THE SUN FROM THE SEA – AMBER IN THE MESOLITHIC AND NEOLITHIC OF SOUTHERN SCANDINAVIA

Lars Larsson
Lund University (Sweden)

Bears and burials

Amber was already used during the early part of the Mesolithic in southern Scandinavia (Mathiassen 1966). The sites affiliated to the Maglemose Culture are all inland sites as the coastal zone was later submerged. A site such as Ageröd I from central Scania, the southernmost part of Sweden, held a small piece of amber (Althin 1950: 254). Other Maglemosian sites with amber have the same location several kilometres from the coastline, not only in southern Scandinavia but in Great Britain as well (Clark 1954: Fig. 74). Most of the amber found has been perforated, some may have been partly worked or polished and some is decorated as well (Mathiassen 1966; Larsson 1984; Andersen 1998) (Fig. 2). Judging by excavation finds, amber was used throughout the Mesolithic, i.e. the Kongemose as well as the Ertebölle Culture.

Amber is the sole material used for forming three-dimensional zoomorphic reproductions during the Mesolithic. From Denmark a collection of eight animals carved in amber has been dated to the Mesolithic (Mathiassen 1966; Vang Petersen 1998). Four are shaped like bears, one like an elk and one like a swimming bird, while the species of two finds cannot be identified. They are all single finds, but the dating of the amber figures to the Mesolithic is clear from a find from a bog in Jutland (Fig. 3). A bear has been given decorations based on typical Mesolithic motifs (Larsson 2000b). One of the bears has clear traces
showing that a string was wrapped around the neck, and it might have been worn as a pendant (Vang Petersen 1988: Fig. 2).

A perforated piece of amber with decoration in rough drilling technique has been found in Scania, southernmost Scania, and the shape as well as the decoration make it plausible that it should be dated to the Mesolithic (Péret 1963). Amber is even more rare in graves from the Mesolithic. It has been found at Skatholm I, one of three late Mesolithic cemeteries in southernmost Sweden (Larsson 1984, 2000a). Pieces and beads of amber were found in two graves (Larsson 1988b: 126).

Grave 41 is a double grave containing an adult and a child. It had marginally encroached on an older pit - Grave 40. The adult, a male, was placed in a right-sided crouched position. The arms were angled so that they lay in front of the torso. An approximately four-year-old child lay in front of the male adult in such a way that the interred’s left under-arm and hand encompass the head of the child.

Red ochre was forthcoming in relation to the child. No grave goods appear to have been accorded to the man. On the other hand, the child was richly endowed. Two perforated eye-teeth from brown bear, as well as four pieces of amber lay beside the ribcage of the child. An intact bone point and a flake of flint were placed at the thigh.

The four amber pieces had a length of between 3.2 cm and 6.0 cm and at least one shows traces of working (Fig. 4). They were heavily weathered. Distinct perforation could only be documented on two pieces and the perforated ends were oriented towards the head of the interred. The same applied to the tooth beads, which lay above the amber beads.

All of the amber pieces display a more or less weathered surface. Therefore it is not possible to establish whether or not the original surface featured ornamentation in the form of incisions. Distinct evidence of perforation, affected by the weathering, occurs on a few pieces. This means that in some cases an at least 0.5 cm thick outer surface has withered away. Distinct traces of working occur on only one piece. In this case the intention appears to have been to shape the piece to a more symmetrical form. If, in the case of the other pieces, an attempt had been made to achieve a particular form, such as the representation of a zoomorphic figure, it ought to have been possible to observe this, even in spite of the fragmentary condition of the pieces.

The second grave with amber was discovered as an irregular dark colouring directly below the topsoil layer. It soon became clear that it contained two separate graves. Grave 46 is the shallower and, in addition, the older grave. The later digging for Grave 47 had damaged its central section.

Of the interred only the cranium, the upper part of the ribcage and the feet remained in their primary positions. The position of the cranium and the limited distance between it and the feet indicates that the interred was placed in the left-sided crouched position.

