

LUNAR CULTISM IN THE ANCIENT GREAT LAKES REGION  
OF NORTH AMERICA:  
AN HYPOTHESIS REGARDING THE OLD COPPER CULTURE  
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The origins of copper technology in North America may date to as early as 5,000 B.C. (Steinbring, 1968). At that time, peoples who still valued the styles of what we call the Plano Lithic Tradition began to make a few of their projectile points by cold hammering them from pure copper. The shapes produced were those commonly executed in stone; the Agate Basin and Scottsbluff types. Pure copper nuggets, some of them weighing many hundreds of pounds, were available in glacial deposits, the result of their being wrenched from their original geological sources around Lake Superior and transported far to the south. The earliest known workings of this copper include the Starved Rock Site in Northern Illinois (Mayer-Oakes, 1950), the Modoc Rock Shelter in Southern Illinois (Fowler, 1959) and the Knoop Rockshelter in Southwestern Wisconsin (Wittry, 1959). The mobile hunters of Paleo-Indian times were beginning to restrict their nomadism through the seasonal exploitation of major river systems and the use of large natural shelters. In the course of these changes, some groups discovered the «malleable stone».

As much as two millenia, however, may have passed before the full potentials of the new material were expressed in resource-related technology. At, or slightly before 3,000 B.C., the ancient Indians of the Wisconsin area discovered the socket technique of hafting projectile points or spear heads to shafts. It had not been possible to make sockets in stone. Some of the most distinctive forms of the Old Copper Culture employ this technological feature. It is most interesting to observe that the invention and spread of early types utilizing the socket may associate with the spread, during relatively hot, dry times, of an oak-savannah environment. Hardwoods were probably used in the shafts of these points, since microscopic studies of the earliest socketed copper points show that the blades bear evidence of heat treatment (annealing) while the sockets do not. The shaft acted as an «anvil» during the hot finishing of the blade. Softwoods would not tolerate this treatment.

There is colossal unity in the form of Old Copper artifacts, especially the projectile points. A half dozen taxonomies, developed independently, all share the essential forms at a very high level of detail. The most comprehensive of them, The Wittry Typology applies almost perfectly to collections as far apart as Southern Michigan and Manitoba. This unity, itself, suggests that powerful cultural factors, relating to identity and identity-expressing symbolism, were operative. There have developed in the past decade or so some very good reasons for suspecting that a long span of this copper technological history may have witnessed the emergence and spread of a powerful religious movement based upon a tight relationship between the working of copper itself, and worship of the moon.

Throughout the world, and through many traceable millenia, Man has symbolized the moon with a crescent. While several hundred copper crescents, with

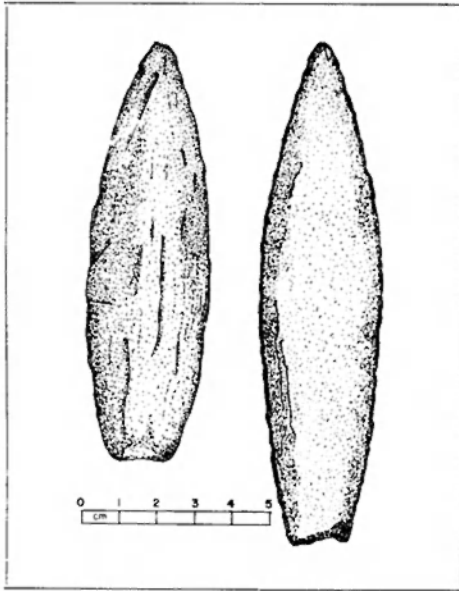
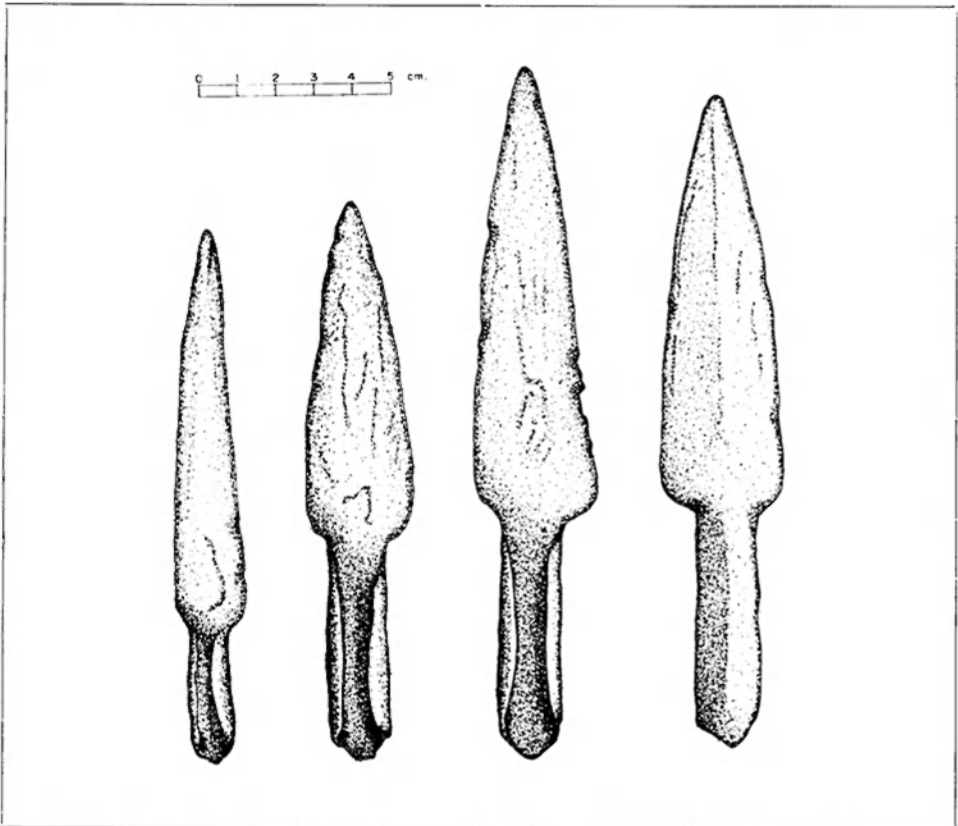


