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ARAS TÜRKİYE ESKİ YAKIN DOĞU ARAŞTIRMALARI DERGİSİ
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YAYIN HAYATINA BAŞLAYAN YENİ BİR ARKEOLOJİ DERGİSİ:

Aras Türkiye Eski Yakındoğu Araştırmaları Dergisi

Turkish Journal of Ancient Near Eastern Studies

Iğdır Üniversitesi 2008 yılında kurulmuş, Türkiye'nin oldukça yeni üniversitelerinden biridir. Akademik açıdan hızlı bir biçimde büyümeyi hedefleyen üniversite; Azerbaycan, Ermenistan, Nahçıvan ve Gürcistan'ın da yer aldığı Güney Transkafkasya ülkelerinin yanısıra İran'ın da bulunduğu coğrafyanın oldukça köklü bir geçmişe sahip zengin kültürlerinin araştırılması ve incelenmesi noktasında da istekli davranarak 2017 yılından itibaren Arkeoloji Bölümü'nü aktif hale getirmiştir. Bölümün aktif hale getirilmesinin yanısıra ülkemizde de büyük bir eksiklik olduğu görülen ve özellikle Türkiye ile kültürel ilişki içerisinde olan Güney Kafkasya, Kuzeybatı İran ve Kuzey Mezopotamya'da gerçekleştirilen arkeolojik kazı ve araştırmaların yayınlanabileceği yeni bir dergi yayınlamayı da üstlenmiştir.

Derginin ismi, öncelikle Iğdır ilinin de yer aldığı geniş bir kültürel bölgeyi kapsayan Aras Nehri'nin içinden aktığı geniş bir coğrafyayı temsil etmesi açısından Aras olarak seçilmiştir. Bilindiği üzere ülkemiz sınırları içerisinde Bingöl Dağları'ndan doğan Aras Nehri; sırasıyla Erzurum, Kars ve Iğdır illerinden geçtikten sonra ülkemiz sınırları dışında Hazar Denizi'ne dökülür. Oldukça geniş ve bereketli bir alana sahip Aras Havzası'nda yapılan araştırmalar bölgenin Prehistorik dönemlerden itibaren yerleşim gördüğünü ortaya koymuştur. Kalkolitik ve Tunç Çağlarına ait merkezlerin varlığı kültürel sürekliliği ortaya koymuş ve Demir Çağında Van Gölü Havzası'nda kurulan Urartu Krallığı'nın egemenlik alanına girmiştir. Sadece ülkemizin değil Yakın Doğu'nun da çatısı olarak adlandırılan görkemli Ağrı Dağı'nı da bünyesinde barındıran Aras Havzası; Güney Kafkasya, İran ve Anadolu arasındaki kültürel ilişkilerin merkezinde yer alan ve tarih boyunca önemini koruyan bir bölge olmuştur.

Iğdır Üniversitesi, Fen-Edebiyat Fakültesi, Arkeoloji Bölümü bünyesinde "Aras, Türkiye Eski Yakın Doğu Araştırmaları Dergisi/Turkish Journal of Ancient Near Eastern Studies" ismiyle yayınladığımız derginin ilk sayısı ile özellikle arkeoloji, tarih ve dilbilim okurlarının karşısına çıkmaktan dolayı büyük bir mutluluk duymaktayız. Derginin kurulması aşamasında bizi cesaretlendiren ve her aşamada destek veren Iğdır Üniversitesi Rektörü Prof. Dr. Mehmet Hakkı Alma'ya çok teşekkür ediyoruz. Bunun yanısıra ilk sayımızı hem Doğu Anadolu Bölgesi'nde hem de Güney Kafkasya'da önemli arkeolojik çalışmalar gerçekleştirmiş Antonio Sagona'ya[1] ithaf ederek anısını yaşatacak olmaktan dolayı da büyük bir mutluluk duymaktayız.

Dr. Öğr. Üyesi Rıfat KUVANÇ
Dr. Öğr. Üyesi Bilcan GÖKCE
EDİTÖRLER

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1 A. Sagona'nın biyografisi için bakınız: Ronald T. Ridley, "Antonio Giuseppe Sagona (1956-2017)", *Ancient Near Eastern Studies*, 55, 2018, 1-8.

Prof. Dr. Antonio (Tony) Sagona
(1956 - 2017)

Saygıyla anıyoruz...
In memoriam...