Colouring by red ochre was registered within a limited area immediately in front of and behind the cranium. The red ochre thereby also covered the primarily positioned collection of teeth and amber pieces. As to grave goods in their primary positions, a collection of objects were found behind the neck and directly beside the fragmentary part of the left upper-arm. The collection can be divided into two groups in terms of both position and material (Fig. 5). Red deer teeth were found to lie in a row, which could further be subdivided into three separate groups with an entire set of fore-teeth. One set is combined with a part of the lower jaw. For the rest here was, however, no trace of perforation, for which reason it is very probable that the gingival was allowed to remain and that this substance held the teeth together before it eventually decayed.

Altogether four pieces of amber lay in a row immediately below the teeth. Their surfaces were heavily weathered. Nonetheless, distinct traces of perforation could be evidenced on the two pieces nearest the cra-
nium (Fig. 4). As to the other two, any traces of perforation ought to have been observable in spite of the heavy weathering, but there were none.

No other objects interpretable as grave goods were encountered in an intact position. On the other hand, an abundance of animal teeth as well as pieces of amber were found in the filling of the secondary grave. This strongly suggests that the same combination of teeth and amber, as described above, was forthcoming within that section of the body which was destroyed in the course of the later grave digging. Teeth from red deer, aurochs and grey seal were registered. Added to this is a large number of enameled fragments which are so badly preserved that they do not allow of any certain evaluation of the actual total number of teeth. As to amber, all the pieces had a heavily weathered surface and no trace of perforation.

Finds in the filling of the younger grave are some human bones, and teeth belonging to a child were encountered in the foot-end of the filling. This would mean that Grave 46 ought rightly to be described as a double grave with a child placed in the central and subsequently disturbed section.

In conclusion, it can be stated that Grave 46 contained an adult person in a crouched position on the left side and furnished with ornaments in the form of a combination of animal teeth and amber pieces at the neck and on at least one further part of the body. It may be postulated that the grave contained a child and possibly a young dog.

On one occasion a piece of amber was found not distinctly as a grave gift but in connection with a grave in such a way that it is most likely that it was deposited intentionally. A piece, 4.3 cm long and oval-shaped without any trace of working, was found in Grave 12, just a couple of centimetres above the thigh of the interred female. This position of the find is rather common in the graves of Skægholm. One finds the ordinary grave gift at the level of the buried person and then another group of finds, such as perforated beads, bones from feeding and dogs, just a few centimetres above the skeleton. These items were probably involved in the ritual activities during the burial and initial filling in of the grave.

Interestingly enough, the two graves from Skægholm holding amber ornaments seem to be double graves with an adult and a child. It might also be of special importance that the amber pieces in Grave 41 were combined with eye-teeth of brown bear (Fig. 4), as brown bear is the most frequent animal carved in amber. The amber figurines as well as perforated eye-teeth in Grave 41 indicated that the bear had a special position in the world-view of Mesolithic society.

The southern coast of Scania adjacent to the location of the cemeteries at Skægholm is not known to be an area where plenty of amber is found. One might occasionally find small pieces but not of the size found as decoration in graves. The situation with other conditions as regards currencies and coastline might have given much better conditions for gathering amber. Today the south-eastern and especially the south-western coasts are still well-known areas for producing a large amounts of amber, including pieces of the size known from the Mesolithic and the Neolithic. It is highly probable that most of prehistoric amber originates from these parts of the coast.

Two Danish graves from the Mesolithic contain amber. At Nederet in eastern Jutland several graves were found in connection with a shell midden from the Late Mesolithic. The grave goods in a shallow grave for a female consisted of five pendants of rooth from red deer and a piece of amber (Kantregard Nielsen 1990). At Gangehuusvej in Vejlebæk on the eastern coast of Zealand several graves were found on a spur of sand which delimited the strait of Oresund from a former lagoon (Brinch Petersen 1990). In a grave for several cremations individuals a piece of unworn amber was found together with several rooth pendants.

During the Mesolithic amber was used in a naturalistic way. Pieces of amber found on the shore were given minor treatment by small changes of the surface and then bound into an arrangement or at most they were perforated. When giving a major change of form the piece of amber was altered to represent a well-known element of the fauna which had a special role in cosmology, such as the brown bear.