Fig. 75  
 Hammered copper projectile points of  
 the Agate Basin type (circa 5,000 to  
 6,000 B.C.).

Fig. 76  
 Early socketed projectile points of the  
 Old Copper Culture. These are heartland  
 variations of the Wittry Type IA, a  
 bayonet-shaped blade with angular so-  
 cket and a unifacial median ridge (dor-  
 sal). Full size.



remarkable stylistic variety for a single form, are found throughout the sites and localities of the Old Coppel Culture, they have never been viewed by authorities as possible lunar depictions. This is because the first anthropological reflection upon them quickly connected them to the crescentic stone knife of the Eskimo, the «ulu». Undoubtedly this identification was greatly strengthened by the fact that the prehistoric Dorset Eskimo made a variety of ground and polished slate projectile points (and crescent knives) which were virtually identical to some made of copper by the Archaic inhabitants of the Upper Great

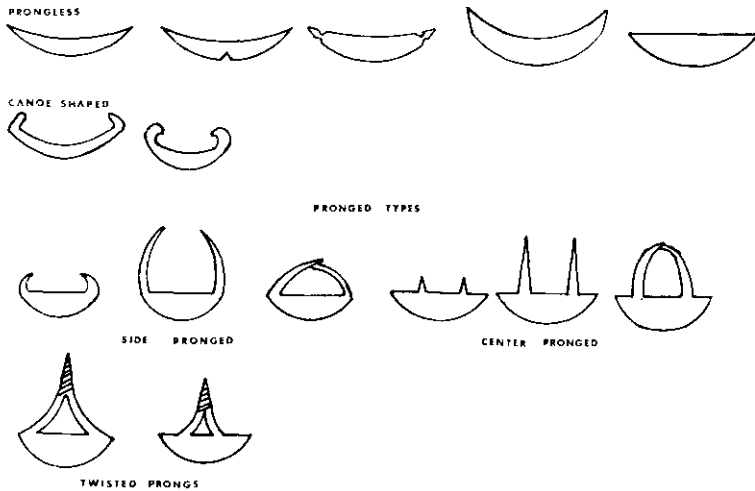


Fig. 77  
*Crescents in the Flakerd Taxonomy (1940). This taxonomy was developed from collections in Minnesota and Wisconsin. It shows the greatest typological variability for the form.*

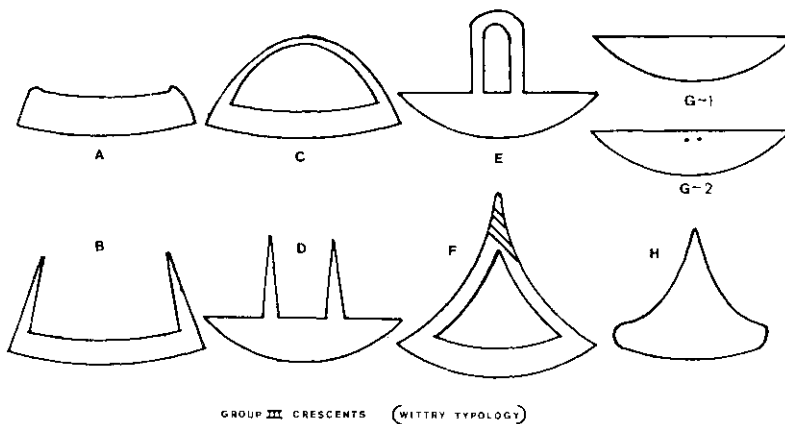


Fig. 78  
*Crescents in the Wittry Typology. The original version of this typology contained ten «junctional groups», further divided into fifty-five types some of which were broken down into sub-types. A recent revision (Steinbring 1975) has increased the number of Wittry types and sub-types to sixty-seven.*

Lakes Region. These similarities led archaeologists in the 1940's to speculate that the Dorset culture was antecedent to Old Copper and in fact, its actual source. In the 1950's, after the development of radiocarbon dating, it soon became apparent that Old Copper antedated Dorset by some thousands of years. As a matter of fact, W.C. McKern, originator of the Midwestern Taxonomic System, saw «Old Copper» as the first identifiable culture in what is now the State of Wisconsin. In 1952, Kenneth Kidd suggested that «Old Copper»

