Cacao in Greater Nicoya
Ethnohistory and a Unique Tradition

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In the first decades following the Spanish Conquest, *Theobroma cacao* L.—also known in ancient times as *cacao*, *coco*, *cacaguat*, *cacague*, and *cacavate* (Benzoni 1857:148; Oviedo 1851–55 v. 1:315, 318)—was one of the most valued commodities produced by lower Central American colonies located in Greater Nicoya, an archaeological subarea comprising modern Pacific Nicaragua and northwestern Costa Rica (Figure 12.1) (Bergmann 1969; W. R. Fowler 1987; M. MacLeod 1973; P. MacLeod 1996; Rosés Alvarado 1982). Greater Nicoya was distinguished from surrounding areas by the presence of migrant Mesoamerican populations from Central Mexico, and, as in Mesoamerica proper, the post-Conquest importance of cacao here had pre-Conquest antecedents. In fact, much of what we know about pre-Columbian cacao production in the Americas derives from ethnohistoric accounts of Greater Nicoya.

Traditionally, it has been assumed that cacao was introduced into Greater Nicoya (and Lower Central America in general) during the Mesoamerican Postclassic period (A.D. 900–1521) by the Nicarao, one of the aforementioned migrant Central Mexican groups (see, for example, W. R. Fowler 1989a, 1989b). This argument has been based explicitly on similarities between Mesoamerican and Greater Nicoyan usage and cultivation practices and upon the presumed Nicarao monopoly of the crop. The implicit basis for the argument has been the venerable but outdated Mesoamericanist tradition of assuming *ad hoc* that much of Greater Nicoyan culture is explainable as the result of diffusion from Mesoamerica (see, for example, Lothrop 1926; M. D. Coe 1962; L. A. Parsons and B. J. Price 1971). This argument also appeared to draw support from Cuauhtecasas's (1964) hypothesis (widely accepted by archaeologists, but cf. Motamayor and Lanaud 2002; Motamayor et al. 2002) that cacao originated in the Yucatan. However, although cacao use in Greater Nicoya does demonstrate...
Figure 12.1. Map of Nicaragua and Costa Rica, showing locations discussed in the text. Map by Larry Steinbrenner.
some strong parallels to cacao use in Mesoamerica, a close reading of ethnohistorical accounts hints that there were also significant differences in cacao-related practices which potentially suggest a greater antiquity for the crop in Lower Central America and possibly South American influences as well.

In this chapter I will first identify and summarize the major ethnohistoric accounts of Nicaragua and Costa Rica pertaining to cacao production and use. Then I will discuss similarities and differences between Greater Nicoyan and Mesoamerican practices and their implications. This discussion will also incorporate archaeological evidence of cacao use in Greater Nicoya (and, more generally, in Nicaragua and Costa Rica), examine the problem of why there is currently little of this kind of evidence available, and address how future research might be more successful in providing archaeological evidence of cacao use by the pre-Columbian peoples of Greater Nicoya.

Ethnohistoric Sources

The most important account of cacao production and use in pre-Columbian Greater Nicoya is provided by Gonzalo Fernández de Oviedo y Valdés, the official chronicler of the Indies, who visited Greater Nicoya between 1527 and 1529 and included an account as part of his massive *Historia general y natural de las Indias, islas y tierra-firme del mar oceánico* (1851–55), originally published in 1535. It is Oviedo’s account “which establishes the fact that cacao was an aboriginal cultivated plant in Nicaragua” (Millon 1955a:73). Oviedo provides information about cacao use in Nicaragua in two key sections of his *Historia*: Volume 1, Book 8, Chapter 30, which deals specifically with the cultivation of the cacao plant, and Volume 4, Book 42, which deals more generally with Nicaragua as a whole. Oviedo provides detailed information on such diverse topics as production, orchard layout and ownership, harvesting practices, curing and preparation of seeds, recipes for cacao products, ritual and commercial use, and the presumed Nicarao monopoly (see below).

The only Conquest-era chronicler who rivals Oviedo in terms of detail about cacao in Greater Nicoya is Girolamo Benzoni, an Italian traveler who provided a short description of the cultivation and use of the crop in his *Historia del Mondo Nuovo* (1857), first published in 1565. Additional Conquest-era sources are most valuable for the information they provide about areas in which cacao may have been cultivated prehistorically. Primary among these are Juan López de Velasco’s *Geografía y descripción universal de las Indias* (1894), based on a series of Colonial questionnaires completed in the 1570s, and the *Tasación de tributos* 1548–51, an unpublished tribute assessment list (cited in Bergmann 1969). The letters of Juan Vázquez de Coronado, the conquistador of Costa Rica, provide the earliest comments on cacao cultivation in that country (Berg-
Although written in the seventeenth century, a traveler’s account by Antonio Vázquez de Espinosa (who first visited Nicaragua in 1613), also provides possible insights into areas of prehistoric cacao cultivation, as do contemporary writings to the King of Spain by the Costa Rican cleric Agustín de Ceballos (Bergmann 1969:96; Rosés Alvarado 1982:253-254). Although cacao is also discussed by other chroniclers whose work was based on second-hand accounts of Lower Central America (like Peter Martyr D’Anghera), these secondary sources add little new information about cacao-related practices.

