 6-10.
- 306740 McCullen, J.T. Jr. 1966 Tobacco: Origin Narratives. North Carolina Folklore 14: 21-25.
- 306750 McCullen, J.T. Jr. 1967 Indian Myths Concerning the Origin of Tobacco. New York Folklore Quarterly 23: 264-273.
- 306800 McDermott, John F. (editor) 1940 **Tixier's Travels on the Osage Prairies.** University of Oklahoma Press, Norman.

308000 McGuire, Joseph D. 1899 Pipes and Smoking Customs of the American Aborigines Based on Material in the U.S. National Museum. Annual Report of the Board of Regents of the Smithsonian Institution. Report of the U.S. National Museum Part 1: 351-645. Washington.

l

- 308015 McGuire, Joseph D. 1904 Reply to Who Made the Effigy Pipes? Annual Archaeological Report for 1903, pp. 43-46. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 308020 McGuire, Joseph D. 1910 Pipes. In Handbook of American Indians North of Mexico, Volume 2, edited by F.W. Hodge, pp. 257-260. Bureau of American Ethnology Bulletin 30.
- 308022 McGuire, Joseph D. 1910 Smoking. In Handbook of American Indians North of Mexico, Volume 2, edited by F.W. Hodge, pp. 603-604. Bureau of American Ethnology Bulletin 30.
- 308024 McGuire, Joseph D. 1910 Tobacco. In Handbook of American Indians North of Mexico, Volume 2, edited by F.W. Hodge, pp. 767-769. Bureau of American Ethnology Bulletin 30.
- 310230 McIntyre, L. and C.P. Shah 1986 Prevalence of Hypertension, Obesity and Smoking in Three Indian Communities in Northwestern Ontario. Canadian Medical Association Journal 134(4): 345-349. Abstracted in: Smoking and Health Bulletin Sept.-Oct. (1986): 335.
- 310350 McKern, W.C. 1934 The George A. West Pipe Monograph. The Wisconsin Archeologist (n.s.) 14(2): 31-33.
- 311000 McKusick, Marshall 1970 The Davenport Conspiracy. State Archaeologist of Iowa Report no. 1, Iowa City, Iowa.
- 311500 McLachlan, R.W. 1875 Indian Stone Pipes. The Canadian Antiquarian and Numismatic Journal 4(1): 15-22.
- 312020 McWilliams, Richebourg G. (editor) 1953 Fleur de Lys and Calumet: Being the Pénicaut Narrative of French Adventure in Louisiana. Louisiana State University Press, Louisiana.

- 312100 Megapolensis, Johannes 1857 A Short Sketch of the Mohawk Indians in New Netherland (1644). Collections of the New York Historical Society, second series 3(1): 137-160.
- 312290 Mehra, K.L. 1966 Portuguese Introduction of Fruit Plants into India. Indian Horticulturalist 10: 9-12.

k

- 312350 Menard, Russell R. and L.G. Carr 1982 The Lords Baltimore and the Colonization of Maryland. In Early Maryland in a Wider World, edited by David B. Quinn, pp. 167-215. Wayne State University Press, Detroit.
- 312400 Mendenhall, Walter L. 1930 Tobacco. Harvard Health Talks, 17, Harvard University Press, Cambridge.
- 312450 Mendoza, Nestor U. 1956 El Tabaco entre las Tribus Indigenas de Colombia. **Revista Colombiana de Antropologia** (Bogota) 5: 13-52.
- 312500 Merrill, E.D. 1930 Tobacco in New Guinea. American Anthropologist (n.s.) 32: 101-105.
- 312700 Merrill, E.D. 1946 Further Notes on Tobacco in New Guinea. American Anthropologist 48: 22-30.
- 312780 Meuser, Gordon F. 1971 A Human Effigy Pipe. Ohio Archaeologist 21(2): 20-21.
- 312782 Meuser, Gordon F. 1971 An Iroquoian Effigy Pipe. Ohio Archaeologist 21(2): 29.
- 312783 Meuser, Gordon F. 1971 Pipes from the Meuser Collection. Ohio Archaeologist 21(2): 31.
- 312820 Michaux, F.A. 1904 Travels to the West of the Alleghany Mountains...Undertaken, in the Year 1802. In Early Western Travels, Volume 3, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 312840 Middleton, Arthur P. 1953 Tobacco Coast: A Maritime History of Chesapeake Bay in the Colonial Era. The Mariners' Museum, Newport News, Virginia.

- 312850 Miles, Charles 1972 Evolution of Pipes. Central States Archaeological Journal 19: 83-85.
- 312865 Miller, C.F. 1952 Pipes from the Clarksville Site, Mecklenburg, Va. Quarterly Bulletin of the Archaeological Society of Virginia 6(4): n.p.
- 312869 Millor, Fred 1978 Tobacco and Smoking Phenomena in the Sun Dance Religion of the Crow Indians of Montana: A Study in the Dynamics of the Sacred. Unpublished Ph.D. dissertation, Temple University, Philadelphia, Pennsylvania.
- 312973 Millspaugh, Charles F. 1974 American Medicinal Plants. Dover Publishers, New York.
- 312980 Mitchell, Vivienne 1983 The History of Nominy Plantation with Emphasis on the Clay Tobacco Pipes. In Historic Clay Tobacco Pipe Studies, Volume 2, edited by Byron Sudbury, pp. 1-38. Ponca City, Oklahoma.
- 312989 Mohler, Ed 1972 Unusual Platform Pipes. Ohio Archaeologist 22(3): 20-21.
- 312990 Mohrman, H.W. 1973 Speculations on Some Unfinished Pipes. Central States Archaeological Journal 20: 114-116.
- 312993 Moloney, Francis X. 1967 The Fur Trade in New England 1620-1676. Archon Books, Hamden, Connecticut.
- 313490 Monardes, Nicolás 1571 Segunda parte del libro, de las cosas que se traen de nuestra Indias Occidentales. Seville. (see also 313500)
- 313500 Monardes, Nicolás 1577 Joyfull Newes Out of the Newe Founde Worlde. London. (translated from the 1574 edition; reprinted in 1970 by Da Capo Press, Amsterdam)
- 314500 Moore, Clarence B. 1894 Tobacco Pipes in Shell-heaps of the St. John's. American Naturalist 28: 622-623.
- 314550 Moore, James T. 1982 Indian and Jesuit: A Seventeenth-century Encounter. Loyola University Press, Chicago.

÷

- 314600 Moorehead, Charles W. 1972 An Early Sand Tempered Elbow Pipe From The Tombigbee River. Journal of Alabama Archaeology 18(2): 167-169.
- 314700 Moorehead, W.K. 1889 A Wonderfull Pipe. American Antiquarian 11: 117-119.
- 314800 Morantz, Toby (editor) 1987 References to Tobacco in Eastmain Post Journals (1740-1750) and Fort George Journals (1805-1817). Unpublished computer transcript.
- 315000 Morgan, Lewis H. 1851 League of the HO-DE'-NO-SAU-NEE, or Iroquois. Rochester. (reprinted in 1972 by Citadel, Secaucus, New Jersey)
- 315010 Morgan, Lewis H. 1877 Ancient Society. New York. (reprinted in 1985 by University of Arizona Press)
- 315500 Morice, A.G. 1921 Smoking and Tobacco Among the Northern Dénés. American Anthropologist 23(4): 482-488.
- 315700 Morison, Samuel E. 1971 The European Discovery of America: The Northern Voyages A.D. 500-1600. Oxford University Press, New York.
- 315900 Morris, Elizabeth A. and V.H. Jones 1962 Seventh Century Evidence for the Use of Tobacco in Northern Arizona. Akten des 34. Internationalen Amerikanistenkongresses (Vienna, 1960), pp. 306-309.
- 316100 Morris, Thomas 1904 Journal of Captain Thomas Morris, of His Majesty's XVII Regiment of Infantry; Detroit, September 25, 1764. In Early Western Treadles 1748-1846, Volume 1, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 316180 Morse, Dan 1956 The Bedford Beaver Monitor Pipe. Central States Archaeological Journal 2(4): 157.
- 316200 Morse, Eric W. 1969 Fur Trade Canoe Routes of Canada. University of Toronto Press, Toronto.
- 316300 Mortine, Wayne 1975 An Unusual Vacation Discovery (Pipe). Ohio Archaeologist 25(1): 28.

- 316350 Morton, Louis 1964 Robert Carter of Nomini Hall: A Virginia Tobacco Planter of the Eighteenth Century. Dominion Fooks, Charlottesville.
- 316600 Motte, Jacob Rhett 1963 Journey into Wilderness: An Army Surgeon's Account of Life in Camp and Field during the Creek and Seminole Warz 1836-1838, edited by James F. Sunderman. University of Florida Press, Gainsville, Florida.
- 320050 Murphy, James L. 1972 An Unusual Effigy Pipe From Coshocton County. Ohio Archaeologist 22(4): 23.
- 321000 Murphy, James L. and K. Reich 1974 Nineteenth Century Reed-Stem Tobacco Pipes From the Magadore, Ohio Dump. Pennsylvania Archaeologist 44(4): 52-59.
- 322000 Murphy, James L. 1978 Shaker Reed Stem Tobacco Pipes. Pennsylvania Archaeologist 48(1-2): 48-52.
- 322010 Murphy, James L. 1986 Two Tobacco Pipe Molds From the Collection of the Ohio Historical Society. In Historic Clay Tobacco Pipe Studies, Volume 3, edited by Byron Sudbury, pp. 53-56. Ponca City, Oklahoma.
- 322011 Murphy, James L. 1986 Tobacco Pipe Fragments from Schoenbrunn, Tuscarawas County, Ohio. In Historic Clay Tobacco Pipe Studies, Volume 3, edited by Byron Sudbury, pp. 65-68, Ponca City, Oklahoma.
- 322200 Murray, Elsie 1945 Stone Tubes in Bradford County, Pa.: An Enigma. Pennsylvania Archaeologist 15(1): 10-24.
- 322300 Murray, Robert A. 1962 A Brief Survey of the Pipes and Smoking Customs of the Indians of the Northern Plains. **Minnesota Archaeologist** 24: 4-41.
- 322400 Muscovalley, Milton 1969 A Columbus, Kentucky Calumet. Central States Archaeological Journal 16: 30-31.
- 322500 Musgrave, J.E.T. 1934 Canadian Tobacco. Canadian Geographical Journal 8(6): 277-289.

- 322600 Mussey, R.D. 1839 An Essay on the Influence of Tobacco Upon Life and Health, third edition. Cincinnati.
- 322900 Myers, Albert C. 1912 Narratives of Early Pennsylvania, West New Jersey and Delaware 1630-1707. Charles Scribner's Sons, New York.
- 323350 Nadaillac, Jean F.M. de 1885 Les pipes et le tabac: materiaux pour l'histoire primitive et naturelle de l'homme. Paris.
- 324020 Nammack, Georgiana C. 1969 Fraud, Politics, and Dispossession of the Indians. University of Oklahoma Press, Norman, Oklahoma.
- 324050 Naranjo, Plutarco 1983 Ayahuasca: Etnomedicina y Mitologia. Ediciones Libri Mundi.
- 324100 Nasatir, A.P. 1952 Before Lewis and Clark, 2 volumes. St. Louis Documents Foundation, St. Louis.
- 324200 Neander, Johannes 1622 Tabacologia. Leyden. (see also 324210)
- 324210 Neander, Johannes 1626 Traité du tabac ou nicotine, panacée, petun. Lyon.
- 324450 Neill, Edward D. 1880 Relation of M. Pénicaut. Collections of the Minnesota Historical Society Vol. 3,, Saint Paul, Minnesota.
- 324500 Neill, Wilfred T. 1955 The Calumet Ceremony of the Seminole Indians. The Florida Anthropologist 8(1): 83-88.
- 328000 Newell, William B. 1965 Crime and Justice among the Iroquois Nations. Caughnawaga Historical Society, Montreal, Quebec.
- 328010 Newman, Peter C. 1987 Canada's Fur-Trading Empire. National Geographic Magazine 172(2): 192.
- 328600 Nicot, Jean 1573 Dictionaire françois-latin. Paris.
- 328605 Nicot, Jean 1606 Thresor de la langue françoyse. Paris.