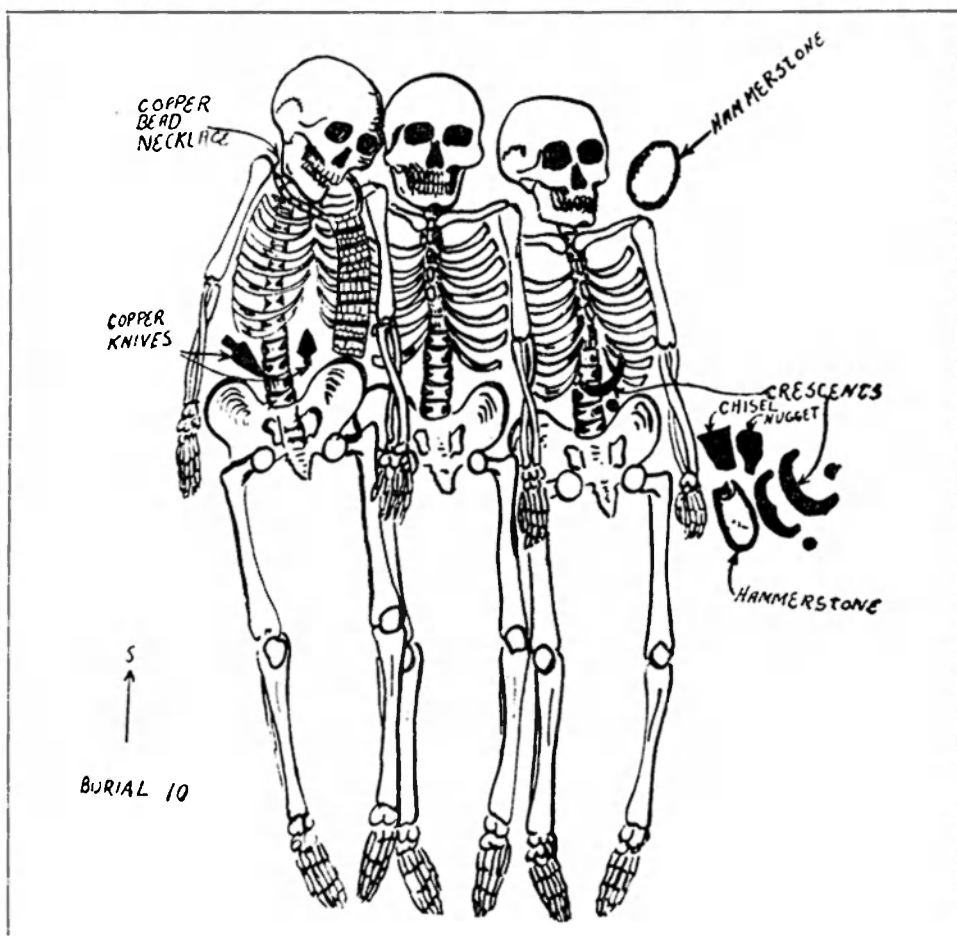


Fig. 79  
Burial 10 and associated copper crescents at the Reigh Site in East-Central Wisconsin. Drawing by Neil J. Ostberg (1957). Courtesy of the «Wisconsin Archaeologist».

was among the earliest cultures in Ontario, and in the same year George Quimby identified the «Old Copper Culture» as directly following the Paleo-Indian Tradition in all of the Upper Great Lakes Region. These assignments were later strengthened by two radiocarbon dates from the Oconto Cemetery, a major Old Copper site. The dates were  $7,510 \pm 340$  B.P. and  $5,600 \pm 400$  B.P., both still hotly contested — but never ignored. The ulu analogy still remained, however, and no critical appraisal of the copper

crescent in the Old Coppel Culture has come forward. It should, however, be noted that some of the major taxonomies had ambiguities when it came to crescents. One, for example classed them as «crescent shaped objects», and separate from «knives». Another classed them in both! Guarded references to their possible non-utilitarian function were made by only a few authorities, and always in an obscure context (such as a footnote to a chart!). Not until 1957 did enough detailed information about archaeological association through excavation appear to satisfy a more advanced order of interpretation. But, it was not pursued. The old «ulu analogy» persisted. A decade later, additional excavations suggested the use of crescents in other than the removal and preparation of animal hides, but there was still no departure from the stereotype. The first clue in the development of a lunar cult hypothesis probably arose in 1899 when a Mr. D. W. Osborn presented to the Wisconsin Archaeological Society three copper objects which had been plowed up on the Okrou farm along the south shore of Lake Butte des Mortes. The find consisted of a wedge, a spud (woodworking tool), and a copper crescent, of the specific sub-type III A-2 (out of 14 possible ones). The site came to be numbered among a dozen or more tool caches discovered in gravel pits throughout East-Central Wisconsin (and one in Ontario) over the next thirty years. A curiously recurrent feature of these caches was the placement of on or more copper crescents among the various tools contained in them. Warren L. Wittry, one of the most prominent authorities on the Old Copper Culture analyzed the contents of these caches in 1950 (1957). He concluded that they were much like the hoards of Bronze Age Europe, and that certain objects or types of objects could be used to relate a large number of them to each other. While he did not suggest a symbolic significance for crescents in these contexts, he did note that crescents formed the over-all binding trait for the eastern Wisconsin copper caches.