**Ancient areas of production**

The ubiquity of cacao in Nicaragua and Costa Rica is taken for granted in the various ethnohistoric sources, but these same sources tend to be vague with regard to the exact communities where the crop was grown before the arrival of the Spanish. In Nicaragua, only one place is specifically noted to be a center of cacao production: the pre-Columbian town of Tecoatega, where Oviedo visited a cacao harvest festival (1851-55 v. 4:93-94), and which was located somewhere north of the modern city of Chinandega (W. R. Fowler 1989a:67). Later accounts provide more detail: the *Tasacion de tributos* 1548-51 (Bergmann 1969:95) indicates cultivation in the districts of the important Colonial Nicaraguan towns of León and Granada relatively soon after the Conquest (the Spanish arrived in Greater Nicoya in 1522), and López de Velasco (1975:177, 181) confirms that the fields surrounding these towns were fertile in cacao about twenty years later. Around the same time, López de Velasco (1894:312) also reports the gathering of cacao near Nueva Jacn (modern San Carlos) at the head of the San Juan River on the eastern Chontales side of Lake Nicaragua. By the early 1600s, Vázquez de Espinosa could confirm that the cacao plantations of León were a “great source of wealth” (1942:248) and that the slopes of Mombacho Volcano (near Granada) provided “the best and largest variety [of cacao] in all those provinces” (1942:261).

Information from Costa Rica is even rarer. Most of the good sources for Nicaragua do not discuss cacao cultivation in Costa Rica at all. Oviedo, however, mentions a particular method for preparing cacao used in “la provincia de Nicoya” (modern Guanacaste, including the Nicoya Peninsula) and on Chira Island in the Gulf of Nicoya (1851–55, v. 1:318), inferring the presence of cultivation at least this far south. Beyond Greater Nicoya, Vázquez de Coronado reported cacao use in 1563 in the Indian province of Quepo on the Pacific slope of the Central Cordillera (an area not under Spanish control at the time of his visit) as well as cultivation by the indigenous people of Talamanca and by the Votos in northern Costa Rica (P. MacLeod 1996:84). Agustín de Ceballos’s 1610
report of abundant cacao in the Matina Plain and/or the Sixaola Valley on the
Atlantic Coast that was the “best of the realm in quantity and quality” (Rosés
de Coronado’s earlier report of indigenous cacao cultivation in Talamanca, since
the exploitation of Costa Rica’s Atlantic Coast did not expand until the mid­seventeenth century (cf. Rosés Alvarado 1982).2 A much later account from
1783 reports that the Guatusos cultivated cacao in Llanuras de los Guatusos, a
Highland area south of Lake Nicaragua and adjacent to the headwaters of the
San Juan River that was never conquered by the Spanish (Bergmann 1969:96).
Although the reported use of cacao by the Guatusos may, however, suggest a
great antiquity predating the Conquest (for example, beverage chocolate was
offered to their sun god, a practice reminiscent of South American Cuica tra­ditions; cf. Bergmann 1969:88), we must obviously be doubly cautious about
inferring pre-Columbian cultivation in this area based on reports made more
than 250 years after the first arrival of the Spanish in Costa Rica.

If the ethnohistoric record is somewhat vague about the exact loci of pre­
Columbian cacao cultivation throughout Nicaragua and Costa Rica, it none­theless seems clear that the distribution of the plant was widespread. Yet a myth
persists that cacao was grown only in areas under Nicarao control, which is
generally taken to mean primarily in Greater Nicoya on the Pacific Coast (cf.
for this myth is an important passage in Oviedo:

The Indians of the Chorotega tongue are the ancient lords and native
people of those parts . . . and those of Nicaragua and its language are new­comers, they . . . are those who brought to the land the cacao or almonds
that run as money in those parts; and in the power of those are the estates
(heredamientos) of the trees that bear that fruit; and not in the power of
the Chorotegas is a single tree of these. (Oviedo 1851–55, v. 4:60–61)

