Sa Cova d'es Carritx: a new prehistoric cult cave on Menorca Ruth D. Whitehouse

In 1995 a previously unknown cave was discovered on the island of Menorca in the western Mediterranean. It was found to contain human skeletal remains and an extraordinary collection of artefacts made of wood and horn, some of which contained human hair. The cave appears to have been used during the first millennium BC for ritual purposes.

n February 1995 a previously unknown prehistoric burial and cult cave was discovered on the island of Menorca in the western Mediterranean. It was immediately clear that the site was of outstanding importance: not only were there abundant undisturbed human remains in the front chamber, but in a side chamber deep in the cave a sealed pit was discovered that contained a remarkable collection of objects of wood and other organic materials. The cave was in use during the local Bronze and Iron Age Talayotic culture (conventionally dated c. 1400-123BC) and it seems to have been used for both burial and other ritual purposes. There is some evidence for use also in the preceding pre-Talayotic period. The radiocarbon dates available so far (see below) suggest use of the cave c. 1000-500 BC.

A research programme was initiated immediately after the cave was discovered and has been in progress ever since. It is a collaborative project of the Universitat Autònoma de Barcelona, the Consell Insular de Menorca, the University of Reading and the Institute of Archaeology, UCL. An initial visit to excavate the pit and recover the organic objects was undertaken in

March 1995 and this was followed up by conservation of the objects in May. In the summer of 1995 a full-scale excavation was organized, which ran for two months from the middle of June. Post-excavation work continued throughout 1996 and 1997 and is still continuing. A second short season of excavation took place at Easter 1997 and a final season is planned for 1999.

The cave

The Cova d'es Carritx is located in the southwest of Menorca in the territory of Ciutadella (Fig. 1). It is a natural cave in Miocene limestone, in the western side of the Barranca of Algendar, the deepest of the gorges that dissect the landscape of southern Menorca. The gorge is c. 90m deep and the cave is located some 25m from the top. It is approached by a steep path from the top of the gorge and must always have been fairly difficult to reach. At the time of its discovery, the entrance consisted of a very small hole, just large enough for a person to squeeze through, giving access directly to the first chamber, which was full of human bones resting on the floor of the cave and covered only by fine dust. The cave extends horizontally

into the hillside for c. 170 m and consists of a series of narrow low passages and larger chambers, with stalagmitic formations. About half way along, a single side chamber, which contained the pit deposit, opens out on the eastern side at a slightly higher level (Fig. 2). There are signs of human use of the cave at various points along its entire length.

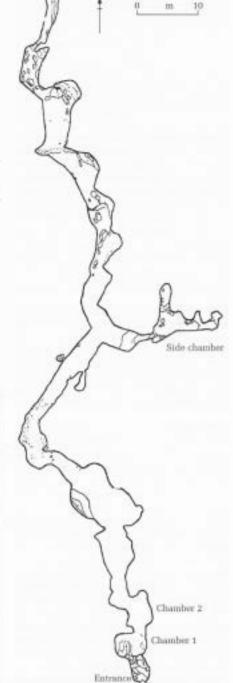


Figure 2 Provisional plan of Cova A.



Figure 1 The Balearic Islands, showing the location of Cova d'es Carritx on Menorca.

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The burial deposits

Excavation has been concentrated in three main areas - in chamber 1 of the main cave (Cova A), in a small adjacent cave (Cova B), and in the area outside the cave - and there have also been some preliminary investigations of other parts of the main cave. Excavation in the area in front of the cave demonstrated that there had been a substantial rockfall some time in the middle of the first millennium BC. This rockfall largely blocked the entrance to the cave and brought its use to an end. Subsequent deposition, mainly natural, completed the blocking of the entrance, creating a virtual seal and protecting the contents from disturbance for some 25 centuries.

Excavation of the deposits in the entrance and on the ramp leading down to chamber 1 revealed that the cave had originally been closed by a wall built of massive "cyclopean" stone, with a central entrance gap, perhaps dating to a late stage in the cave's use. Within the cave, most effort has been devoted to excavation of chamber 1, which consisted of a lower zone where the floor of the cave had collapsed (partly before the human use of the cave) and a main, upper zone. The floor of the upperpart was densely covered with human bones, mostly in a disarticulated state, and in some places showing signs of grouping of particular bone types. Interspersed with the bones were pieces of wood, some probably parts of biers or other structures, and some artefacts of pottery, bone and bronze. The artefacts are of known Talayotic types, with parallels in burial contexts elsewhere in Menorca, Other deposits of bone were found in the lower area, where in particular many skulls had been placed. Recording of the bones was carried out with a digital camera, and computer printouts of these very accurate images were used in place of plans. In some places in the chamber six layers of bones were recorded in this way.