Shining like copper

In continental Europe beads shaped of different kinds of stone as well as of copper were the standard ornamentation at about 4000 BC (Whittle 1996). Some of these were locally available, others were of exotic origin.

When these continental traditions were translated to a South Scandinavian social environment, amber turned out to be the most feasible material. It was well known earlier as a material for ornaments. It was only available in quantities within limited areas, thereby giving it a certain value. It was easy to shape and the shining surface had a resemblance to copper. The latter might have been the most important factor in the choice of amber as a material for decoration.

In the hoard find of Årupsted, Jutland, copper and amber as ornaments were found together. The combination of copper artefacts and amber beads in some graves such as Sejlflod, the earthen long barrows at Barkær and the dolmen at Handest (Fig. 6) make it reasonable to assume that decoration of both materials could have been combined in the costume of the same person (Klassen 2000: 354 ff.). Decorated copper discs were copied in amber as well as copper axes, which appear in miniature size (Klassen 2000: 258 ff.) (Fig. 7).

During the Neolithic the total transformation into a stylistic shape not resembling but rather contrasting to nature seems to be one of the most important aims. The eagerness to have amber pieces shaped into standardized forms and to present them in large numbers is of importance. The amber ornaments thereby signalled quite a different concept of identities in the Mesolithic than in the Neolithic.
An example of the change of material for ornaments is two graves, one from the Late Mesolithic and one from the Early Neolithic found at Dragsholm in northwestern Zealand (Brinch Petersen 1974). One grave held two women dated to the latest part of the Mesolithic with ornaments made of perforated animal teeth. In a grave a few metres away, a male from the earliest Neolithic was interred. The ornament in his grave was made of an amber pendant, although the shape has a certain similarity to tooth pendants (Fig. 8).

At the same time as amber beads become of major importance in the early Funnel Beaker Culture, copper ornaments are introduced as personal belongings in Danish graves (Klassen 2000: 75 ff.). Although several finds of copper artefacts from the Early Neolithic have been made in southern Sweden (Magnusson Staal 1996), no personal ornaments are known from graves. On the other hand, the number of Early Neolithic graves from the same region is very small (Larsson 2001).

In the detailed analysis of the amber hoard of the Funnel Beaker Culture, Ebbesen presented altogether 50 hoards from Denmark with almost 28,000 beads (1995). Ebbesen divides the finds into twenty different head types (Fig. 9). Of these the combination analysis divides the types into two groups: e, f, k, o and p as one; a, b, l, and q1-3 as another (Ebbesen 1995a: 47). Of the hoard, 80% belong to the first group. The rest are dated to the early part of the Middle Neolithic (MN I–MN II) (Ebbesen 1995a: 52).

In contrast to the Danish finds, the number of amber hoards from the same period in southern Sweden is extremely small – just two hoards. One of these is found in Västergötland, the northern-western part of southern Sweden. Judging by the double-axe shaped amber beads (type a), this hoard should be contemporary with the later Danish hoards. The other one was found in southwestern Scania and should be dated to the same period (Cederström 1955: 211).

It is remarkable that the number of Swedish hoards is so small in relation to the Danish finds, as the number of hoards of, for example, flint axes from the same period does not show any such major discrepancy (Nielsen 1985; Karsan 1994).

The number of graves in earthen long barrows as well as those without any special cover is large in Denmark (Ebbesen 1994; Rudebeck 2001). The former number about seventy-five. In several of these amber ornaments have been found, the number of beads from a single find amounting to more than 300. Although the number of graves and earthen long barrows is much smaller in southern Sweden, amber beads have been found in an earthen long barrow at Jättregrav, southernmost Scania. Three amber beads were found in the middle part of the barrow. A standing stone might mark the location of a destroyed small stone cist. Two of the beads are hour-glass shaped (type p) (Fig. 10), while the third has a rectangular shape. The hour-glass shaped beads are rather common in Early Neolithic graves, and judging by their location they were probably used as belt holders by males (Ebbesen 1994).