Oviedo uses the word “Nicaragua” here to name both the Nicarao and their
language, Nahuat, a Nahuatl language closely related to the Nahuatl of Central
Mexico’s Aztecs. The “Chorotega” mentioned in this passage represent another
migrant Mesoamerican group, Oto-Manguean speakers who arrived in Greater
Nicoya centuries earlier (ca. A.D. 800 or 900) than the Nicarao, who may
have arrived as late as A.D. 1350 (Salgado 1996). At the time of the Conquest,
Greater Nicoya appears to have been largely under Chorotega control, whereas
the Nicarao controlled the Isthmus of Rivas and possibly the eastern shore of
Lake Nicaragua. Neighboring pockets of Nahua speakers on the Pacific Coast
around the Gulf of Fonseca (also known as the Nahuatlato) and in central Gua­
acaste (the Bagaces) are also generally grouped with the Nicarao. The Nicarao
have also been associated with the Pipil, a larger and more complex Nahua group involved with large-scale cacao production in Guatemala and El Salvador (W. R. Fowler 1987, 1989a, 1989b, and this volume), and may also have been affiliated with poorly documented Nahua trading colonies established on the Atlantic Coast at the mouth of the San Juan River (the Desguadero) and in the Sixaola area (the Sigua) (Lothrop 1926).

The ubiquity of Nahua groups in Central America and Oviedo's account have tempted scholars (for example, Bergmann 1969; W. R. Fowler 1989a, 1989b; Millon 1955a) to knit them into a sort of implicit "cacao cartel" and draw speculative connections between the colonies and accounts of cacao production, even in areas far from the apparent center of Nicarao power in Rivas. Bergmann (1969:96), for example, suggests that it was the Bagaces and Sigua colonies that introduced cacao into, respectively, Nicoya and the Sixaola Valley, and by the same model we might easily attribute the cacao cultivated at the mouth of the San Juan to the presence of the Nicarao colony on the eastern shore of Lake Nicaragua. Everywhere there is cacao, it seems, one finds Nahua speakers.

Yet the co-occurrence of Nahua colonies and cacao cultivation does not necessarily imply that the latter was introduced by the former. It is equally plausible that the presence of indigenous cacao in these areas is what first attracted the Nahua colonists in the first place. As well, models suggesting Nahua control of cacao production cannot explain the documentary accounts of widespread cacao cultivation in Costa Rican areas beyond Nahua control, such as Quepo, Chira Island, and the Talamanca, Voto, and Guatuso territories. Clearly, cacao trees were "in the power" of more groups than the Nicarao. The Nahua-control model does not even account particularly well for reports of cacao production closer to the Nicarao heartland shortly after the Conquest. León and Granada, the two towns where cacao cultivation was already underway during the time of the Tasación de tributos 1548–51, were both founded in 1524 in areas formerly under Chorotega control rather than in Nicarao territory. Is it likely that in only twenty-odd years an indigenous Chorotegan population under new Spanish masters could have become proficient at the cultivation of a notoriously finicky tree crop with which they were presumably unfamiliar—assuming they possessed "not a single tree" of cacao? It would seem there is some basis for arguing that Oviedo overstates the case for a Nicarao cacao monopoly.

Cultivation

Oviedo and Benzoni both provide detailed accounts of cacao cultivation—probably the most extensive sixteenth-century accounts that are available on this subject. The relevant passage from Oviedo on this subject is worth quoting at length:
I first want to describe how they grow and cultivate these trees as precious things. They plant in the lands that seem fertile and good and they choose a site with water close by for irrigation during dry periods. They plant them in straight lines and separated ten to fifteen feet in between to allow enough space because they grow and crown out in such a manner that below them all is shaded and the sun cannot reach the earth except for a few parts between some branches. Because some years the sun scalds them in such a way that it fruits in vain and doesn’t form correctly and is lost. To remedy this they put other trees in between; the Indians call these other trees Yauaquyt and the Christians call them blackwood. They grow almost twice the size of the cacao and they protect them from the sun, and make shade with their branches and leaves. (Oviedo 1851–55, v. 1:317)³

Benzoni’s (1857:149) account, which deals with the cultivation of individual cacao trees rather than orchards, confirms the tree’s need for shade and adds the unusual detail that it was common to plant a larger shade tree nearby which was
bent double over the cacao tree to protect it from the sun (Figure 12.2). This practice appears to have been unique to Nicaragua (Millon 1955a:118).

Extremely useful information about cacao cultivation is contained in these accounts. For example, Oviedo confirms the presence of a system of irrigation, a necessity for growing cacao in a region with a pronounced dry season (cf. López de Velasco 1894:318) and a technique of cultivation that was widespread throughout regions of Mesoamerica where rainfall could not be depended upon throughout the year (Millon 1955a:76, 110). This system probably involved the use of canals (A. M. Young 1994:26) and in this respect may have resembled irrigation systems inferred for Pipil cacao orchards in Guatemala and El Salvador (W. R. Fowler 1989b:231). Both accounts make it clear that indigenous cultivators recognized the necessity of shade trees to protect the cacao crop, and Oviedo’s account is specific enough for us to identify a precise species, *Gliricidia sepium* (Jacq.) Steud. This tree is most widely known as *madre de cacao* (‘mother of cacao’) and still serves to shade cacao in modern Guatemalan and Nicaraguan orchards (Millon 1955a:21, 36, 38), although it appears to be more commonly known in Nicaragua by the name that Oviedo provides: *madero negro*, or blackwood (Incer 2000:207). In Nicaragua, it appears that *madre de cacao* is more commonly applied to a species of coral tree (*Erythrina umbrosa* Kunth) (Millon 1955a:21; Squier 1852, v. 1:159–160).

