

The Hoe Money of Central and South America

By James Martin, NI # 2657

Many have heard of 'Aztec' hoe money but how much do we really know about it? Numismatists, like historians, try to seek out the elusive source of any cultural development and properly place it in the continuum of human progress. The discussion of the first true coins often gets lost in the definition of what a true coinage is. Thankfully, this is well beyond the subject of this monograph. Yet, the issue is a factor in the discussion of whether or not the hoe money of Central and South America should be considered a legitimate form of money.

In the book *Numismatic History of Mexico from the Pre-Columbian Epoch to 1823*, the late author Dr. Alberto Pradeau quotes many sources concerning the "tajaderas." They, and current archeologists and numismatists specializing in Mexican coins, concur that these hoe, or axe, shaped metal artifacts were used as money.

If you review the earliest bronze money of China you can follow the transition of money development from the bronze 'spade,' used as a tool to turn earth and to weed crops, to the proto-coin that was used as money. The proto-coin soon represents a certain standardized weight of metal and can no longer be used as a tool even though it still resembles one. As the transition progresses the money soon loses all visual relationship to the original tool.

In a similar way the hoe money system developed in South America and was quickly adopted in Central America. However, further information and research is required. For instance, the Moche people of northern Peru had double pan balance scales to accompany their emerging hoe technology, yet there is no obvious standardized weight system for the individual hoes. As the photo captions indicate, hoes found in a Mexican hoard do have a wide variance in size and weight. Perhaps this problem was solved somewhat by trading them in large groups. In Ecuador stacks of hoe money have been found in similar-sized groups of up to 500 in a stack.

On the fourth voyage of Columbus, off the north coast of Honduras near Islas de la Bahia (Bay Islands), Columbus described an encounter with a Mayan trade canoe. He said it was as long as a Spanish galley and about 2.5 meters wide. It had a central cabin, and along with the captain, had a crew of about two dozen men. Women and children were also aboard. The cargo consisted of cacao (chocolate beans), metal products such as bells and axes, pottery (including crucibles for metallurgy), cotton clothing, and Mexican style wooden swords with obsidian flake edges.

American cultures valued sea shells and used them as a medium of exchange just as the Chinese and many other world cultures have. While the Chinese valued cowrie shells (*Cypraea moneta*)

the Native Americans valued the larger thorny oyster family (*Spondylus*). However, it was the fruit of the cacahuatl tree, the cacao bean, which served as the basic unit of exchange in the Americas. The highest unit of exchange at the time of the conquest was a sack of cacao beans that consisted of 24,000 beans. The bean was so valued that a form of counterfeiting took place; the bean was hollowed out and the meat of the bean replaced with mud! The early 'bean counters' among the troupe with Hernando Cortez gave the bean a value of 140 to one Spanish silver real.

Other exchange mediums consisted of small pieces of finely woven cloth, stone beads, gold dust kept inside a transparent quill, small disks of tin, and gold flattened into the shape of an eagle with outstretched wings.

Hoe Money (a.k.a. axe, Aztec hoe, and scraper money)

From what is known, metallurgy, and the resultant hoe money, originated in what is now Ecuador and Peru. The Sican, a pre-Inca culture (700 - 1100 A.D.), made extraordinary advances in metallurgy. They created alloys of copper-arsenic which was a brass-like metal. Copper from Peru was traded to the Ecuadorian cultures and then maritime traders from coastal Ecuador brought it to the peoples of west Mexico, the Mixtec, Zapotec and Tarascan. The introduction of these metals took place from 800 - 1200 A.D., also known as the post-Classical era in Mesoamerica. The trade back consisted mainly of the sacred pink *Spondylus* shell, that flourished in the warmer waters further north, and the Mexican hairless dog. The Tarascan culture of west Mexico is known to have made metallurgical advances too. Combined, these pre-conquest, and even pre-Aztec, cultures make up the current Mexican states of Michoacan and Oaxaca.

Interestingly enough, 'Aztec' hoe money is a misnomer; the Aztecs are not known to have used these copper or bronze hoes as a medium of exchange. The Aztecs did take advantage of the new metallurgy to help build their militaristic society as did the Tarascan and other cultures of Mesoamerica. One can wonder if the introduction of metal weaponry didn't help move Mesoamerica from the Classic period to the post-classic period.