In the early 1950's the immediate vicinity of the Okrou find, (now known as The Reigh Site) became a commercial gravel pit. More finds were made, but none found their way into archaeological records until 1953. In that year heavy equipment ripped through a number of human burials, some of them furnished with copper artifacts. An archaeological «rescue mission» was quickly formed through the cooperation of the Wisconsin Archaeological Survey, the University of Wisconsin, and the nearby Oshkosh Public Museum. Some 40 burials were excavated, many with «diagnostic» artifact associations, including items of pure hammered copper. Preliminary descriptions were promptly published, and in 1957 several of these were compiled, with additional reports of subsequent amateur salvage efforts, by Dr. Robert E. Ritzenthaler in the «Wisconsin Archaeologist». Some of the most compelling arguments for lunar cultism arise from these reports, and especially from the meticulous recording of burial excavations undertaken after the main effort by Neil J. Ostberg, a gifted amateur. Ostberg continued to check the effects of gravel removal and discovered several more burials, one of them quite spectacular. Labeled Burial 10, the features consisted of three adult males, one of them placed first in the bottom of a large grave, and the two others laid in sequence upon his right side. The first individual was furnished with a raw lump of copper, 2 hammerstones, a copper chisel, and three copper crescents. The assortment represents the raw materials, the tools, and the products of a copper worker. To strengthen this conclusion, it was discovered that the chisel placed near the man's left hand fit perfectly into a set of twenty-nine incisions on the back of a copper crescent placed upon the lower chest.

The second individual had no objects associated with him, but the third had

three of considerable interest. Around his neck and suspended over much of the chest area was a highly complex and elaborate necklace of copper beads. One could infer that he was a person of high status. In the lower thorax, this individual contained two copper projectile points or knives, positioned at angles that would be inconsistent with post-mortem placement. The most economical interpretation of their alignment within the body cavity would be their use as mortal instruments. Burial 10 appears to be a case of retainer burial, the first individual (a prominent figure who manufactured copper objects in life) was furnished with persons to serve him in the hereafter.

A possible precedent for this at the same site had already been discovered by the original excavation team and had been reported. In that case, a man wearing an elaborate copper headdress was first laid into a pit which was then partially filled. Following this, three other persons were buried in sequence. The excavations suggested the chance of retainer burial but no one has yet connected this to the characteristics of Burial 10.

There is an interesting fact about the Reigh Site burials which may relate them to astronomical observation. Most of the burials are oriented toward the south or south-west. In some areas, several burials with similar alignments were in-

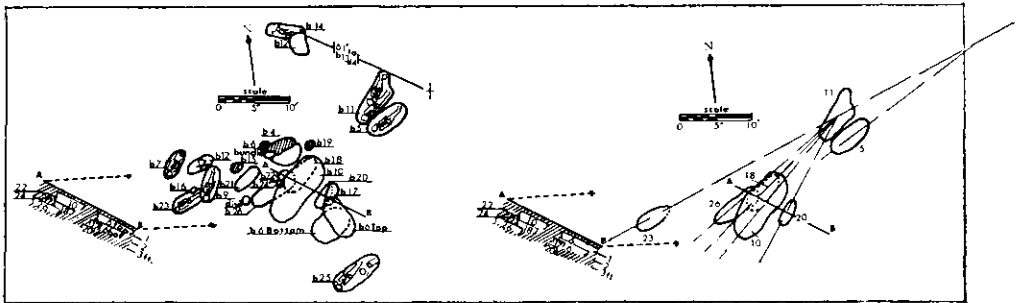


Fig. 80  
A map of burials at the Reigh Site by John Dallman (1957). A provisional reconstruction of alignments («b») which tends to indicate focal positions from which burials were oriented through time.

dependently placed at quite different points in time, but in almost the exact land position. This fact leads one to conjecture that the position was well marked through a long span of time, or that a direction and known distance from some equally well identified reference point was employed. By extending lines from clusters of these burials, it was seen that still other burials were present at the points of convergence. These burials contained objects of interest in a lunar cult hypothesis.

While the alignment was curiously opposite to most (north-east instead of south-west), a child burial at the Oconto Cemetery site contained an object which closely relates that site with the Reigh Site, and which has some characteristics which might identify it as lunar cult equipment. This object is an ulna of the trumpeter swan which has been cut to resemble a simple tubular whistle, but with an additional «non-musical» lateral perforation just below the finger stop. In addition it has three longitudinal rows of short incisions like tally marks. Marshacks' studies on lunar notation (1964, 1972) prompted the counting of these marks, and it was discovered that two were «lunar-compatible» (27 and

Fig. 81

Winged bannerstone of the «butterfly type». This specimen is made from highly polished slate. It was recovered in Indiana and is in the collections of the Heye Foundation.