Oviedo is also quite precise regarding the layout of the cacao orchard, which followed a plan that endured until at least the nineteenth century, when the American diplomat Ephraim Squier (1852, v. 1:159–160) visited a Nicaraguan orchard that differed from Oviedo’s only in the substitution of plantains (a Colonial introduction) and coral trees as shade trees. The enduring nature of this particular system of cultivation suggests that it was extremely well developed by the time of European contact.

Unfortunately, although both Oviedo (cf. 1851–55, v. 1:316) and Benzoni provide basic descriptions of the cacao fruit—for example, Benzoni (1857:149) referred to it as being “like almonds, lying in a shell resembling a pumpkin in size”—they do not provide enough detail to definitively associate ancient Nicaraguan cacao with a specific modern variety, such as *criollo* (*T. cacao* ssp. *cacao*) or *forastero* (*T. cacao* ssp. *sphaerocarpum*). It is probably safe to infer, however, that the ancient cacao was most closely related to *criollo*, the milder and tastier variety (S. D. Coe and M. D. Coe 1996:28). Nicaragua was once renowned for producing an exceptional variety of *criollo* cacao that contained beans twice the size of other varieties, until a devastating plague wiped out the entire crop in the early twentieth century (Millon 1955a:37).
Harvesting and curing

Benzoni provides a short account of the process of harvesting and curing cacao. After cacao pods have been harvested, the cultivators “pick out the kernels and lay them on mats to dry; then when they wish for the beverage, they roast them in an earthen pan over the fire, and grind them with the stones which they use for preparing bread” (Benzoni 1857:149–150). The result was a paste that provided the foundation for beverage cacao. The “stones” referred to here are likely the manos and metates that are common in the Greater Nicoyan archaeological record, but, curiously, the “earthen pans” do not appear to correlate with any type of vessel in Nicaraguan archaeological assemblages (see, for example, Healy 1980; Salgado 1996; Steinbrenner 2002), although we might expect to find comals (a ubiquitous pan-shaped ceramic form in Central Mexico) in large numbers in an area colonized by Mesoamerican immigrants. Oviedo (1851–55, v. 1:318) reiterates the essential details provided by Benzoni, adding only that the Nicaragua cacao harvest typically lasted from February to April and that harvested seeds were laid out to cure several times during the day rather than simply being left in the sun all day.

Oviedo provides a firsthand account of how the Nicarao celebrated the completion of the cacao harvest (1851–55, v. 4:93–94). On a visit to Tecoatega, Oviedo observed about sixty men painted to appear clothed (some of them made up as women) and dancing around a large pole, at the top of which was a seated, painted “idol” representing “el dios del cacaguat o cacao” (the god of cacao). Four posts formed a platform framework near the top of the pole, and wrapped around these was a thick cord, to the two ends of which were tied two boys of seven or eight years; these voladores threw themselves off the platform and “flew” repeatedly around the pole, propelled by the action of the unwinding cord. At the end of the ceremony, the idol was removed and stored in a temple until the following year. Oviedo’s description and accompanying illustration make it clear that this is a variation of the volador ceremony, which is still practiced in modern Nicaragua as well as in many other parts of Mesoamerica, and which is often associated with fertility and harvest rituals (for example, Larsen 1937; Leal 1977–78).

The specific identity of Oviedo’s “cacao god” is unknown: it may have been the Greater Nicoyan counterpart of various Mesoamerican gods associated with cacao and trade, such as the Central Mexican god Yacatecuhtli (Millon 1955a:119–120; J. E. S. Thompson 1956:103), his Maya counterpart Ek Ch’uh (God M), or Ch’ok Kakaw (Young Maize), who is depicted with cacao pods sprouting from his body in Classic Maya scenes (Marc Zender, personal communication 2002).
**Preparation**

Oviedo (1851–55, v. 1:318–319) notes that the thick paste that resulted from grinding cacao was formed into small cakes which were left to stand before being used to make drinks (see McNeil, Figure 17.5, this volume). The longer the cake was let stand, the higher the quality of the beverage product, with five or six days being ideal. A red dye made from the seeds of *Bixa orellana* L. (*annatto, achiote*) was added to the paste to give it the color of blood, a practice that Oviedo found appalling but in keeping with what he describes as the locals' taste for human blood. Oviedo also discusses a specific method of extracting cacao fat in Nicoya province (1851–55, v. 1:318–319). As in Mesoamerica, the cacao paste was mixed with water and sometimes spices and was served most commonly in calabashes (Benzoni 1857:148–150; Bergmann 1969:85; S. D. Coe and M. D. Coe 1996:64–66; Millon 1955a:165). Ground, toasted maize was another common additive in indigenous Mesoamerican cacao preparations and remains an ingredient in the modern Nicaraguan beverages *pinolillo* (which is traditionally made of *Theobroma bicolor* Bonpl. pulp rather than *T. cacao* seeds [A. M. Young 1994:15]) and *tiste*, though it is not mentioned by Benzoni or Oviedo.