Adjacent to the main cave entrance was another cave, named Cova B. This differed from the main cave in that it consisted of a single small chamber, which had never been blocked and sealed. On excavation, this cave too proved to have been used for burial during the Talayotic period and to have been closed with a cyclopean wall. The skeletal material in Cova B differs from that in chamber 1 of Cova A in two ways: there are more articulated portions of skeletons (although not whole bodies) in Cova B and the proportion of adults seems to be higher.

Analysis of the human skeletal remains is being carried out by Cristina Rihuaete of the Universitat Autònoma de Barcelona and is still under way, but the preliminary results on the material from Cova A suggest that it was the burial place for an entire community: more than 120 individuals were buried in the chamber, including women,

men and children of all ages from three months upwards. Because undisturbed burial deposits are extremely rare in Menorca, the material from Carritx will provide a particularly valuable starting point for the study of prehistoric populations on the island.

The deposit in the side chamber

The first area of the cave to be explored was the side chamber containing the pit with the deposit of organic objects that were lifted in March and restored in May 1995. The pit had been excavated in the natural clay of the cave, and closed with a sheet of clay, creating an apparently hermetic seal and allowing the maintenance of a stable microclimate within the deposit, which was presumably responsible for the remarkable state of preservation of the objects. They seem to have been crammed into the pit without any recognizable order and there is a strong impression that they represent a single depositional event.

The objects include two pottery vessels and two copper-alloy artefacts, but the majority are of wood and a few are of horn. The pottery and copper-alloy artefacts are of well known Talayotic types, but the other artefacts are unique.

The copper-alloy artefacts are a large tanged arrowhead and a pectoral ornament, both of which find parallels in other Talayotic culture sites, usually in burial contexts. The wooden objects include three wooden vessels, three spatulae and a comb.

The most remarkable objects are a series of containers, mostly tubular in shape, some made of wood and some of horn (identified at the Institute of Archaeology as probably from domesticated cattle). They are provided with separate bases and lids of wood, or in one case bone, and they contained human hair (Fig. 3). There are four tubes of horn, all of which had wooden bases, three had lids of wood and one had a bone lid. The wooden containers may also have been four in number, one three-lobed in form (Fig. 4), one double (because a matching double lid and base occur, although no fragments of the container itself have been clearly identified) and two single containers, one circular and one oval in shape.

The wooden bases and lids are made in standardized ways. The lids have projecting lugs, perforated vertically, which were probably used to attach the lids to the tubes. If cord was used for this purpose, it could perhaps have been used also to suspend the containers. Several of the lids are decorated with incised dot and circle designs on their upper surfaces. The lower sides of the lids are rebated to allow them to fit snugly into the top of the containers (Fig. 4). The bases were clearly attached in a different way: they lack the projecting lugs, but instead have a series of horizontal perforations around their circumference. Still

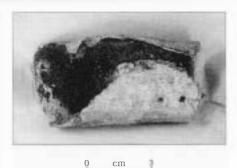


Figure 3 One of the horn tubes containing human hair, photographed after cleaning but before conservation at the Institute of Archaeology.

attached to the base of one of the horn tubes examined at the Institute of Archaeology were some small wooden pins that seem to have served this purpose. Inside this same tube a small bronze rod was found. It bears some traces of incised decoration and may have been part of a hair pin. The one lid that is not of wood is also of interest. It is made from an animal vertebra, and the projecting lugs are replaced by two holes made vertically through the lid. Interestingly, whereas the wooden objects are unique, the bone lid does have parallels: similar objects have been found in Talayotic burial contexts elsewhere in the island, and indeed one was found during the excavation in chamber 1 of Cova d'es Carritx. These bone objects have always been interpreted as buttons or pendants, but we must now consider the possibility that they were all lids of containers.

The deposit also contained many other fragmentary wooden objects, some of which seem to be handles, whereas others may be pieces of the wooden tubes, bowls and spatulae described above. Preliminary identification of the wood has been undertaken and three genera have been identified: *Olea* (olive), *Erica* (heather) and *Buxus* (box). All

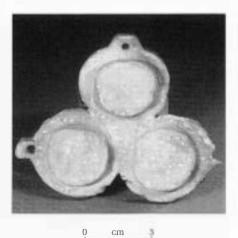


Figure 4 Underside of the wooden lid of the three-lobed container.

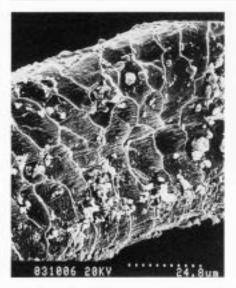


Figure 5 Scanning electron micrograph of hair, probably from a goat, found in a pottery vessel in the deposit in the side chamber.

three are widely distributed in the Mediterranean, although *Buxus* does not occur on Menorca today.