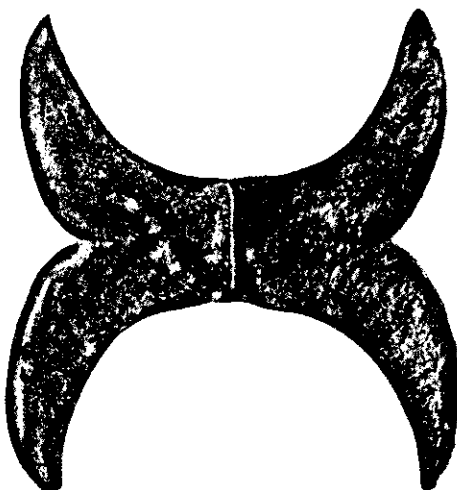
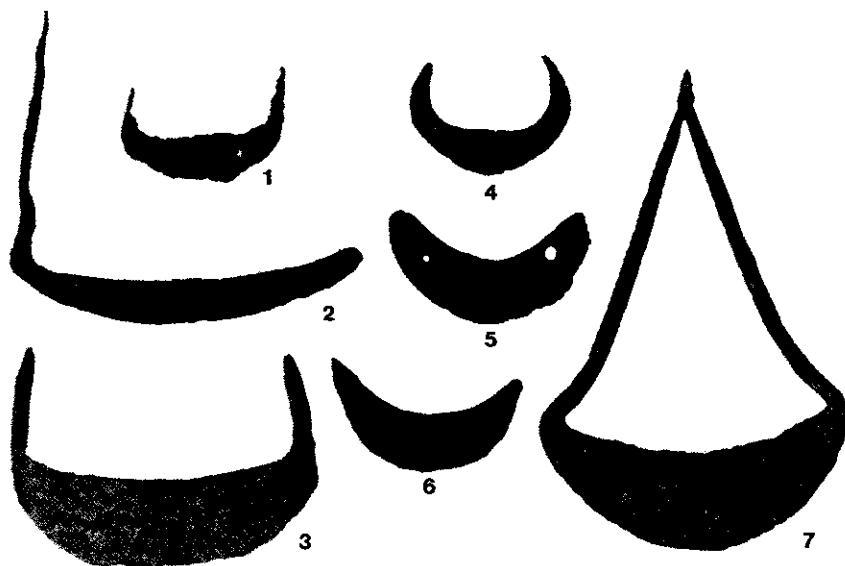


Fig. 82

Copper crescents reported by Mason and Mason (1967). Specimens in the Neville Public Museum in Green Bay, Wisconsin. Mainly from North-Eastern Wisconsin.



30), and the other line was interrupted by the finger stop. The latter still had 23, and those short of a full lunar cycle would just fill the position of the stop. There is no known ethnological analogy for this, but because of the focal position of the burials containing related objects at the Reigh Site, one might speculate that it was in fact, an instrument used in the cemetery's alignments. Unfortunately earthmoving operations at Oconto destroyed central portions of the site before critical alignment data could be secured.

Another object found among the Old Copper caches may reflect a further degree of astronomical sophistication in religious life. A rather strange, double-crescentic shaped device with a hole through it superficially resembles some halberds of Bronze Age Europe. Only two hammered copper examples have been recorder so far and one of these is ambiguously described as «a double-

bitted axe or ceremonial object». There are many polished slate representations of this shape, and these have been traditionally described as the «butterfly type» (Willey, 1966, p. 254, figure 5-5, «c»). There is no question that these objects, with their perfect symmetry and great care in finishing, reflect one of the truly artistic productions of the Boreal Archaic sub-Tradition to which they are normally assigned. Rough dates for this sub-Tradition may be fixed at from 3,000 to 1,000 B.C., contemporary with the florescence of the Old Copper Culture. The term bannerstone itself suggests symbolism in the interpretations of those who have commonly identified the artifact. The stone specimens would not be likely to survive any powerfully directed impact, and the shaft opening along their centers is always quite small. Shafts of less than a half an inch in diameter are not likely to have withstood a strong blow. While the stone objects at their ends were relatively large (up to 8" in diameter), they were thin and delicately executed and would themselves not survive a chopping function. Recorded specimens are largely undamaged. It seems that «bannerstone» remains an apt term. These objects must certainly have functioned as some kind of symbol, held up upon a long narrow shaft. There is reason to believe that some copper crescents were used this way too. At the Riverside Cemetery Site in the City of Menominee, Michigan, cupric oxides had preserved the shaft attached to one of them. A young boy had been furnished with a copper crescent of the III A-2 sub-type with a wooden, sling-shot type crotch attached to it. The excavator, Mr. Robert Hruska, carefully described this crotch (of birch wood) before it crumbled in the removal process (1967, p. 197). The length of the shaft below the crotch could not be determined (the farther from the copper the less preservation), but its longitudinal arrangement between the legs suggests that it was perhaps two feet or more in length — at least not consistent with any historically derived «ulu analogy».