**Uses**

Oviedo, who did not like the look of cacao, was happy to proclaim its virtues and versatility, observing that drinking cacao satisfied thirst and hunger and that the natives used it to protect their complexions from the sun and air, although Christians would find this usage to be dirty (1851–55, v. 1:318). He also reports that cacao had medicinal value: he notes a native belief that one who has consumed cacao in the morning will not die if bitten by a poisonous snake during the day, and he relates how cacao butter provided an effective balm when he himself suffered a severe injury traveling from León to Nicoya province (1851–55, v. 1:318–320). As well, Oviedo reports that some natives consumed the pulp and uncooked seeds (1851–55, v. 1:321). Benzoni (1857:148–150) was also a grudging admirer of cacao beverages, noting that although he initially avoided drinking cacao, he eventually tried it and found that “it satisfies and refreshes the body without intoxicating.”

In Mesoamerica, cacao was extensively used in ritual and was often associated with major life events such as birth, marriage, and death (J. E. S. Thompson 1956:104). The ritual use of cacao is not well documented for Greater Nicoya, but it can perhaps be inferred, especially given the aforementioned analogous association of cacao with human blood. Oviedo does specifically note that cacao was prepared for use in marriage ceremonies (1851–55, v. 4:49), though
whether the bride and groom exchanged foaming cups of the beverage as is often depicted in Mixtec codices is unknown. Benzoni (1857:152) also notes that cacao was consumed frequently during dance festivals. It is likely that cacao's ritual importance partially explains why the tree was prized above all others among the natives of Greater Nicoya (Oviedo 1851–55, v.1:315; cf. Benzoni 1857:150). It seems unlikely that this value derived solely from the perceived nutritional and restorative value of cacao.

In Greater Nicoya cacao was used as money, just as it was across Mesoamerica (cf. Andagoya 1865:33; Benzoni 1857:149; Oviedo 1851–55, v. 4:36). Oviedo notes that the natives of Greater Nicoya could buy all things with cacao beans, and he even provides some sample prices: a munonzapote fruit (likely nispero, Pouteria sapota L.) was worth a half bean; a rabbit, ten beans; a slave, one hundred; the services of a prostitute, eight to ten beans (Oviedo 1851–55, v. 1:316). These appear to have been “ballpark” prices for these commodities rather than fixed rates; an interview conducted by Francisco de Bobadilla and reported in Oviedo indicates that bargaining was the norm in the Nicaraguan marketplace (Oviedo 1851–55, v. 4:54). Oviedo also indicates that prostitutes were not the only ones in Greater Nicoya who accepted cacao for services rendered; officials serving in public offices could be remunerated with cacao, among other things such as maize or cotton mantles (1851–55, v. 4:54).

Cacao was valuable enough in Greater Nicoya to encourage counterfeiting. Oviedo notes that unscrupulous traders were known to “fake” beans through the seemingly laborious process of removing the bark or shell of a true cacao bean and stuffing it with earth (1851–55, v. 1:316). The fake beans were then mixed with true beans, in the hopes that unwary consumers would not notice them. Sahagún reports similar devious practices from the Valley of Mexico (1950–82, Book 10, Chapter 18, 1961:65). The use of cacao as a medium of exchange appears to have endured in Nicaragua until at least the nineteenth century, when Squier observed cacao being used for this purpose in markets in Granada and León (1852, v. 1:160).

Ownership and access

In some areas of the New World, particularly Mesoamerica, the use of cacao and ownership of cacao plants and/or orchards appears to have been restricted to members of elites (Millon 1955a:131, 167; J. E. S. Thompson 1956:106). Peter Martyr, for example, called cacao “the drink of the noble and rich classes” in Mesoamerica (cited in Millon 1955a:167). Certainly, the ownership of cacao plots may have been subject to some type of restriction in Greater Nicoya, as evidenced by Oviedo’s previously noted observation that the Nicarao “controlled” cacao production in Nicaragua . . . or at least, gave Oviedo reason
to think that they did. Oviedo reports that cacao fields were *heredamientos* controlled by caciques and lords, who owed their possession of these plots to greater princes called *calachuni* or *teyte*, although the word *heredamiento* suggests that inheritance must also have played some role in the transmission of these properties (Oviedo 1851–55, v. 1:316; see W. R. Fowler, this volume, for a discussion of inheritance of cacao trees in neighboring El Salvador). Oviedo claims that only lords and principal men made cacao beverages, because, for the common people, drinking cacao was tantamount to impoverishing oneself or eating or throwing one’s money away (1851–55, v. 1:317).