- 329000 Noble, William C. 1968 "Vision Pits," Cairns and Petroglyphs at Rock Lake, Algonquin Provincial Park, Ontario. Ontario Archaeology no. 11.
- 334000 Noble, William C. 1979 Ontario Iroquois Effigy Pipes. Canadian Journal of Archaeology 3: 69-90.
- 334050 Noble, William C. 1981 Prehistory of the Great Slave Lake and Great Bear Lake Region. In: Subarctic, edited by June Helm, pp. 97-106. Handbook of North American Indians, Volume 6, William G. Sturtevant, general editor. Smithsonian Institution, Washington, D.C.
- 334700 Nóbrega, Manuel da 1559-1565 Diversi Avisi. Venice.
- 334900 Noël Hume, Audrey 1979 Clay Tobacco Pipes Excavated at Martin's Hundred, Virginia, 1976-1978. In The Archaeology of the Clay Tobacco Pipe, Volume 2, edited by Peter Davey, pp. 3-36. B.A.R. International Series 60.
- 335000 Noël Hume, Ivor 1974 Tobacco Pipes and Smoking Equipment. In A Guide to Artifacts of Colonial America by Ivor Noél Hume, pp. 296-313. Knopf, New York.
- 335010 Noël Hume, Ivor 1975 Historical Archaeology. W.W. Norton, New York.
- 336030 Nordenskiöld, Erland Frhr. von 1908 Südamerikanische Rauchpfeifen. Globus 93(19): 293-298.

Norton, John see 245400

- 336047 Norton, Thomas Elliot 1974 The Fur Trade in Colonial New York 1686-1776. The University of Wisconsin Press, Madison, Wisconsin.
- 336080 Nuttall, Thomas 1905 A Journal of Travels into the Arkansa Territory, during the year 1819. In Early Western Travels 1748-1846, Volume 13, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 336100 Nydahl, Theodore L. 1950 The Pipestone Quarry and the Indians. Minnesota History 31(4): 193-208.

336160 O'Callaghan, Edmund B. 1849-1851 The Documentary History of the State of New-York, 4 volumes. Albany.

- 336170 O'Callaghan, Edmund B. (editor) 1856-1887
   Documents Relative to the Colonial History of the State of New York; Procured in Holland, England and France by J.P. Brodhead, 15 volumes (vols. 12-15 edited by B. Fernow). Albany.
  - 336200 Ochsner, Alton, S. Fagerberg, J.L. Milam and K.S. Fagerberg, 1976 Tobacco and Marijuana. Paladin House, Geneva, Illinois.
  - 336220 Ochsner, Eugene E. 1978 Artifacts from the Ochsner Collection. Ohio Archaeologist 28(3): 35.
  - 336300 Oerichbauer, Edgar S. 1982 Archaeological Excavations at the Site of a North West and XY Company Winter Post (47-Bt-26): A Progress Report. The Wisconsin Archeologist 63(3): 153-236.
  - 336430 Ogden, George W. 1905 Letters from the West. In Early Western Travels 1748-1846, Volume 19, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
  - 336490 Omwake, H.G. 1958 Kaolin Pipes from the Schurz Site. Bulletin of the Archaeological Society of Connecticut no. 29.
  - 336492 Omwake, H.G. 1959 White Kaolin Pipes from the Oscar Leibhart Site. In Susquehanna Miscellany, edited by J. Witthoft and F. Kinsey, pp. 126-135. Pennsylvania Historical Museum Commission, Harrisburg, Pennsylvania.
  - 336500 Omwake, H. Geiger 1965 Analysis of 19th Century White Kaolin Pipe Fragments From the Mero Site, Door County, Wisconsin. The Wiscongin Archeologist 46(2): 125-139.
  - 337000 Omwake, H.G. 1972 Report on the Examination of Four White Kaolin Pipes from the Ryder's Pond Site, Brooklyn, King's County, New York. New York State Archaeological Association Bulletin 56: 23-24.
  - 337800 Opler, Marvin K. 1970 Cross-Cultural Uses of Psychoactive Drugs (Ethnopsychopharmacology). In Principles of Psychopharmacology, edited by W.G. Clark et. al., pp. 31-47. Academic Press, New York.

## Bibliography

- 338000 Oramas, Ada 1982 Out of Myths and Legends Emerge a Real Personage: The Tobacco. Cuba Tabaco International 8: 57-65.
- 339600 Orr, Rowland B. 1911 Stone Pipes. Annual Archaeological Report for 1908-11, pp. 37-42. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 339605 Orr, Rowland B. 1911 Pipes. Annual Archaeological Report for 1908-11, pp. 55-63. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 339610 Orr, Rowland B. 1913 Pipes. Annual Archaeological Report for 1913, pp. 90-92. Appendix to the Report of the Minister of Education of Ontario, Toronto.
- 350000 Ortiz, Fernando 1947 Cuban Counterpoint; Tobacco and Sugar. Alfred A. Knopf, New York.
- 353000 Ott, Jonathan 1976 Hallucinogenic Plants of North America. Wingbow Press, Berkeley.
- 353700 Oviedo y Valdés, Gonzalo Fernández de 1535 La Historia General delas Indias. Seville.
- 354000 Oxford English Dictionary 1933 Volume 2. Clarendon Press, Oxford.
- 354500 Ozanne, Paul 1969 The Diffusion of Smoking in West Africa. Odu: A Journal of West African Studies (n.s.) 2: 29-42.
- 355040 Painter, Floyd 1969 President Pipes - A Summary. The Chesopiean 7(2): 47.
- 355050 Painter, Floyd 1976 Chesapeake Cult Symbols On A Pipe From Staten Island. **The Chesopiean** 14: 104-106.
- 355090 Palmer, Joel 1906 Journal of Travels Over the Rocky Mountains, to the Mouth of the Columbia River; Made During the Years 1845 and 1846. In Early Western Travels 1748-1846, Volume 30, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.

- 355118 Pargellis, Stanley 1959 An Account of the Indians in Virginia. The William and Mary Quarterly 16(2): 228-243.
- 355170 Parker, Arthur C. 1910 Iroquois Uses of Maize and Other Food Plants. New York State Museum Bulletin 144(482): 5-113. (reprinted in Parker on the Iroquois, edited by William N. Fenton. Syracuse University Press, Syracuse, New York, 1968)
- 355234 Parker, Arthur C. 1926 An Analytic History of the Seneca Indians. **Researches** and Transactions of the New York State Archaeological Association 6(1-5). (reprinted in 1970 by Kraus Reprint, New York)
- 355300 Parker, John (editor) 1976 The Journals of Jonathan Carver and Related Documents, 1766-1770. Minnesota Historical Society Press, St. Paul, Minnesota.
- 355320 Parkman, Francis 1899 The Jesuits in North America in the Seventeenth Century, 2 volumes. Toronto.
- 355350 Pastore, Ralph T. 1987 Fishermen, Furriers, and Beothuks: The Economy of Extinction. Man in the Northeast 33: 47-62.
- 355500 Patterson, George 1894 Monitor Pipe in Nova Scotia. The American Antiquarian and Oriental Journal 16: 114-115.

Pattie, James O. see 131815

- 356030 Paulli, Simon 1665 Commentarius de Abusu Tabaci Americanorum Veteri et Herbae Thee. Argentorati and Strassburg.
- 356280 Pearce, Grayson 1968 Long Creek Midden, Part 4: Clay Tobacco Pipes. The Chesopiean 6: 44-46.
- 356400 Pearce, Grayson B. and F. Painter 1968 A Decorated Stone Pipe With A Bone Stem: Long Creek Midden, Part 6. **The Chesopiean** 6: 144-145.
- 357050 Pease, Theodore C. and R.C. Werner (editors) 1934 The French Foundations 1680-1693. Collections of the Illinois State Historical Library Volume 23, French Series Volume 1. Illinois State Historical Library, Springfield, Illinois.

- 357060 Pease, Theodore C. and E. Jenison (editors) 1940 Illinois on the Eve of the Seven Years' War 1747-1755. Collections of the Illinois State Historical Library Volume 29, French Series Volume 3. Illinois State Historical Library, Springfield, Illinois.
- 357350 Peck, Rodney M. 1983 The Pine Hall Obtuse Angle Pipe. Indian-Artifact Magazine 2(3): 31.
- 357351 Peck, Rodney M. 1984 A Turtle Effigy Pipe from Tennessee. Indian-Artifact Magazine 3(5): 38-39.
- 357402 Peet, Stephen D. 1880 Late Discoveries. American Antiquarian 2(3): 247.
- 357405 Peet, Stephen D. 1880 New Discoveries. American Antiquarian 2(4).
- 357500 Peet, Stephen D. 1886 Animal Figures in American Art. American Antiquarian 8(1).
- 357510 Peet, Stephen D. 1886 Stone Tubes. American Antiquarian 8: 128.
- 357520 Peet, Stephen D. 1886 Human Faces in Aboriginal Art. American Antiquarian 8(3).
- 357540 Peet, Stephen D. 1886 Pipes and Mounds. American Antiquarian 8: 256.
- 357550 Peet, Stephen D. 1886 Remarkably Shaped Pipes. American Antiquarian 8: 300.
- 357560 Peet, Stephen D. 1886 Extra-Limital Animals and Mound Builder's Pipes. American Antiquarian 8: 308-313.
- 357570 Peet, Stephen D. 1890 Historic and Prehistoric Relics: How They Are to be Distinguished. American Antiquarian 12(1).
- 357590 Peet, Stephen D. 1890 The Difference Between Indian and Mound Builder's Relics. American Antiquarian 12(5).
- 357600 Peet, Stephen D. 1890 Archaeological Notes: Novel Pipes. American Antiquarian 12: 302-303.

•

- 357700 Peets, Orville H. 1963 Rouletting--A Misnomer (for pipe designs). American Antiquity 29: 113-114.
- 357800 Pena, Pierre and M. de l'Obel 1571 Stirpium adversaria nova. London.
- 357900 Penafiel, Antonio 1886 Wanted - Indian Pipes. American Antiquarian 8: 115.
- 357940 Pena Montenegro, Alonso de la 1668 Itinerario Para Parochos De Indios. Madrid.
- 368000 Pendergast, James F. 1981 The Glenbrook Village Site: A Late St. Lawrence Iroquoian Component in Glengarry County, Ontario. National Museum of Man Mercury Series, Archaeological Survey of Canada Paper 100.
- 368015 Pendergast, James F. 1985 Huron - St. Lawrence Iroquois Relations in the Terminal Prehistoric Period. **Ontario Archaeology** 44: 23-39.
- 368200 Pendery, Steven R. 1986 Merchants and Artisans in Colonial Charlestown, Massachusetts. Archaeology 39(3): 64-65, 76-77.
- 368300 Pendleton, William 1974 A Ceremonial Tubular Pipe. Journal of Alabama Archaeology 20(1): 117-122.

Pénicaut see 312020 and 324450

- 368400 Penman, John T. 1978 Archaeology of a Late Nineteenth-Century Shoemaker's Shop, Mineral Point, Wisconsin. The Wisconsin Archeologist 59(3).
- 368450 Penn, W.A. 1901 **The Soverane Herbe: A History of Tobacco.** Grant Richards, London and E.P. Dutton, New York.
- 368485 Penney, Gerald and H. Nicol 1984 Burnt Knaps: A Micmac Site in Newfoundland. Canadian Journal of Archaeology 8(1): 57-69.
- 368500 Pepper, George H. 1920 A Stone Effigy Pipe From Kentucky. Indian Notes and Monographs (Museum of the American Indian, Heye Foundation) 10(1): 1-20.
- 369000 Pepper, George H. 1924 Metal Effigy Pipe From New York. Indian Notes (Museum of the Amorican Indian, Heye Foundation) 1: 22-23, 25.