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RECONSIDERING THE ANTLER Y-BOX AND ITS FINDSPOT IN AN EARLY TRIALETI BURIAL IN SOS HÖYÜK, EASTERN TURKEY

Claudia Sagona*

Abstract

In 1997, we published M16-Burial 2 from Sos Höyük, Eastern Turkey in which an unusual, Y-shaped antler artefact was found. The tomb had the hallmarks of the Trialeti period and rendered an absolute date to match (2350-1945 cal BC). Drawing on evidence for similar antler objects from European sites of the Middle Ages, I offer a re-evaluation of the antler object from Sos Höyük as a box in its own right and not as a part of a larger apparatus, which was our first supposition. Though this tomb was modest in scale, it held some frit beads and a seashell ring, which point to long distance contacts. Signs of binding the corpse in this and in a second tomb at the site invite notions of prolonged burial practices and a mobile society, though a society still retaining a sense of homeland and belonging to a territory.

Keywords: Sos Höyük, Trialeti, antler Y-box, shell rings, ochre.

Sos Höyük'te (Doğu Türkiye), Erken Dönem Trialeti Gömütünde Bulunan, Y-Kutu Boynuzu ve Buluntu Yeri Üzerine Yeniden Bir Değerlendirme

Öz

1997 yılında yayınlanan Sos Höyük (Doğu Türkiye) M16-Gömüt 2'de dikkat çeken Y biçimli boynuzdan yapılmış bir eser bulunmuştur. Bu gömüt Trialeti Dönemi'ne karakterize özelliklere sahip ve dönemin kronolojisine uygun bir tarihler vermektedir (2350-1945 cal BC). Avrupa'da bulunan, benzer tipte, Orta Çağ'a ait boynuzdan yapılma eserleri dikkate alarak Sos Höyük örneğini, ilk değerlendirmemizin aksine bir aletin parçası değil de, bir kutu, tek başına bir buluntu olarak tekrar bir değerlendirmenin uygun olacağını düşünüyorum. Mütevazi boyutlarda olduğunu düşündüğüm bu gömü birkaç firit boncuk ile bir deniz kabuğu yüzük sayesinde uzak mesafe ilişkilerini göstermektedir. Bu gömüde ve yerleşmede bulunan bir başkasında bedenin sarıldığına dair izler uzun süreli ölü gömme adetlerine ve göçer olsa da, halen ana yurt kavramına ve bir bölgeye aidiyet hissine sahip, bir topluluğa işaret etmektedir.

Anahtar Kelimeler: Sos Höyük, Trialeti, Y-Kutu Boynuz, deniz kabuğu yüzük, aşı boyası.

Dedication: Dedicated to the memory of my late husband, Antonio Sagona.

* Dr. Claudia Sagona, University of Melbourne, Honorary Principal Fellow In Archaeology, School of Historical and Philosophical Studies, e-mail: c.sagona@unimelb.edu.au

Background

Just over twenty years ago, we published a burial from Sos Höyük, which contained a most unusual object carefully fashioned from an antler (Sagona-Erkmen-Sagona-Howells 1997: 185-186). I would like to revisit this find in order to better identify the antler artefact and also to discuss other aspects of the burial, falling as it does in the Early to Middle Bronze transition. Quite simply, we had never encountered such an object and we looked at the hollowed antler as part of some larger object, rather than being a near complete item in its own right. It would take much wider research to tap into a significant body of data north of the Black Sea and into Europe to find parallels, which spanned the Middle Ages, to gain a better perspective on the object as a container. One thing that can said about the Sos Höyük artefact is that it is the earliest known example of what is often referred to as an antler Y-box.

The Site of Sos Höyük

Sos Höyük is located in the village of Yiğittaşı, which lies between Erzurum to the west and the town of Pasinler to the east (Fig. 1). It sits on the wide flood plain bordered by the Palandöken Dağları (mountain range; south) and the Kargapazarı Dağları (north). This valley forms a major east-west route today as it did in ancient times. One famous trek, which passed this way was that recorded by Xenophon in his *Anabasis* (Sagona 2004). The site is on southern bank of the Yiğittaşı Deresi (river). To the south of the village and of the Erzurum-Ağrı main road is the Çaykara Deresi; both rivers are tributaries of the Aras River which flows further east of Pasinler. Excavations and study seasons were conducted at Sos Höyük from 1994 to 2003 by the University of Melbourne in collaboration with Erzurum Museum (Figs. 2;3)[1]. The sequence determined for this multi-period site is underpinned by a suite of radiocarbon dates spanning the early Bronze Age though to the Middle Ages.