Oviedo’s account does not specify that common people were not allowed to drink cacao, only that they probably could not afford to do so. Benzoni’s account (1857:150) suggests that consumption of cacao was perhaps somewhat more casual and widespread than Oviedo’s account does; he notes that he was frequently offered the beverage as he traveled throughout Nicaragua and eventually came to drink it quite regularly, apparently as others did. Millon suggests this indicates a lack of sumptuary regulations regarding the use of cacao in Nicaragua akin to those that appear to have been in place in Pipil-controlled El Salvador, where only lords and great warriors were allowed to drink cacao (Millon 1955a:168).

Cacao production in Nicaragua and Costa Rica appears to have been geared towards meeting the local demand rather than to producing an export luxury good intended only for elite use and/or trade (Bergmann 1969:95; P. MacLeod 1996:84). As Bergmann (1969:95) observes, it is significant that only in Nicaragua in the 1548–1551 *Tasación de tributos* was post-Conquest cacao tribute measured in Spanish units rather than in the indigenous units (*xiquipiles* and *zontles*) used everywhere else in Mesoamerica—including neighboring El Salvador (W. R. Fowler 1987:161). Bergmann (1969:95) notes that Oviedo’s extensive discussion of cacao makes no mention of these indigenous units, and suggests that before the Conquest, Nicaragua had no use for these units because it did not participate in the broad commercial movement of cacao across Mesoamerica. This argues against the common assumption that cacao was introduced into Greater Nicoya as a focal crop by Nahua-speaking trader-migrants (see, for example, Abel-Vidor 1980; Bergmann 1969; W. R. Fowler 1987, 1989a; A. M. Young 1994), since, presumably, traders with an overriding interest in cacao would not have forgotten how to measure it.

**Mesoamerican Origins, or Autochthonous Traditions?**

The preceding summary of ethnohistoric information concerning the distribution, cultivation, preparation, use, and ownership of cacao in Greater Nicoya clearly draws a number of parallels with cacao cultivation and use in Meso-
The peoples of Greater Nicoya grew cacao in irrigated orchards as did groups in other Pacific coastal regions (such as El Salvador and Guatemala) and often used a common Mesoamerican shade tree, *Gliricidia sepium*, to protect their crop. They employed the same *mano* and *metate* technology that was in common use throughout Mesoamerica to grind their cacao seeds into paste. The Nicaraos celebrated the cacao harvest with a *volador* ritual based on a Central Mexican harvest festival prototype, made the same symbolic equation between cacao and blood that Mesoamerican groups did, and seem to have used cacao as an important element in various types of rituals (including marriage), just as their northern counterparts did. And, finally, the ancient peoples of Greater Nicoya used cacao as a currency as did Mesoamericans, and there is evidence that elite groups attempted to place the crop under their restricted control.

All this evidence seemingly supports Oviedo’s statement and the prevailing but untested assumption that cacao was introduced into Greater Nicoya by Mesoamerican colonists, most likely the Nicaraos. Yet these are very broad similarities, and there are enough unique practices associated with cacao cultivation and use in Nicaragua and Costa Rica to give us reason to suspect that the crop may have a longer history in the area, one that predates the arrival of Mesoamerican groups. As already noted, the doubling of shade trees observed by Benzoni was unique to this area and is more easily explained as a practice appropriate to individual tree cultivation. This practice alone might infer an older—or at least, distinct—tradition of “cacao culture” based on the exploitation of naturally occurring trees. The use of more than one kind of shade tree (that is, the use of the coral tree as well as the blackwood) might also be meaningful if we make the reasonable assumption that the longer a plant is grown in an area, the greater innovation we might expect to see in how it is managed and/or exploited by groups in the same area. Based on this same principle, we might also expect to see methods of preparing and using cacao in Greater Nicoya that are unlike those documented for Mesoamerica. Although the diversity of cacao beverage “recipes” reported by chroniclers across Mesoamerica (compare Millon 1955a:163–167) makes it difficult to claim that most of the beverages consumed in Nicaragua are the products of an independent local tradition rather than just another variation on a widespread Mesoamerican theme, that Greater Nicoyans used cacao for more than beverages is worth considering. For example, Oviedo’s account explicitly notes that cacao was used medicinally—specifically, as an antivenin, as a medicinal salve, and as “sun-screen” face paint (1851–55, v. 1:318–320). There is no reason to assume that these innovative uses were introduced from Mesoamerica as opposed to being products of a potentially long, independent tradition of experimentation.