- 369100 Perino, Gregory 1962 Hopewellian Art - The Gilcrease Raven Pipe. Central States Archaeological Journal 9: 16-17, 29.
- 369150 Perino, Gregory 1965 The Mississippi Frog-Effigy Pipes. Central States Archaeological Journal 12(2): 62-67.
- 369200 Perino, Gregory 1968 Two Pipe Types with Diverse Cultural Origins. Central States Archaeological Journal 15: 44-48.
- 369250 Perino, Gregory 1974 A Bust Type Wood Duck Platform Pipe. Central States Archaeological Journal 21(1): 22-23.
- 369300 Perino, Gregory, T. Jose and J. Rose 1966 A Late Hopewell, Early Late Woodland Pipe. Central States Archaeological Journal 13: 76-78.
- 369500 Perkins, G.H. 1893 The Calumet in the Champlain Valley. Popular Science Monthly December: 238-247.
- 369600 Perlman, Stephen M. 1979 The Sandy Point Site: An Example of Research Designs in Contract Archeology. Man in the Northeast 17: 55-124.
- 369700 Perry, W.J. 1923 The Children of the Sun: A Study in the Early History of Civilization. Methuen, London. (reprinted in 1927)
- 370000 Petersen, Eugene T. 1963 Some 18th Century Clay Pipes Found at Mackinac. The Michigan Archaeologist 9(1): 3-11.
- 370500 Peterson, A. Everett 1933 Population and Industry. In History of the State of New York, Volume 1, edited by A.C. Flick. Columbia University Press, New York.
- 371000 Peterson, Harold L. 1971 American Indian Tomahawks. Contributions from the Museum of the American Indian (Heye Foundation) 19.
- 371200 Pfeiffer, Michael A. 1982 Clay Tobacco Pipes and the Fur Trade of the Pacific Northwest and Northern Plains. Unpublished M.A. Thesis, University of Idaho.
- 371310 Pfeiffer, Michael A. 1983 clay Tobacco Pipes from Five Archaeological Sites in Nebraska. In Historic Clay Tobacco Pipe Studies Volume 2, edited by Byron Sudbury, pp. 39-47. Ponca City, Oklahoma.

- 371315 Pfeiffer, Michael A. 1983 W. White Pipes from the Foote House Dump, 10 AA 96. In Historic Clay Tobacco Pipe Studies, Volume 2, edited by Byron Sudbury, p. 48. Ponca City, Oklahoma.
- 371320 Pfeiffer, Michael A. 1983 Clay Tobacco Pipes From the Town of Lillooet, British Columbia. In Historic Clay Tobacco Pipe Studies, Volume 2, edited by Byron Sudbury, pp. 61-66. Ponca City, Oklahoma.
- 371340 Pfeiffer, Michael A. 1983 Clay Tobacco Pipes From Hudson's Bay Company's Bellevue Farm, San Juan Island, Washington (45-SJ-295). In The Archaeology of the Clay Tobacco Pipe, Volume 8 (America), edited by Peter Davey, pp. 161-183. B.A.R. International Series 175.
- 371350 Pfeiffer, Michael A. 1983 Tobacco-Related Artifact Assemblage From the Martinez Adobe, Pinole, California. In The Archaeology of the Clay Tobacco Pipe, Volume 8 (America), edited by Peter Davey, pp. 185-194. B.A.R. International Series 175.
- 371400 Philaretes 1602 Work for Chimny-sweepers or a Warning for Tobacconists. London. (reprinted in 1936 by Shakespeare Association Facsimiles (no. 11), Oxford University Press)
- 371480 Philhower, Chas. A. 1934 Indian Pipes and the Use of Tobacco in New Jersey. The Archaeological Society of New Jersey Leaflet No. 3: 1-17.
- 371650 Pirtle, Ray 1969 An Unfinished Pipe. Ohio Archaeologist 19(4): 130.
- 371830 Poirier, David A. 1974 A Discussion of Two Disturbed Clay Pipe Finds from Stamford, Connecticut. Quarterly Bulletin of the Archaeological Society of Virginia 29(1): 10-18.
- 371860 Pollock, John W. 1980 An Archaeological Inspection and Assessment of Two Historical Archaeological Sites on the Severn River, Ontario. Ontario Ministry of Culture and Recreation Archaeological Research Report 13: 65-96.
- 371865 Pond, Nathan G. (editor) 1906 Journal of "Sir" Peter Pond - Born in Milford, Connecticut, in 1740. Connecticut Magazine 10(2): 235-259.

- 371900 Porter, H.C. 1979 The Inconstant Savage: England and the North American Indian 1500-1660. Duckworth, London.
- 371930 Porter, Muriel N. 1948 Pipas Precortesianas. Acta Anthropologica (Mexico) 3(2): 139-251 and plates.
- 371980 Post, Charles F. 1904 Two Journals of Western Tours...(1758-1759). In Early Western Travels 1748-1846, Volume 1, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 375100 Pratt, Peter P. 1976 Archaeology of the Oneida Iroquois. Occasional Publications in Northeastern Anthropology Volume 1. George Mills, New Hampshire.
- 375300 Prescott, Henry P. 1858 Tobacco and Its Adulterations. Paternoster Row, London.
- 375350 Preston, Nolan E. 1985 Historic Burials on the Trinity River. Indian-Artifact Magazine 4(2): 22-23, 68.
- 375500 Price, Jacob M. 1961 The Tobacco Adventure to Russia: Enterprise, Politics, and Diplomacy in the Quest for a Northern Market for English Colonial Tobacco, 1676-1722. Transactions of the American Philosophical Society (n.s.) 51(1): 3-120.
- 375600 Price, Jacob M. 1973 France and the Chesapeake: A History of the French Tobacco Monopoly, 1674-1791, and of its Relationship to the British and American Tobacco Trades, 2 volumes. University of Michigan Press, Ann Arbor.
- 375633 Pritchett, Robert T. 1890 Ye Smokiana. London.
- 375660 Purchas, Samuel 1625 **Purchas his Pilgrimes**, 4 volumes. London.
- 375680 Putnam, Charles E. 1885 A Vindication of the Authenticity of the Elephant Pipes and Inscribed Tablets in the Museum of the Davenport Academy of Natural Sciences, from the Accusations of the Bureau of Ethnology of the Smithsonian Institution. Davenport, lowa.
- 375700 Quaritch, Bernard 1928 A Catalogue of Important and Rare Books on Botany...Tobacco, No. 420. London.

375730 Quaritch, Bernard 1931 A Catalogue of Important and Rare Books on Botany...Tobacco, No. 450. London.

ļ

- 375800 Quatraro, A. 1986 Tobacco: Employing 1.8 m People in the EEC. World Tobacco 94: 97, 100. (Abstracted in Smoking and Health Bulletin March-April 1987: 147)
- 376000 Quimby, George I. 1960 Indian Life in the Upper Great Lakes 11,000 B.C. - A.D. 1800. University of Chicago Press, Chicago.
- 377020 Quimby, George I. 1966 Indian Culture and European Trade Goods. The University of Wisconsin Press, Madison.
- 377480 Quinn, David B. (editor) 1955 The Roanoke Voyages, 1584-1590, 2 volumes. The Hakluyt Society, London.
- 377490 Quinn, David B. 1970 Thomas Hariot and the Virginia Voyages of 1602. The William and Mary Quarterly (3rd series) 27(2): 268-281.
- 377500 Quinn, David B. 1977 North America From Earliest Discovery to First Settlements: The Norse Voyages to 1612. Harper and Row, New York.
- 377600 Quinn, David B. (editor) 1979 New American World: A Documentary History of North America to 1612, 5 volumes. Arno and Hector Bye, New York.
- 377800 Quinn, David B. 1981 Sources for the Ethnography of Northeastern North America to 1611. National Museum of Man Mercury Series, Canadian Ethnology Service Paper 76.
- 377805 Quinn, David B. (editor) 1982 Early Maryland in a Wider World. Wayne State University Press, Detroit.
- 377807 Quinn, David B. 1982 Why They Came. In **Early Maryland in a Wider World**, edited by David B. Quinn, pp. 119-148. Wayne State University Press, Detroit.
- 377810 Quinn, David B. 1985 Set Fair for Roanoke: Voyages and Colonies, 1584-1606. University of North Carolina Press, Chapel Hill and London.

- 377814 Quinn David B. and A.M. Quinn 1983 The English New England Voyages 1602-1608. The Hakluyt Society, London.
- 377820 Quinn, Vernon 1937 Leaves: Their Place in Life and Legend. Frederick A. Stokes, New York.
- 377900 Rajnovich, Grace 1983 Mr. Chantley's Fur Trade Post - An Archival Mystery. Arch Notes (Ontario Archaeological Society) 83(2).
- 377950 Ramenofsky, Ann F. 1982 The Archaeology of Population Collapse: Native American Response to Infectious Disease. Unpublished Ph.D. dissertation, University of Washington.
- 381000 Ramsey, Elizabeth 1930 The History of Tobacco Production in the Connecticut Valley. Smith College Studies in History 15(3-4). Department of History of Smith College, Northampton, Massachusetts.
- 381200 Rapaport, Benjamin 1972 A Tobacco Source Book. Privately published.
- 381210 Rapaport, Benjamin 1979 A Complete Guide to Collecting Antique Pipes. Schiffer, Exton, Pennsylvania.
- 381500 Rathbone, Fred 1886 "Fairy" Pipes. American Antiquarian 8: 173.
- 381830 Ray, Arthur J. and D.B. Freeman 1978 'Give Us Good Measure': An Economic Analysis of Relations Between the Indians and the Hudson's Bay Company Before 1763. University of Toronto Press, Toronto.
- 381900 Ray, J.D. 1957 A Stone Pipe or Smoking Tube from North Alabama. Journal of Alabama Archaeology 3(1): 33.
- 382300 Read, M.C. 1879 Stone Tubes - Suggestions as to Their Possible Use. American Antiquarian 2(1): 53-54.
- 382400 Redbird, Duke 1970 Tobacco Burns. In The Only Good Indian, edited by Waubageshig. New Press, Toronto.
- 382500 Redway, George 1897 Tobacco Talk and Smokers' Gossip. George Redway, London.

- 382600 Reemtsma, H.F. and P.F. Reemtsma 1960 Tabago: A Picture-Book of Tobacco and the Pleasures of Smoking. F. Bruckmann, Munich.
- 382750 Reichel-Dolmatoff, G. 1975 The Shaman and the Jaguar: A Study of Narcotic Drugs Among the Indians of Colombia. Temple University Press, Philadelphia.
- 384000 Rice, Orleans L. Jr. 1974 A Catlinite Disk Pipe Find: Salvage Archaeology at 40MR12. Central States Archaeological Journal 21(4): 162-170.
- 384100 Rich, Barnaby 1615 The Honestie of this Age, Prooving by good Circumstance that the World was never honest till now. London.
- 384250 Rich, E.E. (editor) 1942 Minutes of the Hudson's Bay Company 1671-1674. The Champlain Society, Toronto.
- 384260 Rich, E.E. (editor) 1945-1946 Minutes of the Hudson's Bay Company 1679-1684. The Champlain Society, Toronto.
- 384300 Rich, E.E. (editor) 1957 Hudson's Bay Copy Booke of Letters Commissions Instructions Outward 1688-1696. The Hudson's Bay Record Society, London.
- 384310 Rich, E.E. 1958-1959 The History of the Hudson's Bay Company 1670-1870. The Hudson's Bay Record Society, London.
- 385000 Richie, C.F. n.d. Cataloguing Procedures for Smoking Pipe Artifacts. National Historic Parks and Sites Branch, Artifact Cataloguing Guide (unpublished manuscript).
- 386200 Richie, C.F. 1978 Nineteenth-Century Clay Tobacco-Pipes from the High Arctic. Canadian Journal of Archaeology 2: 123-137.
- 386220 Richie, C.F. 1983 Tobacco-Pipes from Fort Walsh, Saskatchewan, a North-West Mounted Police Post, 1875-1883. In The Archaeology of the Clay Tobacco Pipe, Volume 8 (America), edited by Peter Davey, pp. 89-160. B.A.R. International Series 175.
- 386500 Richter, Elise 1928 Zu Leo Wiener's Africa and the Discovery of America. Anthropos 23: 436-447.