Figure 1- Map of the Erzurum and Pasinler plains.

1 All fieldwork during those years was undertaken with the generous support and permission of the Turkish Anıtlar ve Müzeler Genel Müdürlüğü and the assistance of the Vali of Erzurum and the Director of Culture. I am grateful to Bronwyn Douglas whose photographic skills greatly enriched the documentation of our projects in Turkey and her images are reproduced here (Figure 3 photo is by Antonio Sagona).

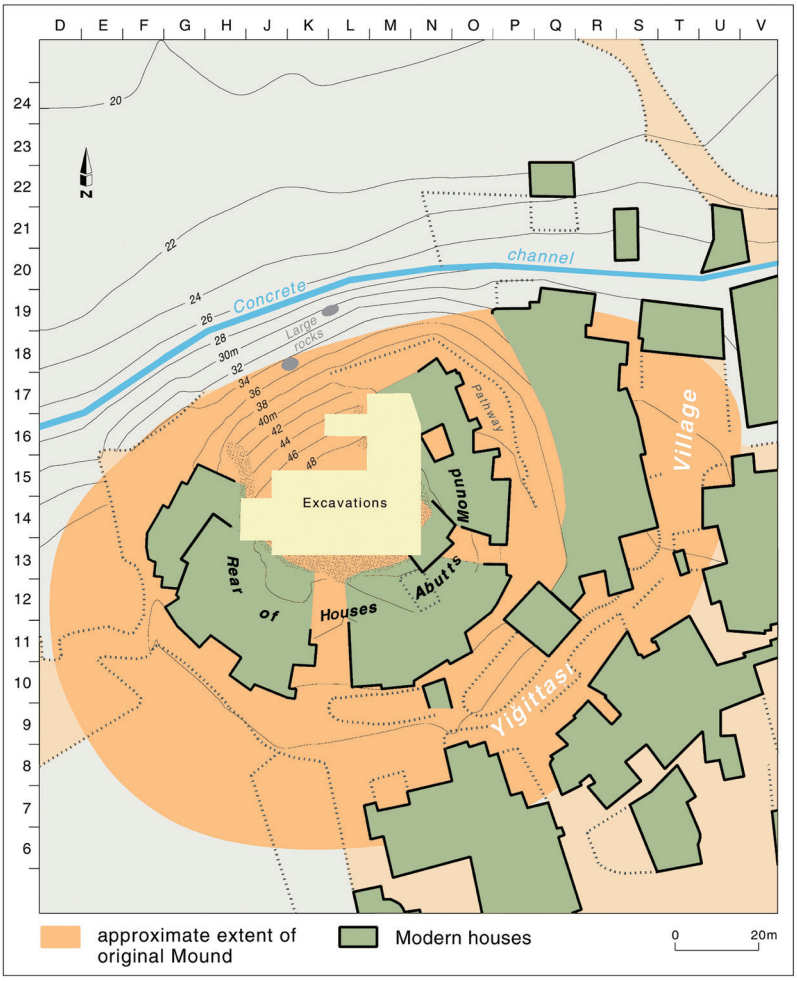

Figure 2- Plan of Sos Höyük showing the excavation zones.

Figure 3- View of Sos Höyük looking south.

M16-Burial 2 in Sos Höyük

The antler object was found in M16-Burial 2. Coinciding with a time of transition from the late Early Bronze Age to Middle Bronze I, the burial yielded an absolute date of 2350-1945 cal BC, which was obtained from human bone[2]. This chronological span placed the deposit within the somewhat enigmatic, 'pit phase' so-called because pits remain a persistent artefact of occupation at many sites rather than architectural remains. This time is associated with the dwindling influences of the Kura-Araxes culture and the hazy association between the Martkopi, Bedeni and Trialeti pottery traditions in neighbouring regions, especially in the Caucasus. Another interment was found in M16-Burial 1, which dated to the same period and although it has been described elsewhere, it does offer some points of comparison[3].

Figure 4- M16-Burial 2, found in 1996 in Trench M16.