This brings us back to the question of the copper (or other) bannerstones. While

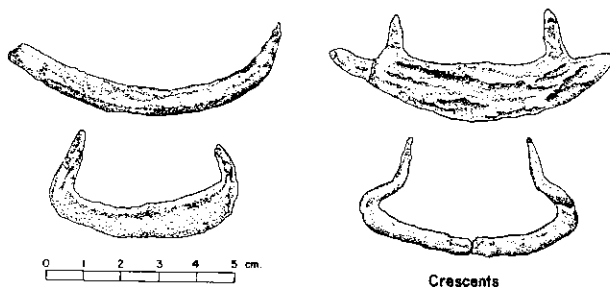


Fig. 83  
*Miniature crescents from the Houska Point Site in north central Minnesota. These specimens were collected from the eroding shoreline of Rainy Lake, a multi-component occupation site.*

world comparisons on the point are not available, a plausible explanation of them might include depiction of the lunar eclipse, widely considered a powerful mythological event among preliterate societies. The exact shape of them, with the inner edge (the terminator) out, perfectly reflects the order of the eclipse (as viewed from either face). This is exactly opposite to the Bronze Age double halberd whose inner edges are in. One copper «bannerstone» does seem to have this halberd shape but upon closer inspection is found to be indented at the centre of the outer edges. This indentation could be intended as an effort to reverse the entire general shape, to conform with the lunar eclipse model. At about 2,300 B.C. a brief interval of trade between the Upper Great Lakes copper centers and the Archaic cultural tradition in New York and Quebec



has been detected (Ritchie 1965, p. 101). Woodworking tools and projectile points of hammered Lake Superior Copper crop up in long established cultures of the Northeast. Copper crescents are quite absent there. Yet, to the north-west of the Old Copper centers, where locally dense concentrations of copper artifacts suggest actual human movement, crescents are fairly numerous. Some sites, like the South Fowl Lake Site on the border between Minnesota and Ontario, have several variations.

Most of our archaeological knowledge of the Old Copper Culture is from cemeteries. Most crescents with solid excavational information came from these cemeteries. Invariably, they are the largest ones, usually around 6 inches long. Over the past decade a number of ordinary occupation sites of Old Copper



Fig. 84  
Reconstruction of hafting technique on a IIIA-2 from a child burial at the Riverside Site, Menominee, Michigan. Drawing by J. Love-Symonds from photo Hruska (1967).



Fig. 85  
Stone and copper artifacts from the Burnt-Rollways Site in northern Wisconsin. This occupation site was excavated by Robert Salzer (1974) who dates it at between 2,000 and 1,000 B.C.

affiliation (all but one of them without cemetery components) have been found and dug. These offer a curious variation on the copper crescents. Only miniatures of the forms found in cemeteries are found among the rejecta of ordinary life. This is most reminiscent of the «household gods», small representations of great altar gods which can be carried as amulets upon the individual, used in daily rituals, or fixed upon a dwelling. There are many world precedents for this kind of behavior and it is exciting to speculate that such was happening among the ancient peoples of the Upper Great Lakes.

The distribution of crescentic copper objects may shed light upon the socio-cultural dynamics behind them. The most important aspect of this distribution is its breadth. With the exception of the north-eastern peripheries which seem clearly to have experienced contact with the copper centres through trade, all

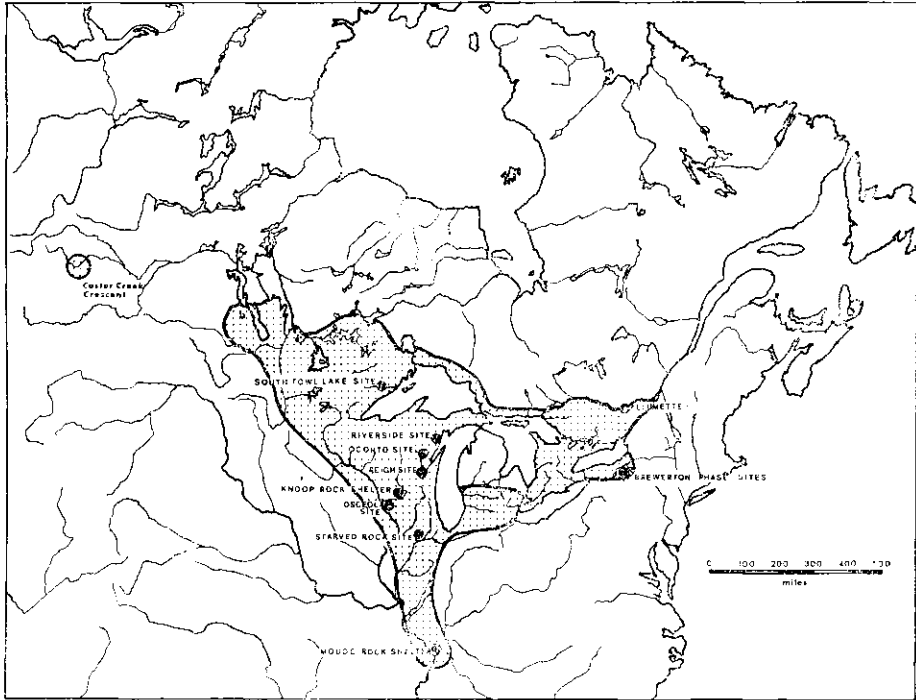


Fig. 86  
 Distribution of copper artifacts attributable to the Old Copper Culture.

other edges of the diffusion sphere include, either exclusively or predominately, the copper crescent. Northeastern Iowa, South Dakota, Manitoba, and even Alberta exhibit the copper crescent as a remote, peripheral attribute. This itself suggests more than ordinary power in the spatial transmission. The *only* Old Copper artifact in Alberta, for example, is an excellent representation of the III A-2 crescent. A nearly identical specimen, with 31 notches-cross its back was found at the distributional edge near Miami, Manitoba. A III A-2 marks the edge at Sioux Falls, South Dakota. Such a distribution would certainly support a cult hypothesis, not differing greatly from the Southern Cult several millennia later which originated farther to the south, and which spread into nearly the same areas. A proselyting dimension, ordinarily associated with the spread of cults, can be used to explain the spread of symbols apart from their more embracing material context.