- 395500 Riesenfeld, Alphonse 1952 Tobacco in New Guinea and the Other Areas of Melanesia. Journal of the Royal Anthropological Institute of Great Britain and Ireland 81: 69-102.
- 395930 Rink, Oliver A. 1986 Holland on the Hudson: An Economic and Social History of Dutch New York. Cornell University Press and the New York State Historical Association, Ithaca and Cooperstown.
- 396050 Rippeteau, Bruce E. 1978 The Upper Susquehanna Valley Iroquois: An Iroquoian Enigma. In Essays in Northeastern Anthropology in Memory of Marian E. White, edited by W.E. Engelbrecht and D.K. Grayson, pp. 123-151. Occasional Publications in Northeastern Anthropology 5.
- 397500 Rist, Don E. 1983 Identification of Diamond Stamped Elbow Clay Smoking Pipes. In Historic Clay Tobacco Pipe Studies, Volume 2, edited by Byron Sudbury, pp. 49-58, Ponca City, Oklahoma.
- 400000 Ritchie, William A. 1936 A Prehistoric Fortified Village Site at Canandaigua, Ontario County, New York. Research Records of the Rochester Museum of Arts and Sciences 3: 1-75.
- 402000 Ritchie, William A. 1954 Dutch Hollow, an Early Historic Period Seneca Site in Livingstone County, New York. Research Records of the Rochester Museum of Arts and Sciences 10.
- 404500 Ritchie, William A. 1969 The Archaeology of Martha's Vineyard: A Framework for the Prehistory of Southern New England. The Natural History Press, Garden City, N.Y.
- 404750 Ritzenthaler, Robert E. 1955 Kinnickinnick. Lore 6(1): 14-15.
- 404850 Rivière, Lazare 1669 Opera medica universa. Frankfort.
- 405000 Robbins, Maurice 1980 Wapanucket. The Massachusetts Archaeological Society, Attleboro, Massachusetts.
- 405300 Robert, Joseph C. 1938 The Tobacco Kingdom: Plantation, Market and Factory in Virginia and North Carolina, 1800-1860. Duke University Press, Durham, North Carolina. (reprinted in 1965 by Peter Smith, Gloucester, Massachusetts)

- 405500 Robert Joseph C. 1952 **The Story of Tobacco in America.** Alfred A. Knopf, New York. (reprinted in 1967 by The University of North Carolina Press, Chapel Hill)
- 405700 Robicsek, Francis 1978 **The Smoking Gods: Tobacco in Maya Art, History and Religion.** University of Oklahoma Press, Norman.
- 405850 Robinson, Rebecca C.W. 1983 Clay Tobacco Pipes from the Kerameikos. Mitteilungen Des Deutschen Archäologischen Instituts Athenische Abteilung 98: 265-285, plates 51-56.
- 405870 Robinson, Rebecca C.W. 1985 Tobacco Pipes of Corinth and of the Athenian Agora. **Hesperia** (Journal of the American School of Classical Studies at Athens) 54(2): 149-203.
- 407500 Rogers, J. Smith 1836 An Essay on Tobacco, Comprising a Brief History of the Plant. New York.
- 408100 Rogers, Robert 1765 A Concise Account of North America. London. (reprinted in 1966 by Johnson Reprint)

Romero, Diego see 237795

- 408370 Rosenberger, Francis C. (editor) 1972 Virginia Reader: A Treasury of Writings: From the First Voyages to the Present. Octagon Books, New York.
- 408400 Rosenwald, Sigmund 1902 The Comic History of Tobacco: Chapter 1 - The Truth about the Discovery of Tobacco. Canadian Cigar and Tobacco Journal 8(1): 29, 31.
- 408410 Rosier, James 1605 A True Relation of the most prosperous voyage made this present yeer 1605, by Captaine George Waymouth in the Discovery of the land of Virginia. London.
- 408425 Ross, Alexander 1904 Adventures of the First Settlers on the Oregon or Columbia River... In Early Western Travels 1748-1846, Volume 7, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 408450 Ross, Ray Sr. 1984 Letter to Magazine (about pipes). Indian-Artifact Magazine 3(4): 30.

- 409000 Rosser, John, A. Rapoza and P. Zannieri 1980 Artifact Stratigraphy at the Base of Green Hill. Bulletin of the Massachusetts Archaeological Society 41(2).
- 409100 Rost, R.L. 1969 A Tennessee Stone Pipe. Central States Archaeological Journal 16: 170-171.
- 409650 Rowse, A.L. 1955 Sir Walter Ralegh: Last of the Elizabethans. The Listener 54(1375): 17-18.
- 409740 Rublowsky, John 1974 The Stoned Age: A History of Drugs in America. G.P. Putnam's Sons, New York.
- 409750 Rudolph, R.A. 1975 The Rayland Pipe. Ohio Archaeologist 25(4): 21.
- 409770 Rueping, Henry 1945 A Platform Pipe. The Wisconsin Archeologist (n.s.) 26(2): 44-45.
- 409950 Russell, Howard S. 1980 Indian New England Before the Mayflower. University Press of New England, Hanover, New Hampshire.
- 411000 Rutsch, Edward S. 1973 Smoking Technology of the Aborigines of the Iroquois Area of New York State. Farleigh Dickinson University Press, Rutherford, New Jersey.
- 411400 Sadeler, Raphael 1618 Zodiacus Christianus. Munich.
- 411500 Sadie, Stanley (editor) 1980 The New Grove Dictionary of Music and Musicians, Volume 4. Macmillan.
- 412000 Safford, W.E. 1917 Narcotic Plants and Stimulants of the Ancient Americans. Annual Report of the Board of Regents of the Smithsonian Institution 1916: 387-424.
- 412295 Sagard-Théodat, Gabriel 1632 Le grand voyage du pays des Hurons, situé en l'Amerique vers la mer douce, es derniers confins de la Nouvelle France dite Canada. Paris.
- 412300 Sagard-Theodat. Gabriel 1865 Le grand voyage du pays des Hurons. Paris. (republication of 412295).

- 412302 Sagard-Theodat, Gabriel 1939 **The Long Journey to the Country of the Hurons,** edited by G.M. Wrong. The Champlain Society, Toronto. (translation of 412295)
- 412500 Sagard, Gabriel 1866 Histoire du Canada et voyages. Paris.
- 412700 St. John, John B. 1976 An Effigy Pipe from Missouri. Ohio Archaeologist 26(3): 25.
- 412900 Salisbury, Neal 1982 Manitou and Providence: Indians, Europeans, and the Making of New England, 1500-1643. Oxford University Press, New York.
- 412930 Salley, Alexander S. (editor) 1911 Narratives of Early Carolina 1650-1708. Charles Scribner's Sons, New York.
- 413000 Salwen, Bert, S. Bridges and J. Klein 1974 An Archaeological Reconnaissance at the Pieter Claesen Wyckoff House, Kings County, New York. New York State Archeological Association Bulletin 61.
- 4137C0 Sanford, Albert H. 1914 A Disk Pipe. The Wisconsin Archeologist (o.s.) 13(2): 103-104.
- 414400 Sarasin, Jean-Antoine 1571 De peste commentarius. Geneva.
- 414500 Sassi, Anthony L. Jr. 1968 Notes on the Amerind Manufacture of Smoking Devices as Artistic Expression in Northeastern Iroquoia. The Stillwater Press, Saratoga Springs, New York.
- 414850 Sauer, Jonathan D. 1976 Changing Perception and Exploitation of New World Plants in Europe, 1492-1800. In First Images of America, Volume 2, edited by Fredi Chiappelli, pp. 813-832. University of California Press, Berkeley.
- 414870 Saunders, R.M. 1935 The First Introduction of European Plants and Animals into Canada. The Canadian Historical Review 16(4): 388-406.
- 415000 Saville, M.H. 1924 Ancient Smoking-Pipes From Ecuador. Indian Notes (Museum of the American Indian, Heye Foundation), 1: 63-69.

- 416300 Sawyer, Fred 1971 A Platform Pipe From the Long Creek Midden. The Chesopiean 9: 65-67.
- 416750 Schaeffer, Claude 1941 A Stone Pipe Bowl From Northern Pennsylvania. **Pennsylvania Archaeologist** 11(3): 53-56.
- 416980 Schinke, S.P. et al. 1986 Smokeless Tobacco Use Among Native American Adolescents. New England Journal of Medicine 314(16): 1051-1052. (Abstracted in Smoking and Health Bulletin Jan.-Feb. 1987: 63)
- 417000 Schleiffer, Hedwig (editor) 1973 Sacred Narcotic Plants of the New World Indians: An Anthology of Texts From the Sixteenth Century to Date. Hafner Press, New York.
- 417020 Schlesinger, Roger and A.P. Stabler 1986 André Thevet's North America: A Sixteenth-Century View. McGill-Queen's Press, Kingston and Montreal. (translations of portions of 469155 and 469156)
- 417065 Schoff, Harry L. 1937 Seneca Pipes. National Archaeological News (Lancaster, Pennsylvania) 1(3): 24-26.
- 417070 Schoolcraft, Henry R. 1846 Notes on the Iroquois: or, Contributions to the Statistics, Aboriginal History, Antiquities and General Ethnology of Western New York. New York. (reprinted in 1975 by Kraus Reprint)
- 417073 Schoolcraft, Henry R. 1851-1857 Historical and Statistical Information Respecting the History, Condition, and Prospects of the Indian Tribes of the United States, 6 volumes. Lippincott, Grambo, Philadelphia.
- 417100 Schultes, Richard E. 1972 An Overview of Hallucinogens in the Western Hemisphere. In **Flesh of the Gods,** edited by Peter T. Furst, pp. 3-54. Praeger Publishers, New York.
- 417230 Schultes, Richard E. 1978 Psychotropic Drugs of Vegetal Origin. In **Principles of Psychopharmacology**, edited by W.G. Clark and J. del Giudice, second edition. Academic Press, New York.

- 417270 Schultz, Peter D. and J.K. Schultz 1986 An Early Knobbed-Bowl Reed-Stem Pipe From Columbia, California. In Historic Clay Tobacco Pipe Studies, Volume 3, edited by Byron Sudbury, pp. 57-59. Ponca City, Oklahoma.
- 417300 Scothorne, Donald G. 1968 Oak Island Site: The Archaic Defined. Bulletin of the Massachusetts Archaeological Society 29(3-4).
- 417340 Scott, Amoret and C. Scott 1966 Tobacco and the Collector. Max Parrish, London.
- 417350 Scott, Amoret and C. Scott 1981 Smoking Antiques. Shire Publications Album 66.
- 418400 Seeman, Mark F. 1977 Stylistic Variation in Middle Woodland Pipe Styles: The Chronological Implications. Mid-Continental Journal of Archaeology 2(1): 47-66.
- 418500 Seeman, Mark F. 1981 A Late Woodland Steatite Pipe From the Catlin Site, Vermillion Co., Indiana: The Implications for East-West Trade. **The Archaeology of Eastern North America** 9: 103-109.
- 418980 Seig, Louis 1963 The Spread of Tobacco: A Study in Cultural Diffusion. **The Professional Geographer** 15(1): 17-21.
- 419000 Seig, Louis 1971 **Tobacco, Peace Pipes, and Indians.** The Filter Press, Palmer Lake, Colorado.
- 419800 Serrano, Antonio 1934 El Uso Del Tabaco Y Vegetales Narcotizantes Entre Los Indigenas De America. **Revista Geográfica Americana** 11: 415-429.
- 420000 Setchell, William Albert 1921 Aboriginal Tobaccos. American Anthropologist 23(4): 397-414.
- 420300 Setzler, Frank M. 1960 Welcome Mound and the Effigy Pipes of the Adena People. Proceedings of the United States National Museum 112 (3441): 451-458.
- 420350 Seymour, C.M. 1985 Tobacco-Products Industry. In **The Canadian Encyclopedia**, edited by James H. Marsh, p. 1828. Hurtig, Edmonton.

- 420390 Seymour, Flora W. 1929 The Story of the Red Man. Longmans, Green and Co., Toronto.
- 420400 Segmour, Flora W. 1930 Lords of the Valley: Sir William Johnson and his Mohawk Brothers. Longmans, Green and Co., London.
- 420900 Shaw, M. 1938 South African Native Snuff-Boxes. Annals of the South African Museum 24(5): 221-252 and plates.
- 420910 Shaw, M. 1938 Native Pipes and Smoking in South Africa. Annals of the South African Museum 24(5): 277-302 and plates.
- 421000 Shaw, Thurstan 1960 Early Smoking Pipes: in Africa, Europe, and America. The Journal of the Royal Anthropological Institute of Great Britain and Ireland 90: 272-305.
- 421500 Sheehan, Carol 1981 **Pipes that won't Smoke; Coal that won't Burn.** Glenbow Museum, Calgary, Alberta.
- 421600 Shelton, Randall B. 1976 A Calumet Find. Central States Archaeological Journal 23: 34-35.
- 421700 Sheppard, Ernest J. 1926 Wampum and Tobacco as a Media of Exchange; or, did Wampum and Tobacco Satisfy the Requirements of a Good Medium of Exchange? Unpublished M.A. thesis, University of Illinois, Urbana Illinois.
- 421900 Sherman, Glen 1972 Tobacco Pipes of the Western Eskimos. The Beaver 303: 49-51.
- 421950 Shew, Joel 1850 Tobacco: Its History, Nature and Effects on the Body and Mind. New York.
- 422030 Shirley, John W. 1983 Thomas Harriot: A Biography. Clarendon, Oxford.
- 422180 Sievers, Maurice L. 1968 Cigarette and Alcohol Usage by Southwestern American Indians. American Journal of Public Health 58(1): 71-82.
- 422190 Le Signerre, I. 1660 L'anantheme du tabac. Paris.