Amber and megalithic tombs

Amber beads shaped like a double-axe (type a), or sometimes more like a club (type b and l), have been found in several Scanian passage graves (Bagge & Kaelas 1950; Abb. 24, Abb. 54; Strömberg 1971: Abb. 57, Abb. 109; Blomqvist 1989a: Appendix VIII). In most tombs the number of amber beads is less than one hundred, but in two passage graves on the Scanian west coast – Gansofoa and Gillhög – the number of beads exceeds 350 (Taffinder 1997: Fig. 1). People buried in these tombs seem to have been adorned with such beads of varying size.

An interesting difference appears when comparisons are made between the different head types in two passage graves from the same parish, Kivisto, in northwestern Scania, one with a small number of
beads (Fig. 12: A) and another with the second largest number in Sweden (Fig. 12: B). The divergence might be due to chronological reasons, but the most plausible explanation is an intentional selection of beads.

If these differences are related to the variance of bead types in Danish hoards from the Middle Neolithic (Ibbesen 1995a: 50), yet another combination appears (Fig. 12: C). The cylindrical bead type is the most common type, the pendants of different kinds the second largest type. The double-axe type and the club, the latter the best represented in most megalithic tombs, are fewer. This could be interpreted as showing that the beads related to forms of symbolic value, such as double-edged axes are more frequent in the tombs. Tombs as well as hoards represent the ritual world but they seem to present different aspects. It could mean that the ornaments in hoards have a more personal application while the symbolic meaning of the ornaments in tombs was of more importance to the society as a whole, the individual versus the collective.

Find circumstances from certain megalithic tombs indicate that amber beads are sometimes connected to ritual activities and not direct remains of personal belongings. In a dolmen at Hindby, south-western Scania, eleven amber pieces were found in the flint packing around the chamber (Burenhult 1973: 42). Fragments from at least three amber beads were found in one of several small hoards including cremated human bones and fragmentary tools, several with traces of fire from the stone packing outside the Trolleholm dolmen in southern Scania (Strömberg 1960: 125). The flint tools date the hoards to the late part of the Middle Neolithic. Fragments of the same tool were found in different hoards, which indicates that these should be regarded as related to ritual of the sacrificial place rather than to a mortuary practice connected to individuals (Strömberg 1960: 203 ff.).

During the early Middle Neolithic, south Swedish finds of the typical double-ax shaped beads seem to have been as common as in the Trolleholm region. A remarkable find from a partly destroyed megalithic tomb in north-western Scania shows that beads of this type were also manufactured of wood (Stjermerqvist 1949: Fig. 11).

If the distribution of Danish hoards is viewed in relation to the source of amber, one finds that most of the graves (Fig. 13: 2) and hoards of the Early Neolithic, as well as the hoards of the Middle Neolithic, are found in areas where amber is easily available (Shennan 1982) which is determined by amber from the Baltic area. However, the same connection is not found between the amber resources and amber finds in the megalithic tombs (Shennan 1982: Fig. 4:4). The number of megalithic tombs is larger in eastern Denmark than in the western part. If the density of tombs relates to competition in society, amber as exotics could be included as a means of competition. This is indicated by the presence of amber beads in megalithic tombs such as Rössberga in the Falskoping district situated in western Sweden, where the largest number of megalithic tombs of Sweden is to be found (Taffinder 1997: Fig. 2).

The importance of amber in graves as well as hoards during the late Early Neolithic and early Middle Neolithic is contemporary with phenomena which seem to mark competition in society, such as the erection of thousands of megalithic tombs and the construction of causewayed enclosures (Andersen 1997). There is also a remarkable relationship between the use of amber and the introduction as well as the disappearance of copper artefacts, perhaps including subsequent Scandinavian production, which disappear in Middle Neolithic II (Klassen 2006: Abb. 111).

Amber during a late part of the Neolithic

Amber as raw material for ornaments seems to be rare during the later part of the Funnel Beaker Culture (Middle Neolithic III–V). No Danish hoard with amber is dated to that period (Ibbesen 1995a). During the subsequent Single Grave Culture, belonging to the Corded Ware Complex, the number of amber hoards is much smaller than during the early part of the Neolithic – only one single find (Ibbesen 1995a). This is equal to the number of amber hoards from Sweden (Karsten 1994: 75).