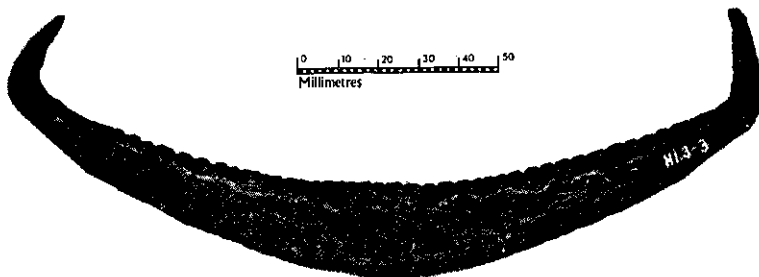
Another characteristic of crescents may be closely related to diffusion in support of their special role as cult symbols. While crescents form the most widely distributed Old Copper artifact, they have an exceedingly limited numerical importance among all commonly accepted Old Copper forms. They would probably not exceed five percent of all recorded Old Copper artifacts. At the same time, crescents offer the greatest degree of typological variety within any given sub-group of the major taxonomies. While other subgroups may comprise four or five types, crescents range as high as fifteen. It is difficult to interpret the meaning of this, especially without good archaeological contexts. Since the shape itself is quite basic, and not apparently amenable to more stylistic va-

riation than other forms, certain factors must be at work promoting the elaborated expression. The variations are not regional, and we cannot fix the greater share of them chronologically. The III A-2 however, has been fixed at  $3,660 \pm 250$  years ago at the Reigh Site. It is associated in cache loci with a subtype of the spud (VA), a large gouge-like woodworking tool, which itself has been fixed as a trade object in New York at  $4,300 \pm 150$  years ago. Assuming that trade would develop *after* the mature evolution of the more basic aspects of a culture, one could speculate that the III A-2 would have arisen somewhat earlier. Archaeologists investigating a copper crescent found near Castor Creek, Alberta hint that it probably was there associated with the Oxbow culture which dates to around 4,800 years ago (Wormington and Forbis, 1965, pp. 113-116).

It would seem reasonable to suggest that the III A-2 crescent subtype was in vogue from 2,500 B.C. to perhaps 1,500 B.C.

#### *Summary and conclusions:*

As the mobile hunters and foragers of late Paleo-Indian times slowly took on a more settled life in the midcontinental river valleys, they discovered that glacially deposited pure copper could be cold-hammered into their long favored projectile points. As efficiency in the emergent copper technology grew, the socketed haft (first among true resource-related techniques) was invented. This technique characterized the stylistically restricted projectile point forms (IA's) which first spread to the west and to the north of the Lake Michigan centers. This spread corresponded with the maximum spread of an oak-savannah environment, probably around 3,000 B.C. Other than crescents, and with the exception of the north-eastern peripheries, these (extremely numerous) forms are the most widely spread. Soon after the invention and spread of the IA's, the cultural centers of Old Copper which were more successfully adapting to a lake-forest environment (and aided now by the easily resharpened copper woodworking tools), evolved a technology-related cult which featured lunar observation. The presence of a crescent symbol in the caches of woodworking tools, projectile points and awls suggests the practical religiosity of traders — not unlike that seen in the Bronze Age hoards of Old World archaeology. The fusion of technology and lunar ritual is best seen in Burial 10 of the Reigh Site wherein the copperworker-shaman himself is laid to rest with all his paraphernalia and two human helpers for the afterlife.



*Fig. 87*  
*A variation of the IIIA-2 sub-type from Miami, Manitoba. Note the incisions along the back, and the zig-zag decoration (which is present on both faces).*

The curious tubular object in the child burial at the Oconto Site, and the historical superposition of graves at the Reigh Site point to a potentially complex system of astronomical observation in the ceremonial life. That the lunar eclipse itself may figure in this is suggested by the double crescents and bannerstones which precisely depict the waxing and waning shape sequence of a normal lunar cycle, and that of the ecliptical passage as well.

How these ancients viewed the moon and shaped mythologies around it cannot be determined by the archaeological information so far available. Persistence of lunar motifs in both rock art and the extant birch bark pictography of the Ojibwa Indians is recorded. A certain amount of lunar symbolism and mythology has been described and explained in the ethnology of Great Lakes Algonkians. But, no rich ceremonialism featuring it has been preserved. Perhaps the most traceable elements in aboriginal history, from the close of Archaic lunar cultism to modern Algonkians, is through a circuitous, historical comparison of petroglyphs and rock paintings.