.

- 422200 Sigstad, John S. 1970 A Field Test for Catlinite. American Antiquity 35: 377-382.
- 422375 Silverberg, Robert 1970 The Mound Builders. Ballantine Books, New York.
- 422377 Silverman, Harry 1895 History of the Pipe. Atlanta.
- 422380 Silvy, Antoine 1980 Letters from North America (1709-10), translated by Ivy A. Dickson. Mika Publishing, Belleville, Ontario.
- 422400 Simmons, Ellin A. 1968 The Smoking Complex in the Prehistoric Southwest. Unpublished M.A. thesis, The University of Arizona.
- 422800 Simms, S.C. 1904 Cultivation of "Medicine Tobacco" by the Crows - a Preliminary Paper. American Anthropologist (n.s.) 6(2): 331-335.
- 423500 Singer, Charles 1913 The Early History of Tobacco. The Quarterly Review 219: 125-142.
- 426000 Skinner, Alanson 1909 The Lenapé Indians of Staten Island. Anthropological Papers of the American Museum of Natural History 3.
- 428000 Skinner, Alanson 1909 Archaeology of the New York Coastal Algonkin. Anthropological Papers of the American Museum of Natural History 3.
- 429500 Skinner, Alanson 1920 An Antique Tobacco-Pouch of the Iroquois. Indian Notes and Monographs (Museum of the American Indian, Heye Foundation) 2(4): 103-108.
- 430000 Skinner, Alanson 1925 Some Seneca Tobacco Customs. Indian Notes (Museum of the American Indian, Heye Foundation) 2: 127-130.
- 432000 Skinner, Alanson 1925 A Seneca Antique Tobacco Pipe. Indian Notes (Museum of the American Indian, Heye Foundation) 2: 231-232.
- 433000 Skinner, Alanson 1925 Iroquois Falseface Pipe. Indian Notes (Museum of the American Indian, Heye Foundation) 2: 321-322.

- 434000 Skinner, Alanson 1926 An Unusual Canadian Disk Pipe. Indian Notes (Museum of the American Indian, Heye Foundation) 3: 39-41.
- 435150 Smedts, Matthew 1955 No Tobacco No Hallelujah. William Kimber, London.
- 438100 Smith, Dennis O. 1986
   Point Pleasant Pipes from the Cypress Lake Site, 3PU-192.
   In Historic Clay Tobacco Pipe Studies, Volume 3, edited
   by Byron Sudbury, pp. 63-64. Ponca City, Oklahoma.
- 438500 Smith, Francis C. 1964 Curious Stone Pipe. Journal of Alabama Archaeology 10(1): 34-35.
- 438700 Smith, Harlan I. 1906 A Remarkable Pipe from Northwest America. American Anthropologist (n.s.) 8(1): 33-38.
- 441000 Smith, Ira F. III 1979 Early Smoking Pipes in the Susquehanna River Valley. **Pennsylvania Archaeologist** 49(4): 9-23.
- 441180 Smith, J.L. 1964 A Ceremony For the Preparation of the Offering Cloths For Presentation To The Sacred Calf Pipe of the Teton Sioux. Plains Anthropologist 9(25): 190-196.
- 441190 Smith, J.L. 1967 A Short History of the Sacred Calf Pipe of the Teton Dakota. University of South Dakota Museum News 28(7-8): 1-37.
- 441200 Smith, J.L. 1970 The Sacred Calf Pipe Bundle: It's Effect on the Present Teton Dakota. **Plains Anthropologist** 15: 87-93.
- 441220 Smith, James 1799 An Account of the Remarkable Occurrences in the Life and Travels of Col. James Smith, During His Captivity With the Indians, in the Years 1755, '56, '57, '58, & 59. John Bradford, Lexington. (republished in 1870 by Robert Clarke and Co., Cincinnati)
- 441225 Smith, John 1608 A True Relation of such occurences and accidents of noate as hath hapned in Virginia since the first planting of that Collony... London.
- 441230 Smith, John 1612 A Map of Virginia, With A Description of the Countrey, the Commodities, People, Government and Religion. Oxford.

Bibliography

- 441235 Smith, John 1624 The Generalle Historie of Virginia, New England, and the Summer Isles. London.
- 441238 Smith, John 1631 Advertisements For the unexperienced Planters of New-England, or any where. London.

法義

- 441240 Smith, John 1910 Travels and Works of Captain John Smith, 2 volumes, edited by Edward Arber. John Grant, Edinburgh.
- 441250 Smith, Nicholas N. 1957 Smoking Habits of the Wabanaki. Bulletin of the Massachusetts Archaeological Society 18(4): 76-77.
- 441270 Smith, Raoul N. 1977 A Description of the Penobscot and Passamaquoddy Indians in 1808. Man in the Northeast 14: 52-56.
- 441280 Smith, Robin H. 1985 Andrew Wilson and J.W. Scales -- Two Toronto Tobacconists. Arch Notes (Ontario Archaeological Society) 85(2): 9-12.
- 441281 Smith, Robin H. 1985 The Toronto Tobacco-Pipe Industry: An Examination. Arch Notes (Ontario Archaeological Society) 85(3): 21-25.
- 441282 Smith, Robin H. and R.H. Gerrard 1986 Of Beer and Burnt Tongues: The Application of An Experimental Approach to Historical Archaeology. Arch Notes (Ontario Achaeological Society) 86(4):3-7.
- 441283 Smith, Samuel D. 1986 A Tennessee Tobacco Pipe Mold. In **Historic Clay Tobacco Pipe Studies**, Volume 3, edited by Byron Sudbury, pp. 48-52, Ponca City, Oklahoma.
- 441284 Smith, Sheryl A. 1979 The Methodist Point Site: A Middle Ontario Iroquois Camp on Georgian Bay. Ontario Ministry of Culture and Recreation Research Report 11.
- 441500 Snift, Dean 1840 A Pinch-of Snuff... London.
- 441720 Snow, Dean R. 1980 The Archaeology of New England. Academic Press, Toronto.
- 441736 Snow, Dean R. (editor) 1985 The Mohawk Valley Project: 1982 Field Season Report. The Institute for Northeast Anthropology, State University of New York at Albany.

- 447000 Speck, Frank G. 1945 **The Iroquois: A Study in Cultural Evolution.** Cranbrook Institute of Science Bulletin 23. (2d edition of 1955 reprinted in 1982)
- 447500 Spector, Janet D. 1975 Crabapple Point (Je 93): An Historic Winnebago Indian Site in Jefferson County, Wisconsin. The Wisconsin Archeologist 56(4).
- 449500 Spinden, Herbert J. 1950 Tobacco is American. Arents Tobacco Collection Publication Number 2. New York Public Library, New York.
- 450000 Springer, James W. 1981 An Ethnohistoric Study of the Smoking Complex in Eastern North America. **Ethnohistory** 28(3): 217-235.
- 450500 Spruce, Richard 1908 Notes of a Botanist on the Amazon and Andes..., 2 volumes, edited by Alfred R. Wallace. Macmillan and Co., London.
- 451500 Squier, Ephraim G. and E.H. Davis 1848 Ancient Monuments of the Mississippi Valley. Smithsonian Contributions to Knowledge Volume 1. (reprinted in 1973 by AMS Press)
- 452490 Stahl, Günther 1925 Tabakrauchen in Südamerika. Proceedings of the 21st International Congress of Americanists (Goteburg) pp. 315-320.
- 452492 Stahl, Günther 1926 Der Tabak im Leben südamerikanischer Völker. Zeitschrift für Ethnologie 57(1925): 81-152.
- 452500 Stahl, Günther 1931 Zur Frage des Ursprungs des Tabaksrauchens. Anthropos 26: 569-582.
- 452850 Stallybrass, Peter and A. White 1986 **The Politics and Poetics of Transgression.** Cornell University Press, Ithaca, New York.
- 453000 Stanzeski, Andrew J. 1974 The Three Beeches. Bulletin of the Archaeological Society of New Jersey 31.
- 453120 Steckley. John 1985 An Ethnolinguistic Analysis of Tobacco Among the Huron. Arch Notes (Ontario Archaeological Society) 85(2): 13-17.

- 453200 Steen, Charlie R. 1943 Some Notes On The Use of Tobacco and Cane Pipes by the Pimas of the Gila Valley. American Anthropologist (n.s.) 45: 641-642.
- 453260 Steinmetz, Andrew 1857 Tobacco: Its History, Cultivation, Manufacture and Adulterations. London.
- 453500 Stephens, B.W. 1956 Iroquoian Pottery Pipes. Central States Archaeological Journal 2(1): 6-9.
- 453950 Stephenson, Robert L. 1971 The Accokeek Creek Site: Early and Middle Woodland Summary. In Foundations of Pennsylvania Prehistory, edited by B.C. Kent, I.F. Smith III and C. McCann, pp. 241-259. Anthropological Series of the Pennsylvania Historical and Museum Commission no. 1.
- 454100 Stepney, Rob 1982 The Indian's Revenge: A Brief History of the Tobacco Habit and Its Current Status. In **Smoking: Psychology and Pharmacology,** edited by Heather Ashton and R. Stepney, pp. 1-17. Tavistock Publishers, London.
- 454180 Stevenson, James 1883 Illustrated Catalogue of the Collections Obtained From the Indians of New Mexico in 1880. Bureau of American Ethnology Annual Report 2: 423.
- 454200 Stevenson, J.E. 1879 The Mound Builders. American Antiquarian 2(2).
- 454350 Steward, T.D. 1954 A Method for Analyzing and Reproducing Pipe Decorations. Quarterly Bulletin of the Archaeological Society of Virginia 9(1): 2-9.
- 454455 Stiles, Henry R. (annotator) 1906 Joutel's Journal of La Salle's Last Voyage 1684-7. Joseph McDonough, Albany, New York.
- 454465 Stith, William 1747 The History of the First Discovery and Settlement of Virginia. W. Parks, Williamsburg. (reprinted in 1865 by J. Sabin and J.n 1969 by Johnson Reprint)
- 454467 Stoddard, Natalie B. 1972 Some Ethnological Aspects of the Russian Fur Trade. In **People and Pelts: Selected Papers of the Second North American Fur Trade Conference,** edited by Malvina Bolus, pp. 39-58. Peguis Publishers, Winnipeg, Manitoba.

- 454470 Stone, Eric 1932 Medicine Among the American Indians. P.B. Hoeber, New York.
- 454500 Stone, Lyle M. and D. Chaput 1978 History of the Upper Great Lakes Area. In Northeast, edited by B.G. Trigger, pp. 602-609. Handbook of North American Indians, Volume 15, William G. Sturtevant, general editor. Smithsonian Institution, Washington, D.C.
- 454700 Stone, William L. 1838 Life of Joseph Brant - Thayendanegea..., 2 volumes. New York. (republished in 1970 by Scholarly Press)
- 454940 Stothers, David M. and E.J. Prahl 1973 The Squaw Island Site (33-SA-7) Sandusky County, Ohio. **Toledo Area Aboriginal Research Club Bulletin** 2(1): 1-19.
- 457350 Strachey, William 1612 **Historie of Travaile into Virginia Britannia.** Three unpublished manuscript copies extant in the Sloane Collections, Princeton University Library and Bodelian Library.
- 457360 Strachey, William 1953
   The Historie of Travell into Virginia Britania, edited by Louis B. Wright and V. Freund (based on Princeton manuscript of 457350). Hakluyt Society, second series, no. 103. Hakluyt Society, London.
- 457370 Strachey, William 1849 **The Historie of Travaile into Virginia Britannia,** edited by R.H. Major (based on Sloane manuscript of 457350). Hakluyt Society, London.
- 457450 Street, Brian V. 1975 The Savage in Literature: Representations of 'Primitive' Society in English Fiction, 1850-1920. Routledge and Kegan Paul, London and Boston.
- 457500 Strohmeier, W. 1980 The Overpeck Site (36BU5), Forks of the Delaware Chapter 14: Clay Pipes. **Pennsylvania Archaeologist** 50(3): 35-46.
- 460470 Sudbury, Byron 1979 Historic Clay Tobacco Pipemakers in the United States of America. In **The Archaeology of the Clay Tobacco Pipe**, Volume 2, edited by Peter Davey, pp. 151-341. B.A.R. International Scries 60.
- 460480 Sudbury, Byron (editor) 1980 Historic Clay Tobacco Pipe Studies, Volume 1. Ponca City, Oklahoma.