Belonging to the lowest level of the pit phase at Sos Höyük, M16-Burial 2 was located in the south-west corner of Trench M16 (locus 3617) and it was excavated in 1996. The grave was not completely exposed as some parts remain within the south and east sections, trapped under metres of accumulated deposits of the mound. Capping the grave was a large stone and under it was a shaft measuring 2m x 2.75m and 1.75m deep. Its fill was firm, varying in colour from yellow through dark brown to grey, and it contained many stones averaging in size around 20 x 18 x 8 cm. The grave itself was roughly square in plan and quite shallow. The burial held the partly disarticulated skeleton of an adult female who was placed facing north in the shallow depression at the bottom of the shaft. The skull and bones of the upper torso and limbs were not well preserved, but her age was determined to be around 18 to 20 (or more) years old and her height was between 160.70 to 168.70 cm (Fig. 5; Parr-Briggs-Sagona 1999: 160).

Figure 5- M16-Burial 2, partially disarticulated skeletal remains.

2 Sagona-Erkmen-Sagona-Howells 1997: 192, "Beta-98876 (sample 28): 3750 ± 70 BP (cal BC 2350-1945) was obtained from human bone in Burial 2 (Trench M16, locus 3617, basket 240)." See also Sagona 2018: 305, 312, for the transitional Late EBA-Early MBA phase (2500-2000 BC); fig. 7.6: 2 depicts the pot from M16-Burial 2.

3 Sagona *et al.* 1998: 33, fig. 7: 5, pl. 3 (a burnished Kura-Araxes bowl), fig. 10: 3 (two shell rings).

Shaft Contents

Some finds were clearly part of the burial deposit and they will be discussed in due course, but within the shaft fill other artefacts might possibly have been intentional inclusions perhaps connected to funerary ritual. They are noted here because kurgans (burial mounds) in the Early Bronze-Middle Bronze Ages in the Caucasus are known to have had objects, most notably obsidian flakes, on or near the surface[4]. Objects recovered from the shaft seem to have occurred in a few clusters. At the top of the fill were a hearth fragment, a single tiny white stone bead (Fig. 8: 2), biconical in shape with a straight drill hole and polished from use, obsidian flakes (overall, 33 pieces of the obsidian were found within the context of the tomb shaft and chamber), some animal bone and a bivalve shell, probably sourced from the local river to the north of the site. Such shells were found from time to time throughout the excavation. A small fragment of a vesicular basalt, lower grinding stone with concave surface was found under the big capping stone[5]. A large bone with signs of use wear was also present (Fig. 12: 3). The tip was broken, but a notch was cut near the thinning end. Some surfaces are polished which suggested repeated use. Its function is uncertain, but it might possibly have served as the body of a bow drill employed in the production of fire.

Further down in the fill, other objects included a damaged animal figurine (Fig. 14: 1-3), which was small with stumpy legs, a short tail, unusually thick at the neck end, but the head was missing. It conforms to the animal figurines sometimes recovered from Kura-Araxes cultural contexts and certainly found from time to time at Sos Höyük in the excavated houses[6]. Two other fragments of bun-shaped, vesicular basalt grinding stones were also found[7]. A flaked cobble of dense black basalt (aphanitic igneous stone) was recorded; this stone type was occasionally found in the settlement, but was also encountered during the survey of the district[8]. Two other flaked artefacts of similar stone material were identified[9]. Among these finds was a large pottery fragment with two curved edges (Fig. 14: 4-5), which may be a variation of the fenestrated stand attached to a pot similar

4 Mounds with lithic deposits, for example: in Kvemo Kartli, at Tqemlara, kurgan 3 and 4, see Shatberashvili- Shatberashvili-Nikolaishvili 2010: 195; Ananauri kurgan 3 dated to the second half of the third millennium BC (Alazani-Bedeni period), Makharadze 2016: 27.

5 Sos Höyük M16-Burial 2 shaft finds: M16 [3617] obj. 136 hearth frag; Art 2439 (obj. 137) bone tool, possibly a bow drill (Fig. 7: 3); Art 2434 (obj. 138) white stone bead (Fig. 4: 3); samples 412 and 418 animal bone; sample 414 a bivalve shell; samples 413 and 419 obsidian fragments; Art. 2523 (obj. 146) a grinding stone fragment from under the capping stone.

6 Animal figurine: Art 2464 (obj. 139), Fig. 9: 1-3.

7 Bun grinding stone fragments, Art 2466 (obj. 142); Art. 2524 (obj. 147).

8 I am grateful to Bengi Selvi, who is working on the obsidian and other lithic material from Sos Höyük, for her identification of this black stone material; the flaked object was recorded as Art. 2472 (obj. 141 in the field notebook).