While casting metal votive figures is well known throughout Mesoamerica, hoe money is predominately a product of beating the metal into sheets, cutting the sheets into shape, and perhaps hammering a flange on the edges of the shaft to strengthen it. The first reference to this particular form of money was by Francisco Lopez Tenorio in 1548. As a Spanish resident of Antiquera de Oaxaca he described the 'sliced mushroom' shaped piece as well as drew a picture of it. His description read: "This is the form of copper coins that were in use in New Spain. The value placed and at which these were commonly accepted was four such pieces, if new, for five Spanish reales. If worn, many refused to accept them, and they were sold to be melted in ten pieces for one Spanish real. "

Several thoughts come to mind beyond the interesting reference to condition as a measure of value. When I see the ragged edged hoes, ones that look more like a chisel, I imagine that some of the hoes were actually used as tools and that the 'wings' eventually developed metal fatigue and broke off. Then, with further use they became rounded off and ragged edged. What else would have caused them to be so worn as to be devalued to a fraction of their original value? With the weight not being what it should for an average medium of exchange, the pieces had to be devalued and probably melted. While there is no documented evidence for this, the idea is somewhat logical, after all, why did they later hammer the edges to strengthen the shaft if they were not used as tools? Another question should be resolved; what to finally call these pieces of metal money? They originate from a tool of some sort, but was it an axe, a hoe, or a scraper? Haven't actual tools been found that could answer this question? I've chosen to call them all 'hoe' money because I see a better hoe than I do an axe and because this agricultural use fits nicely with the beloved 'spade' coins of ancient China.

You can see the detailed color photos of the hoe money at the new *Numismatics International* Yahoo! Group Web site at:
<http://ph.groups.yahoo.com/group/numismatics/photos/browse/3177> - Click on the 'thumbnail' images to see them in full size (not to scale). You are encouraged to make comments about this article at the *Numismatics International* Yahoo group by 'Posting' to the 'Message' area on the main page. While you are at it, be sure to take the 'Poll' to register your opinion on the usefulness of the NI group.

The following shows photos and descriptions of various types of hoe money:



Earliest Hoe Money, from Ecuador

ca. 800-1400 A.D. The original hoe, axe, or scraper money from which all later Mexican types were derived. Functional shape with usual striations across the top and up the shaft.

From a lot of 20 pieces the average size was 75 mm high by 70 mm at the flared top. Weight range was from 11.72 gm to 20.85 gm with one specimen at 25.39 gm, thus these do not exhibit a monetary weight standard. (Scott Semans)



West Mexico Hoe Money

ca. 1200-1520 A.D. (Guerrero-Michoacan). This is the type that was probably derived from Maritime trade with Ecuador and probably an earlier and certainly a more recent discovery. This form is thin with a crinkled chisel shape, of a copper-arsenic alloy that is 198 x 64 mm.

The edges have not been hammered into a flanged reinforcement. Others of this form are larger (220x77 mm) and some smaller (i.e. 167x60 and 140x58 mm) (Scott Semans)



West Mexico Hoe Money

This type follows the general description of the type above. However, this chisel shaped type is made of thicker metal and side rim flanges have been hammered to reinforce the shaft. Size is 85 x 145 mm - no weight is available. (Scott Semans)



Oaxacan or Mixtec Hoe Money

This type is like the one above with thicker metal and a heavily hammered edge on both sides of the shaft. The size is 167 x 156 mm and the weight is 145 gm. You can see a much better photo of the other side of this piece at:

<http://www.moneta-coins.com/photopost/showphoto.php?photo=315&cat=608>

(James Martin)

Resources:

The Numismatics of Spanish Colonial Mexico; Don Bailey, NLG; World Coin Supplement, November 1987. NOTE: You can see this article in the Library of Moneta Temple & Gallery at www.Moneta-Coins.com

The Ancient Maya; (5th Ed) Robert J. Sharer; Stanford Univ. Press; 1994

Axe Monies and Their Relatives; Dorothy Hosler, Heather Lechtman, and Olaf Holm; 1990

Money In Medieval Mexico; (3 Parts) World Coins; Sidney, Ohio; Apr, Jun, Jul, 1970

Web site: Scott Semans - *Ethnographic Money*; <http://coincoin.com/seXX1.htm>

Web site: Indiana State University; http://www.indiana.edu/~arch/saa/matrix/saa/saa_mod08.html