460482 Sudbury, Byron 1980

A Preliminary Report on the R. Bannerman Eagle Tobacco Pipe Manufactury, Rouses Point, New York. In **Historic Clay Tobacco Pipe Studies,** Volume 1, edited by Byron Sudbury, pp. 3-22. Ponca City, Oklahoma.

- 460483 Sudbury, Byron 1980 White Clay Pipes from the Old Connellsville Dump, 36 Fa 140. In Historic Clay Tobacco Pipe Studies, edited by Byron Sudbury, pp. 23-46. Ponca City, Oklahoma.
- 460495 Sudbury, Byron (editor) 1983 Historic Clay Tobacco Pipe Studies, Volume 2. Ponca City, Oklahoma.
- 460500 Sudbury, Byron 1983 Sally Michaels: A Mid-Nineteenth Century North Carolina Pipemaker. In Historic Clay Tobacco Pipe Studies, Volume 2, edited by Byron Sudbury, pp. 59-60. Ponca City, Oklahoma.
- 460600 Sudbury, Byron (editor) 1986 Historic Clay Tobacco Pipe Studies, Volume 3. Ponca City, Oklahoma.
- 460602 Sudbury, Byron 1986 An Illustrated 1895 Catalogue of the Akron Smoking Pipe Co. In Historic Clay Tobacco Pipe Studies, Volume 3, edited by Byron Sudbury, pp. 1-42. Ponca City, Oklahoma.
- 460603 Sudbury, Byron 1986 An Update on the Status of Pipe Manufacturing Sites at Point Pleasant, Ohio. In Historic Clay Tobacco Pipe Studies, Volume 3, edited by Byron Sudbury, pp. 61-62. Ponca City, Oklahoma.
- 460604 Sudbury, Byron 1986 Goedewaagen Pipes for Sale in a 1951 Wally Frank, Ltd. Catalog. In Historic Clay Tobacco Pipe Studies, Volume 3, edited by Byron Sudbury, pp. 96-98. Ponca City, Oklahoma.
- 460993 Swanton, John R. 1918 An Early Account of the Choctaw Indians. Memoirs of the American Anthropological Association 5(2).
- 463000 Sweetman, Paul W. 1967 The Bristow Site, Thorah Island, County of Ontario, Province of Ontario, Canada. **Pennsylvania Archaeologist** 37(1-2).

464000 Swinton, Nelda 1981 Les Blancs dans l'Art des Indiens de la Côte Nord-Ouest. Recherches Amérindiennes au Québec 11(4).

- 464300 Switzer, Ronald R. 1969 Tobacco Pipes, and Cigarettes of the Prehistoric Southwest. **El Paso Archaeological Society Special Report** no. 8.
- 464500 Sylvester, Joshuah 1616 Tobacco Battered and the Pipes Shattered...by a Volley of Holy Shot Thundered from Mount Helicon. London. (reprinted in 1880 in The Complete Works of Joshuah Sylvester, Volume 2, edited by Alexander B. Grosart, pp. 267-274. Chertsey Worthies' Library)
- 464800 T.,C. (author still unknown) 1615 An Advice How to Plant Tobacco in England... London. (reprinted in 1873 by Da Capo Press, New York)
- 465000 Tait, Lyal 1968 Tobacco in Canada. T.H. Best Printing Company.
- 465500 Tait, Lyal 1971 The Petuns: Tobacco Indians of Canada. Erie Publishers, Port Burwell, Ontario.
- 466000 Tait, Lyal 1974 The Making of Indian Pipes. Unpublished manuscript.
- 466100 Talbot, Charles H. 1976 America and the European Drug Trade. In First Images of America: The Impact of the New World on the Old, edited by Fredi Chiappelli, pp. 833-844. University cf California Press, Berkeley.
- 466499 Tanner, Jeri 1968 The Dramatic and Narrative Influence of Tobacco on Literature of the Renaissance. Unpublished Ph.D. dissertation. Texas Technical College, El Paso, Texas.
- 466505 Tanner, Jeri 1971 The Nomenclature of Tobacco. North Carolina Folklore 19: 116-122.
- 466900 Tatham, William 1800 An Historical and Practical Essay on the Culture and Commerce of Tobacco. T. Bensley, London. (reprinted in 1969 by Melvin G. Herndon (editor), Coral Gables, Florida)

Tatham, William see also 197200

467000 Taylor, Douglas 1952 A Note on the Derivation of the Word "Tobacco." American Anthropologist 54(2): 278-279.

- 467800 Taylor, Norman 1965 **Plant Drugs that Changed the World.** Dodd, Mead and Co., New York.
- 468000 Taylor, Norman 1970 The Lively Image and Pattern of Hell: The Story of Tobacco. In Narcotics: Nature's Dangerous Gifts, by Norman Taylor. Dell Publishing, New York.
- 469000 Taylor, William B. 1976
   The Fort Hill Bluff Site. Bulletin of the Massachusetts
   Archaeological Society 38(1-2).

Tekakwitha, Kateri see 503412

- 469130 Tellier, Gilles et al. 1630 Typus Mundi... Antwerp.
- 469140 Terasaki, George 1986 Advertisement for a Northeastern Human Figure Pipe Bowl. American Indian Art Magazine 11(2): 1 (also in 1987 12(3): 1)
- 469150 Thayer, Henry O. 1892 **The Sagadahoc Colony.** Gorges Society, Portland, Maine. (reprinted in 1970 by Research Reprints, New York)
- 469155 Thevet, André 1557 ies singularitez de la France antarctique... Paris. (see also 179470 and 417020)
- 469156 Thevet, André 1575 La cosmographie universelle... 2 volumes. Paris. (see also 417020)

Thevet, André see also 179470, 417020 and 474350

- 469158 Thomas, Cyrus 1894 Report of the Mound Explorations of the Bureau of Ethnology. Twelfth Annual Report of the the Bureau of Ethnology. Smithsonian Institution, Washington.
- 469164 Thomas, Peter A. 1985 Cultural Change on the Southern New England Frontier, 1630-1005. In Cultures in Contact, edited by W. Fitzhugh, pp. 131-161. Smithsonian Institution, Washington.
- 469200 Thompson, Ben 1973 Indian Pipes. Central States Archaeological Journal 20(1): 11-23.
- 469220 Thompson, Ben 1976 A Catlinite Disk Pipe. Central States Archaeological Journal 23: 6-8.

- 469250 Thompson, C.J.S. 1931 Poisons and Poisoners. Harold Shaylor, London.
- 469290 Thompson, J. I'ic S. 1946 Some Uses of Tobacco Among the Maya. Notes on Middle American Archaeology and Ethnology (Carnegie Institution of Washington) 61: 1-5.
- 469300 Thompson, J. Eric S. 1970 Tobacco among the Maya and their Neighbors. In Maya History and Religion, by J. Eric S. Thompson, pp 103-123. University of Oklahoma Press, Norman, Oklahoma.
- 469650 Thomson, M.P. 1986 Smoking Habits of Native Canadians. In Proceedings of the Fifth World Conference on Smoking and Health, Winnigeg, Canada, 1983, Volume 1, edited by W.F. Forbes et al., pp. 785-787. (Abstracted in Smoking and Health Bulletin Sept.-Oct. (1986): 357)
- 469700 Thorius, Raphael 1626 Hymnus Tabaci. Leiden.
- 470500 Thruston, Gates P. 1890 The Antiquities of Tennessee and the Adjacent States and The State of Aboriginal Society in the Scale of Civilization Represented by Them. Cincinnati. (reprinted in 1973 by AMS Press, New York)
- 471001 471073 (last two digits indicate volume number) Thwaites, Reuben G. (editor) 1896-1901 The Jesuit Relations and Allied Documents, 73 volumes. The Burrows Brothers Company, Cleveland, Ohio.
- 471100 Thwaites, Reuben G. (editor) Early Western Travels, 1748-1846. Arthur H. Clark, Cleveland, Ohio. (see individual works under authors)
- 471500 Tichy, Marjorie F. 1945 The Distribution of Early Elbow Pipes. **El Palacio** 52(4): 70-73.
- 471550 Tiedemann, Friedrich 1854 Geschichte des Tabaks und anderer Ähnlicher Genussmittel. Frankfurt.
- 471600 Tiell, William 1978 The Hall Pipe. **Ohio Archaeologist** 28(4): 4.

Tixier see 306800

471800 Tomlin, Gary and G. Fogelman 1985 Pipes and Quartz Points of North Carolina. Indian-Artifact Magazine 4(4): 33.

- 473000 Tooker, Elisabeth 1964 An Ethnography of the Huron Indians 1615-1649. Bureau of American Ethnology Bulletin 190. Smithsonian Institution, Washington. (reprinted by the Huronia Historical Development Council and Ontario Department of Education)
- 474200 Tooker, Elisabeth 1978 History of Research. In Northeast, edited by Bruce G. Trigger, pp.4-13. Handbook of North American Indians, Volume 15, William G. Sturtevant, general editor. Smithsonian Institution, Washington, D.C.
- 474350 Touzard, Daniel 1907-1908 André Thevet d'Angoulesme. Géographe et historien, introducteur du tabac en France (1504-1592). Bulletin et mémoires de la société archéologique et historique de la Charente (7th series), 7: 1-47.
- 474415 Townsend, Earl C. Jr. 1956 Twin Illinois Hopewellian Monitor Pipes. In Central States Archaeological Journal 2(3): 93.

. .

- 474417 Townsend, John K. 1905 Narrative of a Journey Across the Rocky Mountains, to the Columbia River... In Early Western Travels 1748-1846, Volume 21, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 474440 Trall, Russell T. 1855 Tobacco: Its History, Nature and Effects. New York.
- 474500 (Treaty of Logg's Town) 1905 The Treaty of Logg's Town, 1752. The Virginia Magazine of History and Biography vol. 13. (reprinted in 1968 by Kraus Reprint, New York)
- 475000 Treichler, Steve 1978 Alligator Effigy Pipe (drawing on cover of journal). The Michigan Archaeologist 24(2): cover, 44.
- 475200 Trelease, Allen W. 1960 Indian Affairs in Colonial New York: The Seventeenth Century. Cornell University Press, Ithaca, New York.
- 475950 Trigger, Bruce G. 1965 The Jesuits and the Fur Trade. Ethnohistory 12: 30-53.
- 477000 Trigger, Bruce G. 1976 The Children of Aataentsic: A History of the Huron People to 1660. McGill-Queen's University Press, Montreal.

- 478090 Trigger, Bruce G. (editor) 1978 Northeast. Handbook of North American Indians, Volume 15, William G. Sturtevant, general editor. Smithsonian Institution, Washington.
- 478500 Trigger, Bruce G. 1980 Archaeology and the Image of the American Indian. American Antiquity 45: 662-676.
- 479000 Trigger, Bruce G. 1981 Archaeology and the Ethnographic Present. Anthropologica 23(1).
- 479100 Trigger, Bruce G. 1981 Giants and Pygmies: The Professionalization of Canadian Archaeology. In **Towards a History of Archaeology**, edited by Glyn Daniel, pp. 69-84. Thames and Hudson, London.
- 479530 Trigger, Bruce G. 1982 Ethnohistory: Problems and Prospects. Ethnohistory 29: 1-19.
- 479550 Trigger, Bruce G. 1983 American Archaeology as Native History: A Review Essay. The William and Mary Quarterly (3rd series) 40: 413-452.
- 479555 Trigger, Bruce G. 1984 Indian and White History: Two Worlds or One? In Extending the Rafters: Interdisciplinary Approaches to Iroquoian Studies, edited by M.K. Foster, J. Campisi and M. Mithun, pp. 17-33. State University of New York Press, Albany, New York.
- 479558 Trigger, Bruce G. 1985 Social Archaeology: From Where? To Where? In Status, Structure and Stratification, edited by M. Thompson et al., pp. 1-10. Calgary.
- 479560 Trigger, Bruce G. 1985 Natives and Newcomers: Canada's "Heroic Age" Reconsidered. McGill-Queen's University Press, Kingston and Montreal.
- 479565 Trigger, Bruce G. 1987 Introduction to Papers on the Beginnings of the Fur Trade. Man in the Northeast 33: 27-30.
- 481095 Trudel, Marcel 1973 La Population du Canada en 1663. Fides, Montreal.
- 481100 Trudel, Marcel 1973 The Beginnings of New France 1524-1663. McClelland and Stewart, Toronto.