9 Art 2474 (obj. 140); Art 2498 (obj. 144).

Figure 6- The restored Trialeti pot from M16-Burial 2.

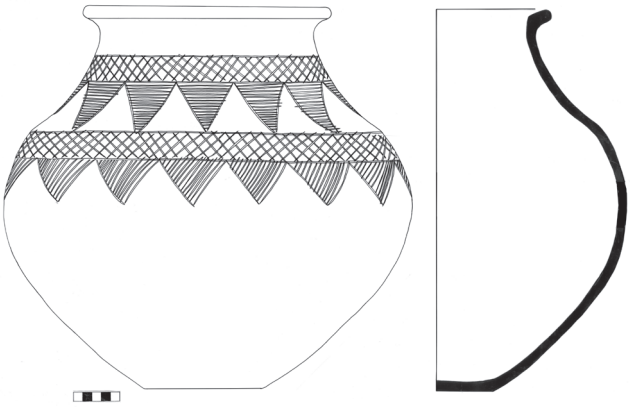

Figure 7- The Trialeti pot from M16-Burial 2.

to one found at Kvatskhelebi[10]. Whether these artefacts were deliberate placements or simply remains caught up in the process of cutting the grave and then back-filling the tomb were difficult to determine. Obsidian, in particular, is abundant in the region and at Sos Höyük due to the extensive highland source north of Pasinler and cobbles washed down in the Büyük Deresi river flowing south below the outcrop, which were brought to the site in antiquity.

Objects in the Burial Pit

Trialeti Jar

The crushed fragments of a large Trialeti jar was the first indicator of the burial beneath and it was place directly above the human remains (Figs. 6-7)[11]. It had characteristics of its time: wide body; handmade, gritty though somewhat friable fabric, which was pale brown (7.5YR 6/4) on the interior and black-burnished on the exterior; and the hue variation infiltrated evenly through the thickness of the wall. Its rim was everted and reddish brown. Sharply incised designs comprised of two wide, cross-hatched bands with pendent hatched triangles were repeated one above the other on the neck and shoulder of the vessel. Although comb-impressed patterns are a hallmark of Trialeti wares, the general shape of the vessel and absolute dates from the burial, suggest that incised hatched lines were also part of the decorative repertoire of that period[12].

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10 The pedestal fragment from Sos Höyük was recorded as M16 [3617] bag 227. The Kvatskhelebi example is illustrated in Sagona 2018: 251, fig. 5.7: 4.

11 The Trialeti jar was designated Art no. 2511; its excavation record is M16 [3617] bag 234 (1996) and it was published in Sagona-Erkmen-Sagona-Howells 1997: fig. 9.

12 This has also been mooted for Rabati (Georgia) where a large jar has deeply incised hatched triangle patterns on the shoulder assigned to the Trialeti period, Sagona in Bedianiashvili-Sagona-Martkoplishvili-Longford-Losaveridze-Kirkitadze 2019: fig. 35:1 and 3-4.

The Antler Box, its Parallels and Possible Function

The antler artefact from the burial was remarkable and unprecedented in Early and Middle Bronze contexts. It was hollowed out of an antler segment with its wall thickness averaging *c*. 3.5 mm (Figs. 9-10; 11:1-2,4); found in three pieces and it was later restored. The outer pearl (that is its natural rough-textured surface) had been stripped off the exterior[13]. Its interior and exterior retain the natural, pale yellow colour of the antler. The only other sign of use is a smoothed and darker area in the crook of the 'Y' (Fig. 11: 1-2, shaded zone; Sagona-Erkmen-Sagona 1997: 197, fig. 10: 1a-c). Three small holes or eyelets had been drilled equidistant around each of the three openings and, judging by the parallels discussed here from much later contexts in Europe, two of these openings would have been permanently sealed with wood or some material that has not survived. One end was shaved to a bevel on the interior and is clearly blackened to a width of 11.5 mm (Fig. 11: 4, the end marked with an astericks). Presumably, the stain may have resulted from the plug sealing the opening or 'dust' from the material once held in the box filtering down into the slight gaps that remained around the plug. Small pegs of wood or antler may have been driven into the eyelet holes to secure the seal. Based on the medieval finds, the third opening probably at the end of the branching tine (Fig. 12: 1) was the access point of the box and this was presumably sealed by a removable stopper. Only a few examples in Europe still retained stoppers and bungs and these are mentioned later.