The deposits found within the tubes and the pots are now undergoing analysis at the Institute of Archaeology and elsewhere. Although the tubes seem to contain human hair only, one of the pottery vessels contained what seems to be animal hair, identified by Dr Ken Thomas of the Institute of Archaeology as probably that of a goat (Fig. 5).

A sacred cave?

Any practical utilitarian explanation of the deposit seems to be excluded by the location of the pit: in a side chamber deep in the cave, which can only be reached with difficulty by passing through a low, narrow and wet passage and an equally tortuous entrance to the chamber itself. It is also difficult to conceive of a utilitarian explanation for most of the objects themselves, especially for the containers of human hair and the pot containing what may be goat hair. It is clear that we are dealing with a ritual deposit of some kind. In this context, we may recall the abundant ethnographic evidence for rituals connected with hair in rites of passage in many different societies: hairmay be cut, shaved, putup, let down, or decorated in any number of ways in the course of these rites. The objects from the Carritx deposit may have been used in this way, in funerary rituals and perhaps also other rites of passage, such as initiation rites, which could have taken place in the cave. There are parallels between the objects in the deposit and those found with the burials in chamber 1, although there are no indications that the side chamber itself was used for burials. The most economical explanation might be that the artefacts in

the pit represent objects used in connection with funerary rites, either stored in the pit for re-use at a later stage or, more probably, disposed of in final ritual fashion after use.

In this connection we may consider the two radiocarbon dates obtained so far. One comes from part of the triple wooden container, made of olive wood (Olea europea). This date is 2810 ± 65 bp, which gives a calibrated range (at one standard deviation) of 1016-852 cal BC. The second date, on hair from inside the same tube, is much later: 2445 ± 50 bp, giving a calibrated range (at one standard deviation) of 760-406 cal BC. This discrepancy may be explained in various ways, and new dates will make the situation clearer. However, if for the present we take the dates at face value, we should accept the later date, on the hair, as providing a terminus post quem for the sealing of the pit. The earlier date for the tube itself may reflect either the use of old wood (and olive is a long-lived species) or the use of an old container, or both. In fact the typology of the pottery vessels also suggests a date in the early part of the millennium. It is therefore possible that the pit contained objects of different ages, some several hundred years old at the time of deposition. If we also accept that the later date indicates deposition some time in the middle of the first millennium cal BC, then we may perhaps associate it with the rockfall outside the cave dated to around this time. If we allow ourselves to speculate, we may imagine that a dramatic rockfall in front of the sacred cave might have been interpreted as a strong message from the supernatural powers, requiring a correspondingly strong ritual response from the cave's guardians. The deposit in the side chamber could represent a last ritual of propitiation before the cave was sealed and abandoned.

Future work

One further season of excavation is planned for 1999, specifically to examine the deposit in chamber 2 of Cova A, which also contains human remains, although apparently many fewer than chamber 1 (Fig. 2).

In the meantime, finds processing and analyses of various kinds are being undertaken at institutions in Spain, the USA and the UK. In the course of 1998 we expect reports on the human skeletal remains, on faunal and microfaunal remains, on analyses of the metal objects, on the wooden artefacts and on the hair. A further series of radiocarbon dates, this time on samples of the human bones, is being processed by the Oxford Radiocarbon Accelerator Unit. Conservation work is also continuing, and the conservation of the metal artefacts is currently being undertaken at the Institute of Archaeology.

Note

1. The Menorcan authorities invited Vicente Lull of the Universitat Autònoma de Barcelona and Robert Chapman of the University of Reading to direct the excavation of the site. The present author - and thereby the Institute of Archaeology became involved because by chance a research student of hers, Dylan Cox, who lives and works on Menorca, took part in the first visit to the site by archaeologists and appreciated the importance of the discovery. In March 1995 the author and Maria Mertzani, a conservator from the Institute, spent a weekend on Menorca. During a 12-hour visit to the cave with members of the Menorcan archaeological service, the objects in the pit were lifted, given first-aid conservation treatment and removed to Maò Museum for storage. Maria Mertzani returned to Menorca in May and completed the conservation treatment of the objects, except for the four horn tubes, which were subsequently investigated and treated by Howard Wellman at the Institute of Archaeology. Further conservation work was carried out on Menorca in 1995 and 1996 by Sophie Julien and Charo Rodriguez from the Institute of Archaeology. The excavation teams in 1995 and 1997 consisted of personnel from Menorca, Barcelona, Reading and London (both the Institute of Archaeology and the Accordia Research Centre).