- 481300 Trumpy, H. 1983 Volkskundliche Uberlegungen zum Rauchen. Therapeutische Umschau/Revue therapeutique 40(2): 165-168.
- 484050 Tuck, James A. 1971 Onondaga Iroquois Prehistory. Syracuse University Press, Syracuse.
- 484100 Tuck, James A. 1974 Review of: Smoking Technology of the Aborigines of the Iroquois Area of New York, by Edward Rutsch. **Pennsylvania Archaeologist** 44(1-2): 25-26.
- 485000 Turbyfill, Charles O. 1928 Steatite Effigy Pipe From the Old Cherokee Country in North Carolina. Indian Notes (Museum of the American Indian, Heye Foundation) 5: 318-320.
- 485900 Turnbaugh, William A. 1975 Tobacco, Pipes, Smoking and Rituals Among the Indians of the Northeast. Quarterly Bulletin of the Archaeological Society of Virginia 30(2): 59-71.
- 486000 Turnbaugh, William A. 1976 The Survival of a Native Craft in Colonial Rhode Island. Man in the Northeast 11: 74-79.
- 487000 Turnbaugh, William A. 1977 Elements of a Nativistic Pipe Ceremonialism in the Post-Contact Northeast. Pennsylvania Archaeologist 47(4): 1-7.
- 488000 Turnbaugh, William A. 1979 Calumet Ceremonialism as a Nativistic Response. American Antiquity 44: 685-691.
- 488200 Turnbaugh, William A. 1984 Cloudblowers and Calumets. In **Plains Indian Seminar in Honor of Dr. John C. Ewers,** edited by G.P. Horse Capture and G. Ball, pp. 54-72. Buffalo Bill Historical Center, Cody Wyoming.
- 488300 Turnbaugh, William A. (?) An Unusual Effigy. Unpublished manuscript.
- 488500 Turner, Nancy J. and R.L. Taylor 1972 A Review of the Northwest Coast Tobacco Mystery. Syesis 5: 249-257.
- 488750 Turner, Victor 1980 Encounter with Freud: The Making of a Comparative Symbologist. In The Making of a Psychological Anthropology, edited by George D. Spindler, pp. 558-583. University of California Press, Berkeley.

- 489200 Tyler, Lyon G. (editor) 1930 Narratives of Early Virginia 1606-1625. Charles Scribner's Sons, New York.
- 489250 Tylor, Edward B. 1929 Primitive Culture: Researches into the Development of Mythology, Philosophy, Religion, Language, Art, and Custom, 2 volumes (first edition 1871), John Murray, London.
- 489410 Uhle, Max 1886 Zwei prähistorische Elephantendarstellungen aus Amerika. Zeitschrift fur Ethnologie 18: 322-328.
- 489420 Uhle, Max 1898 A Snuffing-Tube From Tiahuanaco. University of Pennsylvania Free Museum of Science and Art Bulletin 1(4): 158-177.
- 489450 Umberger, Eugene Jr. 1984 **Tobacco and Its Use: A Bibliography of the Periodical Literature.** Privately published, Rochester, New York. van Curler, Arent see 528850

van den Bogaert, H.M. see 528850

- 489950 Van der Donck, Adriaen 1841 Description of the New Netherlands (1656). Collections of the New-York Historical Society (2d series) 1: 125-242.
- 496000 Vanderwal, Ronald L. 1966 Fort Michilimackinac: Dating Techniques. Michigan Archaeologist 12(3).
- 496500 Van Epps, Percy M. 1894 The Mutilation of Archaeologic Finds. American Antiquarian 16: 110-113.
- 496700 Van Lancker, Julien L. 1977 Smoking and Disease. In **Research on Smoking Behavior** edited by M.E. Jarvik et al. Department of Health, Education and Welfare, Washington, D.C.
- 496840 Venner, Tobias 1621 A Briefe and Accurate Treatise, Concerning, the Taking of the Fume of Tobacco, which very many in these days do too too licentiously use. London.
- 496870 Verhaeren, Emile 1986 Les fumeurs. **Psychotropes** 3(1): 57-60.

- 497000 "Veteran of Smokedom" 1876 The Smoker's Guide, Philosopher and Friend... Hardwick and Bogue, London.
- 498000 Vining, Edward P. 1885 An Inglorius Columbus; or, Evidence that Hwui Shan and a Party of Buddhist Monks From Afghanistan Discovered America in the Fifth Century, A.D. New York.
- 498500 Vitagliane, Antonio 1650 De Abusu Tabaci. Rome.
- 499000 Vogel, Virgil J. 1970 American Indian Medicine. University of Oklahoma Press, Norman.
- 499055 Voges, Ernst 1984 **Tobacco Encyclopedia.** Tobacco Journal International, Mainz, West Germany.
- 500000 von Gernet, Alexander D. 1982 Interpreting Intrasite Spatial Distributions of Artifacts: The Draper Site Pipe Fragments. Man in the Northeast 23: 49-60.
- 500500 von Gernet, Alexander D. 1985 Analysis of Intrasite Artifact Spatial Distributions: The Draper Site Smoking Pipes. Museum of Indian Archaeology (London, Canada) Research Report no. 16: 1-271.
- 500607 von Gernet, Alexander D. 1985 The Anthropology of Nicotiana: Origins and Use of Tobacco Among Aboriginal Cultures (project description). In Directory of On-Going Research in Smoking and Health 1984-1985. World Health Organization and Office on Smoking and Health, Washington, D.C., p. 27.
- 500630 von Gernet, Alexander D. and P. Timmins 1987 Pipes and Parakeets: Constructing Meaning in an Early Iroquoian Context. In **Archaeology as Long-Term History**, edited by Ian Hodder, pp. 31-42. Cambridge University Press, London.
- 500700 von Hohberg, Wolfgang H. and J. Gerhard 1675 Lust-Und Artzeney-Garten. Regensburg.
- 500850 Voshall, Charles 1973 The Unusual Discovery of a Metal Trade Axe (pipe). Ohio Archaeologist 23(1): 12.
- 500860 Voshall, Pauline 1972 A Clay Trade Pipe. Ohio Archaeologist 22(4): 13.

- 501000 Wagner, Norman E., L.E. Toombs and E.R. Riegert 1973 The Moyer Site: A Prehistoric Village in Waterloo County, (Chapter 3 - Ceramic Pipes). Wilfred Laurier University Press, Waterloo, Ontario.
- 501400 Wagner, Susan 1971 Cigarette Country: Tobacco in American History and Politics. Praeger, New York.
- 502000 Walker, Edwin F. 1943 World Crops Derived from the Indians. Southwest Museum Leaflets 17.
- 502900 Walker, Iain C. 1971 An Archaeological Study of Clay Pipes from the King's Bastion, Fortress of Louisbourg. Canadian Historic Sites: Occasional Papers in Archaeology and History 2: 57-122. National Historic Sites Service, Ottawa.
- 503000 Walker, Iain C. 1971 Nineteenth-Century Clay Tobacco Pipes in Canada. Ontario Archaeology 16: 19-35.
- 503200 Walker, Iain C. 1973 Cajote - A Franco-African Word for a Tobacco-Pipe? West African Journal of Archaeology 3: 239-243.
- 503230 Walker, Iain C. 1977 Clay Tobacco-Pipes, With Particular Reference to the Bristol Industry. National Historic Parks and Sites Branch, Parks Canada, Department of Indian and Northern Affairs, History and Archaeology 11. Ottawa.
- 503240 Walker, Iain C. 1983 Nineteenth-Century Clay Tobacco-Pipes in Canada. In **The Archaeology of the Clay Tobacco Pipe**, Volume 8, edited by Peter Davey, pp. 1-87, B.A.R. International Series 175.
- 503300 Walker, Winslow M. 1928 California Indian Pipes, Ancient and Modern. Unpublished M.A. thesis, University of California, Berkeley.
- 503360 Wallace, Anthony F.C. 1958 Dreams and the Wishes of the Soul: A Type of Psychoanalytic Theory among the Seventeenth Century Iroquois. American Anthropologist 60: 234-248.
- 503380 Wallace, Anthony F.C. 1972 The Death and Rebirth of the Soneca. Vintage Books, New York.
- 503412 Walworth, Ellen H. 1893 The Life and Times of Kateri. Tekakwitha: The Lily of the Mohawks. Peter Paul and Brother. Buffalo.

- 503420 Wardle, H. Newell 1949 Janus-Faced Pipes. Pennsylvania Archaeologist 19(1-2): 27-29.
- 503421 Wardle, H. Newell 1949 Corrections: On Janus-Faced Pipes. Pennsylvania Archaeologist 19(3-4): 87.
- 503571 Wassén, S. Henry 1963 Some General Viewpoints in the Study of Native Drugs Especially from the West Indies and South America. Ethnos 28(1-2): 97-120.
- 503600 Wassén, S. Henry 1967 Anthropological Survey of the Use of South American Snuffs. In Ethnopharmacologic Search for Psychoactive Drugs, edited by D.H. Efron, pp. 233-289. Public Health Service Publication no. 1645. Washington, D.C.
- 503630 Wassén, S. Henry 1972 The Anthropological Outlook for Amerindian Medicinal Plants. In **Plants in the Development of Modern Medicine**, edited by Tony Swain, pp. 1-65. Harvard University Press, Cambridge, Massachusetts.
- 503660 Wasson, R. Gordon 1963 Notes on the Present Status of Ololiuhqui and the Other Hallucinogens of Mexico. Botanical Museum Leaflets (Harvard University) 20(6): 161-193.
- 503960 Wateson, George 1598 The Cures of the Diseased in remote regions. Preventing Mortalitie indicent in Forraine Attempts of the English Nation. London.
- 503992 Watt, John M. 1953 The Tobacco Habit: Some Historical and Pharmacological Points. South African Journal of Clinical Science 4(2): 94-105.
- 504000 Watt, John M. 1972 Magic and Witchcraft in Relation to Plants and Folk Medicine. In **Plants in the Development of Modern Medicine,** edited by Tony Swain, pp. 67-102. Harvard University Press, Cambridge, Massachusetts.
- 504450 Webb, Wm. S. 1925 Report of a New Double Conoidal Pipe From Kentucky. American Anthropologist (n.s.) 27(3): 441-446.
- 504500 Weber, Carl 1962 Weber's Guide to Pipes and Pipe Smoking. Cornerstone Library, New York.

505000 Weber, Joann C. 1970 **Types and Attributes in the Study of Iroquois Pipes.** Unpublished Ph.D. dissertation, Harvard University, Cambridge, Massachusetts.

€

- 505100 Weber, J. Cynthia 1971 Types and Attributes in Iroquois Pipes. Man in the Northeast 2: 51-65.
- 505250 Weber, Robert F. 1972 Pipe Smoking in Early America. Early American Life 3(4): 48-50.
- 507000 Weinman, Paul L. 1965 Two Small Stratified Sites on Lake George. New York State Archeological Association Bulletin 34.
- 508000 Weinman, Paul L. and T.P. Weinman 1971 The Rip Van Winkle Site. **Pennsylvania Archaeologist** 41(1-2).
- 509000 Weinman, Paul L. and T.P. Weinman 1974 Rip Van Winkle No. 2 Site. New York State Archeological Association Bulletin 62.
- 510000 Weinman, Paul L. and T.P. Weinman 1977 Two Middle Hudson Valley Sites. New York State Archeological Association Bulletin 70.
- 510100 Weiser, Conrad 1904 The Journal of Conrad Weiser Esqr., Indian Interpreter, to the Ohio (1748). In Early Western Travels 1748-1846, Volume 1, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 510300 Welby, Adlard 1905 A Visit to North America and the English Settlements in Illinois. In Early Western Travels 1748-1846, Volume 12, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.