However, amber as ornaments is not unusual in the graves of the Single Grave Culture (Glob 1945: 150 ff.) as well as in the Swedish graves from the Battle Axe Culture (Malmer 1962: 270 ff.). Sometimes they are found in great numbers and usually in connection with graves including female burials, although some male graves also include amber.

The number of graves from the Battle Axe Culture of Sweden with amber decorations is much smaller than in the contemporary graves from the Single Grave Culture in western Denmark, but the same types are represented (Malmer 1992:270 ff.; Strömberg 1975: Abb. 8). During the late part of the Middle Neolithic the most common types are circular or elongated beads, rings and large circular discs which probably resemble the sun. Most of the amber decorations belong to the late part of the Battle Axe Culture. Amber beads have been found in settlements as well (Larsson 1992: 110).

In Denmark copper ornaments in graves are known since the Early Neolithic but in Sweden the first examples appear during the Battle Axe Culture, corresponding to a period with an increased use of amber (Malmer 1962: 278 ff.; Strömberg 1975: 13 ff.).

Of special interest to note is a find from a grave from Beddinge in southernmost Sweden with an amber bead shaped like a tooth pendant (Malmer 1962: Abb. 50: 4). In this context it should be mentioned that pendent of bone but shaped like tooth pendants have been found in graves from the Battle Axe Culture (Malmer 1962: 295). This might be another example of the transformation of natural items, animal teeth, into other material.

In the Pitted Ware Culture, partly contemporaneous with the Battle Axe Culture, true tooth pendants are numerous but amber ornaments rare (Stenberger et al. 1943; Janson 1974: 80 ff.). With one exception, the amber beads are irregular in shape. Just one bead, formed like a double-edged axe or club, has great similarities to beads from the Funnel Beaker Culture mentioned before. Similar beads but made of clay have been found in settlements dated to the Pitted Ware Culture (Bagge & Kjellmark 1939: pl. 13).

A single find from a bog at Alvared in western Sweden might indicate relations between Scandanavia and the "Culturaltic" cultural complex. The find is a human head carved in amber and equipped with a jaw on the back (Almgren 1997: 117 ff.) (Fig. 13). At its very first presentation it was compared to certain finds of anthropomorphic representations in the Pitted Ware Culture as well as in the Baltic area (Almgren 1907). These similarities have been made even more pronounced by later finds and research (Wyssomiska 1984; Loze 2000).

The interest in amber as raw material for ornaments seems to decrease during the latest part of the Scandinavian Stone Age. In the flat-earth cemetery at Löderup, southern Scania, all three graves from the Battle Axe Culture included amber ornaments, but just three of 35 graves from the Late Neolithic/the earliest part of the Bronze Age include amber ornaments (Strömberg 1975: 12 ff., Abb. 55). In another cemetery, Ingelstorp, in the same region, three out of seven graves from the Battle Axe Culture include amber ornaments (Strömberg 1982: Abb. 42) while the same relation is one grave out of 27 belonging to Late Neolithic/earliest Bronze Age (Strömberg 1982: Abb. 71). The same tendency is ob-

Fig. 13 Human head of amber from Alvared, western Sweden, probably dated to the Middle Neolithic. From Almgren 1907: 1-4.
Amber as material for personal decoration has a long tradition in southern Scandinavia. Already in the Late Neolithic, amber had an importance as a medium to form important representations of the world-view, as exemplified by the bear. But most of the amber used was unchanged or just perforated in the same way as animal teeth were handled. During the Neolithic a close connection between the importance of copper and amber is proved. When the exotic metal had its main attention during the Early Neolithic and early Middle Neolithic, the use of amber was of special importance. Partly the same relation existed during the later part of the Middle Neolithic within the Corded Ware cultural context. Although an increased import of metal and metal-casting technique is obvious during the Late Neolithic (Vindelöv 1990), the interest in amber for ornaments decreases and is replaced by other materials. During the Bronze Age amber is totally replaced by bronze as the most important material for ornaments. With a surplus of metal there does not seem to be an need to use amber, which for a long time had acted as a metal substitute.

References


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