The generally higher degree of availability and lack of prohibitions regard-
ing the use of cacao in Greater Nicoya tends to support the argument that the crop was not introduced by an elite group bent on controlling and exploiting it. After all, if an elite Nicara group did introduce the crop, this group does not appear to have done a very effective job in maintaining its intended monopoly, judging by the documented distribution of cacao in areas of Central America and Nicaragua well beyond the sphere of Nicara control (or even influence). Even if the Chorotega in particular did not have any cacao trees of their own, as Oviedo claimed, it seems certain that the same cannot be said for diverse other Central American groups beyond the Nicara. A more likely possibility is that the Nicara, rather than introducing cacao per se, introduced a new approach to growing cacao in Nicaragua; that is, a "Mesoamerican-style" approach focusing on orchard cultivation, and it is not impossible that they chose to colonize Greater Nicoya precisely because they saw the potential to more systematically exploit a crop that was already present in the area. Alternatively, the Nicara may have focused on intensive cacao cultivation to economically compete more effectively with the Chorotega, who had the (presumably considerable) advantages of a longer history in the area as well as a documented monopoly on another luxury crop, the highly prized nispero fruit (Oviedo 1851-55, v. 4:61).

Either way, the apparent lack of use of xiquipiles and zontles does seem to argue against the idea that the Nicara were growing cacao to participate in a widespread trade network, as already noted. The idea that cacao production was geared to meet local needs rather than to produce a luxury trade good seems to better fit the available evidence.

The argument for a greater antiquity of cacao use in Greater Nicoya (as well as in Nicaragua and Costa Rica in general) is supported by the documentation of some of the unique practices from this area which suggest South American rather than Mesoamerican influence, and might therefore date to a time (that is, before A.D. 800 or 900) when groups speaking a Chibchan-related language still dominated the lands that would later be colonized by Mesoamericans. Speakers of Chibchan and Misimalpan (a closely related family) once dominated lower Central America as well as northwestern South America and at the time of the Conquest appear to have remained preeminent in areas of Nicaragua and Costa Rica beyond the bounds of Greater Nicoya where cacao use was recorded (Constenla Umaña 1991, 1994). Bearing this in mind, it is intriguing that the medicinal qualities of cacao (including its beans, butter, and even its bark) were apparently appreciated in parts of northwestern South America (D. Stone 1984:70; see also Bletter and Daly, this volume), as they were in Greater Nicoya. Equally interesting is that the aforementioned pulp-based pinolillo beverage and Oviedo's account of the occasional consumption of cacao pulp are reminiscent of South American practices pertaining to cacao consumption. A.
M. Young (1994:15) observes that the eastern boundary of Colombia's Choco Province forms a sort of boundary with regard to the way cacao is used in the Americas: above the line, beans are used to make beverages, whereas below the line, the pulp is used to make a "frothy beverage with a citrus-like flavor." It is possible that the line could once have been drawn further north (see also this volume: Henderson and Joyce; McNeil, Chapter 17). Unfortunately, however, the general dearth of ethnohistoric and/or archaeological data regarding the use and potential cultivation of cacao in pre-Columbian South America and lower Central America (cf. Bergmann 1969:87; Bletter and Daly, this volume; S. D. Coe and M. D. Coe 1996:26; Millon 1955a:267; Motamayor and Landaud 2002:85; D. Stone 1984:69; A. M. Young 1994:15), makes it difficult to determine whether cacao cultivation and use in Nicaragua and Costa Rica were similar in other ways to practices from further south.

Although ethnohistoric accounts of cacao use in Greater Nicoya are certainly not absent, the lack of archaeological data that might support these accounts certainly rivals the lack of archaeological data in South and Central America. If cacao use and cultivation were to be inferred solely on the basis of the archaeological record, it would be difficult for even the most creative archaeologist to argue that cacao was as significant a commodity in Greater Nicoya as ethnohistory suggests, or even to argue that it was grown in this area in pre-Columbian times at all. Notably, this is as true for areas where ethnohistorians indicate that cacao was cultivated (that is, areas formerly under Nicarao control) as it is for areas where cacao was supposedly not cultivated, such as León and Granada (formerly under Chorotega control).

The lack of archaeological data is perhaps not surprising given that the archaeology of Nicaragua, in particular, is far less well known than that of any other country of Central America and also given that so many of the potential definitive material indicators of cacao use—especially, the tree, its pods and seeds, calabash drinking vessels, and wooden molinillo stirring sticks (the latter curiously undocumented for Greater Nicoya, though they are used modernly)—are perishable articles that usually decay rapidly in tropical environments. The relatively good preservation of organic artifacts (including possible cacao seeds) recently recovered from fieldwork at the Santa Isabel site in Rivas, Nicaragua (McCafferty and Steinbrenner 2003; McCafferty et al. n.d.; Steinbrenner 2002) seems to be an exception to this general rule. On the other hand, well-preserved items of material culture that have been ethnohistorically associated with cacao preparation, like manos and metates, have not been subjected to the kind of residue or use-wear analyses that might connect them to cacao cultivation archaeologically and have, therefore, instead been associated almost exclusively with maize cultivation. The same situation applies for ceramic vessels, at
least some of which likely contained cacao at some point in their use-histories, like pots recovered from various Mesoamerican contexts (for example, Hall et al. 1990; Henderson and Joyce, this volume; Hurst, this volume; Hurst et al. 1989; McNeil, Hurst, and Sharer, this volume; D. Stuart 1988).