Welch, Hugh see 010958

- 510600 Wells, Edward W. 1972 An Artifactual Report on the Foscoro Site. The Wisconsin Archeologist 53(3).
- 511000 Wentworth, Thos. P. 1892 Early Life Among the Indians: Reminiscences From the Life of Benj. G. Armstrong... Ashland, Wisconsin.
- 511400 Werner, Carl A. 1909 A Textbook on Tobacco. Tobacco Leaf Publishing Co., New York.

- 511500 Werner, Carl A. 1922 Tobaccoland. Tobacco Leaf Publishing Co., New York.
- 512000 Werner, David J. 1972 The Zimmermann Site 36-Pi-14. In Archeology in the Upper Delaware Valley: A Study of the Cultural Chronology of the Tocks Island Reservoir, edited by F.W. Kinsey. The Pennsylvania Historical and Museum Commission Anthropological Series no. 2, Harrisburg, Pennsylvania.
- 512100 Wertz, William 1967 Four Southern Ohio Pipes. Ohio Archaeologist 17(1): 16-17.
- 512300 Weslager, C.A. 1973 Magic Medicines of the Indians. The Middle Atlantic Press, Somerset, New Jersey.
- 512960 West, George A. 1905 The Aboriginal Pipes of Wisconsin. The Wisconsin Archeologist 4(3&4): 41-171.
- 512965 West, G.A. 1910 Pipestone Quarries in Barron County. The Wisconsin Archeologist 9(2): 31-34.
- 512970 West, George A. 1911 Uses of Tobacco and the Calumet by Wisconsin Indians. The Wisconsin Archeologist (0.s.) 10(1): 5-64.
- 513000 West, George A. 1934 Tobacco, Pipes and Smoking Customs of the American Indians. Bulletin of the Public Museum of the City of Milwaukee 17 (2 parts): 1-995. (reprinted in 1970 by Greenwood Press)
- 513010 West, George A. 1935 Fraudulent Aboriginal Pipes. Wisconsin Archeologist (n.s.) 15(3): 49-52.
- 513360 Westwood, Richard W. 1924 Tobacco--The Plant of Peace. Nature Magazine 4(3): 151-154, 186.
- 513375 White, Bruce 1982 Parisian Women's Dogs: A Bibliographical Essay on Cross-Cultural Communication and Trade. In Where Two Worlds Meet: The Great Lakes Fur Trade, edited by Carolyn Gilman, pp. 120-126. Publications of the Minnesota Historical Society Museum Exhibit Series 2. St. Paul, Minnesota.

White, John see 212300

- 513400 White, Leslie A. 1941 Nicotiana Rustica Cultivated by Pueblo Indians. Science 94(2429): 54-65.
- 513500 White, Leslie A. 1942 Further Data on the Cultivation of Tobacco Among the Pueblo Indians. Science 96(2481): 59-60.
- 513505 White, Leslie A. 1943 Punche: Tobacco in New Mexico History. New Mexico Historical Review 18(4): 386-393.
- 518300 White, Thain 1955 Kutenai Pipes. Western Anthropology (American Anthropological Association, Western States Branch) 1: 1-11.
- 521000 Wiener, Leo 1920-1922 Africa and the Discovery of America, 3 volumes. Innes, and Sons, Philadelphia. (reprinted in 1971 by Kraus Reprint)
- 521300 Wiener, Leo 1921 Discussion and Correspondence: Africa and the Discovery of America. American Anthropologist 23(1): 83-94.
- 521310 Wiener, Leo 1925 The Philological History of "Tobacco" in America. Proceedings of the 21st International Congress of Americanists (Goteburg), pp 305-314.
- 521500 Wilbert, Johannes 1972 Tobacco and Shamanistic Ecstasy Among the Warao Indians of Venezuela. In **Flesh of the Gods**, edited by Peter T. Furst, pp. 55-83. Praeger Publishers, New York.
- 521700 Wilbert, Johannes 1975 Magico-Religious Use of Tobacco Among South American Indians. In Cannabis and Culture, edited by Vera Rubin, pp. 439-461. Mouton Publishers, The Hague. (also published in Spirits, Shamans, and Stars edited by D.L. Browman and R.A. Schwarz, pp. 13-38. Mouton Publishers, The Hague, 1969)
- 521830 Wilbert, Johannes 1987 Tobacco and Shamaniam in South America. Yale University Press, New Haven and London.
- 521900 Wilbur, C. Keith 1978 The New England Indians. The Globe Pequot Press, Chester, Connecticut.

- 524000 Wildschut, William 1928 Blackfoot Pipe Bundles. Indian Notes (Museum of the American Indian, Heye Foundation) 5: 19-33.
- 524600 Willey, Gordon R. and J.A. Sabloff 1980 A History of American Archaeology, 2d edition. W.H. Freeman, San Francisco.
- 524700 Williams, Glyndwr and R. Glover 1969 Andrew Graham's Observations on Hudson's Bay, 1767-91. The Hudson's Bay Record Society, London.
- 524800 Williams, M.P. 1937 A Carved Pestle and Fipe-Stem From British Columbia. Man 37: 169-170, Plate L.
- 525000 Williams, Roger 1971 A Key Into the Language of America, edited by R.C. Alston. Scolar, Menston, England.
- 525400 Williams, Samuel C. (annotator) 1927 Lieut. Henry Timberlake's Memoirs 1756-1765. The Watauga Press, Johnson City, Tennessee.
- 525410 Williams, Samuel C. (editor) 1928 Early Travels in the Tennessee Country 1540-1800. The Watauga Press, Johnson City, Tennessee.
- 528000 Wilson, Budd 1975 Well, Well, Well, Well. Bulletin of the Archaeological Society of New Jersey 32: 21-22.
- 528190 Wilson, Daniel 1851 The Archaeology and Prehistoric Annals of Scotland. London.
- 528200 Wilson, Daniel 1857 Pipes and Tobacco; an Ethnographic Sketch. Toronto.
- 528250 Wilson, Daniel 1862 Prehistoric Man: Researches into the Origin of Civilisation in the Old and the New World, 2 volumes, Cambridge and London.
- 528850 Wilson, Jas. Grant 1896 Arent van Curler and His Journal of 1634-35. Annual Report of the American Historical Association for the Year 1895: 81-101. (This journal is now thought to have been authored by Harmen Meyndertsz van den Bogaert; see 220230)



- 528970 Winslow, Edward 1624 Good News From New England: or a true Relation of things very remarkable at the Plantation of Plimoth in New England. London.
- 529000 Winsor, Justin 1889 Narrative and Critical History of America. Cambridge.
- 529900 Wintemberg W.J. 1924 Examples of Graphic Art on Archaeological Artifacts from Ontario. Transactions of the Royal Society of Canada, Series 3 (Section 2) 18: 33-50.
- 533500 Wintemberg, W.J. 1936 Roebuck Prehistoric Village Site, Grenville County, Ontario. National Museum of Canada Bulletin 83. Anthropological Series no. 19.
- 536000 Winterbotham, W. 1795 An Historical, Geographical, Commercial, and Philosophical View of the American United States, and of the European Settlements in America and the West-Indies, 4 volumes. London.
- 542000 Wissler, Clark 1940 Indians of the United States. Doubleday, Doran and Co., New York. (see also 542005)
- 542005 Wissler, Clark 1966 Indians of the United States, revised edition. Doubleday and Co., Garden City, New York. (see also 542000)
- 543000 Wissler, Clark 1957 The American Indian, 3rd edition. Peter Smith, Gloucester, Massachusetts.
- 543300 Witsch, Nicholas 1902 The Comic History of Tobacco: Chapter 8 - How Tobacco Saved the Day for Good Morals in New Amsterdam in the Olden Time. Canadian Cigar and Tobacco Journal 8(7): 389, 391.
- 543500 Witthoft, John 1949 Stone Pipes of the Historic Cherokees. Southern Indian Studies 1(2): 43-62.
- 543600 Witthoft, John, H. Schoff and C. Wray 1953 Micmac Pipes, Vase-Shaped Pipes, and Calumets. Pennsylvania Archaeologist 23(3-4): 89-107.
- 543700 Wittry, Warren L. 1963 The Bell Site, Wn9, An Early Historic Fox Village. The Wisconsin Archeologist 44(1).

543800 Wolf, Eric R. 1982 Europe and the People Without History. University of California Press, Berkeley.

- 544200 Wood, William 1634 New Englands Prospect. A true, lively, and experimental description of that part of America, commonly called New England. London.
- 544250 Wood, William 1898 New Englands Prospect, edited by E.M. Boynton. Boston.
- 545200 Woodward, W. Elliot 1883 Frauds Found in North Carolina. The American Antiquarian 5(3): 278-279.
- 546000 Woolfrey, Sandra, P. Chitwood and N.E. Wagner 1976 Who Made the Pipes? A Study of Decorative Motifs on Middleport Pipe and Pottery Collections. **Ontario Archaeology** 27: 3-12.
- 546200 Wraxall, Peter 1915 An Abridgment of the Indian Affairs, edited by Charles H. McIlwain. Harvard University Press, Cambridge.
- 546500 Wray, Charles F. 1956 Seneca Tobacco Pipes. New York State Archeological Association Bulletin 6: 15-16.
- 547500 Wright, Amos Jr. and R. Yates 1969 A Ceremonial Pipe. Journal of Alabama Archaeology 15(2): 59-62.
- 548000 Wright, Gary A. 1967 Some Aspects of Early and Mid-Seventeenth Century Exchange Networks in the Western Great Lakes. Michigan Archaeologist 13(4).
- 551000 Wright, J.V. 1967 The Pic River Site: A Stratified Late Woodland Site on the North Shore of Lake Superior. National Museum of Canada Bulletin 206. Contributions to Anthropology V: Archaeology and Physical Anthropology.
- 555000 Wright, J.V. 1972 The Dougall Site. Ontario Archaeology 17: 3-23.
- 555100 Wright, J.V. 1972 Ontario Prehistory: An Eleven-thousand-year Archaeological Outline. Van Nostrand Reinhold, Toronto.
- 556120 Wright, J.V. 1979 Quebec Prehistory. Van Nostrand Reinhold, Toronto.

- 556700 Wright, Louis B. 1949 The Colonial Civilisation of North America 1607-1763. Eyre and Spottiswoode, London.
- 556750 Wright, Louis B. (editor) 1965 The Elizabethans' America: A Collection of Early Reports by Englishmen on the New World. Edward Arnold, London.
- 560000 Wright, Robin K. 1977 Haida Argillite Pipes. Unpublished M.A. thesis, University of Washington.
- 560100 Wright, Robin K. 1979 Haida Argillite Ship Pipes. American Indian Art Magazine Winter: 40-47.
- 560300 Wright, Robin K. 1980 Haida Argillite Pipes: The Influence of Clay Pipes. American Indian Art Magazine Autumn: 42-47, 88.
- 560400 Wright, Robin K. 1980 Lead Inlaid Catlinite Pipes. In Plains Indian Design Symbology and Decoration, edited by Gene Ball and George P. Horse Capture, pp. 77-87. Buffalo Bill Historical Center, Cody, Wyoming.
- 560500 Wright, Robin K. 1982 Haida Argillite Carved for Sale. American Indian Art Magazine Winter: 48-55.
- 560700 Wroth, Lawrence C. 1954 **Tobacco or Codfish: Lord Baltimore Makes His Choice.** New York Public Library, New York.
- 560800 Wyeth, John B. 1905 Oregon; or a Short History of a Long Journey from the Atlantic Ocean to the Region of the Pacific By Land. In Early Western Travels 1748-1846, volume 21, edited by Reuben G. Thwaites. Arthur H. Clark, Cleveland, Ohio.
- 560980 Yager, Willard E. 1953 Orite of Adequentaga: The Journal of Johaness Van Dyk, 1634-1635, edited by Roland B. Hill. Reporter, Walton, New York. (this work appears to be entirely fiction)
- 561110 Young, Alexander 1844 Chronicles of the Pilgrim Fathers of the Colony of Plymouth, from 1602 to 1625. Boston.
- 561150 Youngken, Heber W. 1924 The Drugs of the North American Indian. The American Journal of Pharmacy 96: 485-502.

561200 Yuson, Merriam P. 1981 The Effect of Smoking: Review and Nursing Implications. Issues in Health Care of Women 3(3).

C

562000 Zariphes, Constantine Jr. 1974 Recovery of a Finely Decorated Pipe. Bulletin of the Massachusetts Archaeological Society 35(3-4): 23-25.

.