The largest petroglyph site in the North American continental interior is located in Southwestern Minnesota. This is known as the Jeffers Site and contains some 2,000 separately incised and pecked glyphs or symbols on a flat rock formation in the open prairies. Among the many clusters of glyphs are se-



Fig. 88

*A-B: winged bannerstones of the «butterfly» type. Both variations are expressed in hammered copper, but are rare; C-F, red rock paintings in northwestern Ontario. An identical form was incised into hard crustose lichen in the same region. This latter specimen suggests continuity of the form into fairly recent times.*

veral which depict projectile points with long spindly tangs, forms not possible (or practical) in stone, but well suited to copper. These are associated in units of glyphs with figures of the «at! at!» — or throwing stick, standard equipment of the Archaic Tradition to which Old Copper belongs, and to which these glyph units are also assigned (Roefer et al., 1973). Crescents appear on this site as well. There is reason to believe that the Jeffers site may in some way relate to another major petroglyph site near Peterborough, Ontario. This Peterborough Petroglyph Site, while much smaller, shares forms with Jeffers, and exhibits a set of shapes which may represent other variations of other copper projectile point types, including one which is probably socketed. In addition, there are a number of crescent shapes which have been deemed (in most cases correctly) «boats» by Drs. Joan and Romas Vastokas, the principle investigators (1973). It is quite conceivable that the simpler versions of these «boats», especially a set of 4, each with «two men» in them may actually represent copper crescentic symbols. The «two-man» forms, with their crescent, produce an exact representation of one formal old copper crescent sub-type (IIID).

From the Peterborough Site, it is possible to project a fair number of specific forms to the rock painting sites of the Canadian Shield, especially in the area

of Northwestern Ontario and Eastern Manitoba. A few of these sites show clear connections to the surviving bark pictography of the Ojibwa, and at least two instances of Ojibwa authorship of rock paintings have been recorded. Of concern to us here is the fact that crescent shapes (always interpreted as «canoes» by rock art authorities) are common in the Shield rock paintings. Their lunar portrayal in the decoration of birchbark canoes has been established in a monograph on aboriginal canoe manufacturing by Adney and Chapelle (1964). Other lunar depictions on birchbark are reported by Hoffman (1891) and Densmore (1929). There are variations of the crescent shape in rock paintings which may confirm our various conclusions on lunar symbolism in copper. The most interesting of these is the apparent depiction in red pigment of the double crescent shape with a shaft-through the center. These are identical to examples inferred to represent the eclipse. One such painting occurs on Picture Rock Island, Whitefish Bay, Lake of the Woods, Ontario (Dewdney and Kidd, 1967, p. 56). It is associated in a complex face with solidly painted, naturalistic animals which are thought by art historians to be the earliest in a chronology of North American rock art typology. Two more perfect examples are located near the mouth of the Nipigon River in Ontario (1967, p. 77). Others are located on the Donnely River (p. 113), and on Cliff Lake (p. 141). On Blindfold Lake there is a crescentic pictograph which could represent the slingshot hafting variation discussed earlier for a copper crescent at the Reigh Site. However, the Blindfold Lake specimen has a third supporting line in the center. Since it is oriented with the crescent down, it resembles a ship. Many crescents have probably been misinterpreted as boats or canoes, the most obvious of these being the «upside down» ones. Such a specimen is represented in Selwyn Dewdney's site 105 on Whitefish Bay in Lake of the Woods. Here the inverted crescent is arranged below a series of handprints. Fantastic animals on this same face are compared by Dewdney, a leading authority on aboriginal Shield rock art, to astonishingly similar forms on Lake Baikal in Siberia.

A great deal remains to be learned about the lunar symbolism which had its origins among the lake-forest peoples of archaic times. It now seems plausible that living populations of the very same region have retained until recently some remnants of this symbolism; no longer of similar function, but somehow steeped in the power of ancient tradition.

*Riassunto:* L'Autore presenta una nuova interpretazione di numerosi oggetti a forma di mezzaluna ritrovati nel contesto dell'antica cultura del rame nella zona dei Grandi Laghi.

Egli propone che siano connessi a una nuova religione lunare che, sorta nel Wisconsin, si estese attraverso il Nord-Est dell'America Settentrionale. Il culto era strettamente connesso con la tecnologia della lavorazione del rame e persistette per oltre 2.000 anni a partire dalle più antiche evidenze che risalgono attorno al 2.500 A.C. In alcuni casi sporadici, tale culto avrebbe potuto persistere anche dopo l'inizio della nostra era e ciò sembra evidenziato da alcune figurazioni lunari nell'arte rupestre.

*Résumé:* Une nouvelle interprétation des nombreux objets en demi-lune provenant de la civilisation de l'Ancien Age du Cuivre, nous permet d'avancer l'hypothèse d'un développement religieux très marqué qui se serait vérifié dans la région des Grands Lacs Supérieurs, lieu d'origine des pièces mêmes. Des observations de la lune seraient à la base de la création de ces objets qui, depuis le Wisconsin, se seraient répandus dans les régions nord-orientales de l'Amérique du Nord. Ce culte se rattache étroitement à la technologie même du cuivre. Son début semble

remonter aux environs du milieu du III millénaire av. J.-C. et il semble avoir largement disparu avant le début de notre ère. Dans quelques cas sporadiques il aurait pu se perpétuer dans les époques préhistoriques tardives, transmis par des peuplades de l'intérieur dans leurs représentations rupestres.

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