Greater Nicoya also appears to lack representations of cacao plants or use comparable to the artistic depictions in various media (for example, murals, codices, ceramics, sculpture) from El Salvador, the Maya area, or Central Mexico. For example, out of tens of thousands of ceramic, lithic, and bone artifacts recovered from the Santa Isabel site, the only artifact that might be symbolically associated with cacao was a ceramic object (a pendant or possible penis sheath, cf. Enslow 1990:92) that may represent a cacao pod (Figure 12.3) (McCafferty and Steinbrenner 2003; Steinbrenner 2002).

Yet if the archaeological record has to date remained silent about the subject of cacao use in Greater Nicoya, it has occasionally hinted that cacao's distribution extended beyond the reach of the Nicarao. Macrobotanical remains from the Ayala site in the Department of Granada included cacao, from an area that was beyond Nicarao territory and from a Bagaces period (A.D.-300–800) context which long predated the arrival of any Mesoamerican group in the area (Salgado 1996:179). A possible cacao-shaped rattle found in Las Huacas in the center of the Nicoya peninsula (D. Stone 1984:74: provenience unreported) also suggests a ritual significance for the plant outside Nicarao territory. If the aforementioned Santa Isabel cacao artifact is a penis sheath, this would also suggest southern rather than northern connections, since penis sheaths are more typical of South America than Mesoamerica (for example, Chapman 1974:30–31).

Figure 12.3. Possible “cacao pod” pendant or penis sheath (7.5 cm x 4 cm). Excavated at Santa Isabel, Nicaragua. Drawing by Eliud Guerra.
Conclusion

The preceding survey and discussion of the ethnohistoric evidence for _Theobroma cacao_ cultivation and use in Greater Nicoya suggests that although cacao use in Nicaragua and Costa Rica was considerably influenced by the presence of various groups of Mesoamerican colonists that arrived after A.D. 800 or 900, it is unlikely that the presence of the crop can be explained through an outdated model that suggests that one of these groups introduced cacao into the area and then proceeded to monopolize its cultivation. A more parsimonious explanation is that cacao was known and used (though not necessarily systematically cultivated) in Lower Central America before the arrival of the Mesoamericans and that the late-arriving Nicarao introduced a new orchard-based system for cultivating and exploiting it when they arrived upon the scene. The presence of cacao may have been one of the motivating factors leading to the Nicarao colonization of Greater Nicoya, or the Nicarao may have focused on this crop in response to the economic challenge posed by the well-established Chorotega. These two hypotheses are not necessarily incompatible: it may have been a little of both.

Although the scant archaeological data that are currently available are not incompatible with the new model proposed here, in truth, they are also insufficient to corroborate most of what ethnohistory tells us and therefore cannot provide any kind of definitive answer to this question. Future research in Greater Nicoya focusing on macro- and microbotanical remains is desperately needed to correct this problem. Ethnohistory has pointed the way for future research; it is hoped archaeology will now step forward and decisively demonstrate whether the power of the Nicarao over cacao was as absolute as Oviedo claimed or as limited as other ethnohistoric sources seem to imply.

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Notes

1. The boundaries of Mesoamerica are widely acknowledged to have shifted over time (cf. Evans 2004:19). For the purposes of this chapter, "Mesoamerica" generally re-
fers to those regions of this culture area whose enduring "Mesoamerican-ness" is beyond question (such as Central Mexico and the Maya area) and excludes peripheral areas (like Greater Nicoya) that can only be properly included in Mesoamerica at certain periods in their prehistory.

2. Rosés Alvarado (1982) and Bergmann (1969) cite different archival sources with regard to Agustín de Ceballos's letter to the king about cacao cultivation on the Atlantic coast; the former claims the letter discusses the Matina Plain, whereas the latter suggests that it discusses Sixaola. Because the archival sources cited for the letter are different, it is conceivable that both interpretations are correct and that the authors are citing two distinct letters dealing with virtually identical subject matter. Unfortunately, neither primary source was accessible to me at the time of this writing to provide clarification. However, since Sixaola and the Marina Plain are both within the Talamanca area, the Ceballos accounts confirms Vázquez de Coronado's report in either case.

3. This translation is based on A. M. Young (1994:28).

4. The ten-bean rate for a prostitute's service is repeated by Oviedo in a later volume (1851–55, v. 4:37) and was confirmed by López de Gómara (1975:121) in 1552.