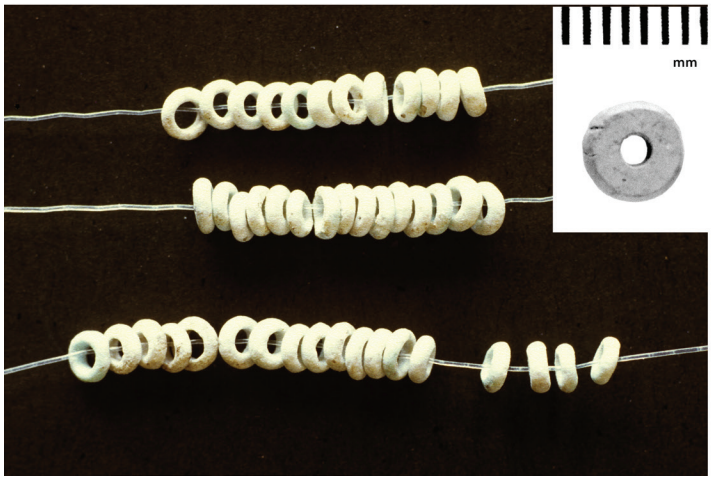

Figure 8:1- Originally blue, frit beads from M16-Burial 2, found near the hip bone (Arts 2444–2448), representing clusters of beads**; 2.** A single white bead from the fill in the tomb shaft.

Two comprehensive discussions with extensive catalogues have been published concerning antler boxes found in Europe. One by Janusz Górecki and another by Mechthild Schulze-Dörrlamm present basically the same body of information. Between the two they have traced the distribution of these objects in Europe[14]. It would be otiose to replicate these studies, but in Table 1 a summary of the countries in which they have been found, the quantities documented in each zone and the chrono-

13 The antler Y-box context: M16 [3617] bag 240 (Burial 2), Art 2431 (1996).
14 Gorecki (2005: 111) also makes a brief list of other finds and although a few cross references are made to Schulze-Dörrlamm (2001), most of the listing can be matched.

logical span assigned to them conveys a sense of the body of material amassed to 2005 (Table 1). Reputedly many of the European examples are made from red deer antlers[15]. Finds continue to be made from time to time and further detailed discussions of such objects have appeared[16].Though surviving in small numbers, it is likely that such boxes were probably reasonably common between the 7th and 12th centuries AD with a few dated into the 13th century. Given the date and contexts of the later finds, it has been mooted that the origins of the technology was in and around Hungary among the Avar populations of the 7th to 8th centuries AD (Tesch 2007: 229). Aside from an example from a Roman villa site near Mansfield Woadehouse, England, dated to the later Roman period, c. 3rd-4th century AD (Fig. 13: 1), which pushes the manufacturing technique back three centuries or so, the example from Sos Höyük plunges antler box production deep into prehistory at end of the third millennium BC in Eastern Turkey. Whether this technique for producing such containers endured throughout the intervening centuries or was reinvented at the later date, remains uncertain. Otherwise, the general exploitation of antlers in the Early Bronze Age and in subsequent prehistoric periods is well-known in Turkey and the Caucasus; evident in other skilfully produced antler tools, horse trappings

Figure 9- (left to right). Bone toggles (Arts 2432 Art 2485), bleached frit beads (Arts 2444–2447 numbered in bead clusters), shell ring (Art 2483), restored Y-box (Art 2431).

Figure 10- Segments of the Y-box before restoration; note blackened interior rim of the opening at the top of the photograph.

15 Tesch notes (2007: 227) red deer examples are concentrated in Hungary, Czech Republic, Slovakia and north western Germany.

16 A decorated example came from a grave fill in Briborska Glavica (Croatia), see Ghica-Milošević-Uroda-Dzino 2017: 785, fig. 22 (inv. n. BR2015464). Detailed discussion of antler artefacts from the Moravian fortress at Mikulčice including Y- and T-boxes can be found in Kavánová 1995: 72-82, figs 28-35, pls 23-24, some are unfinished. There are a number of other studies, for examples, see Florkiewicz-Wołoszyn 2018; Tesch 2007: 235; Profantová 1992.

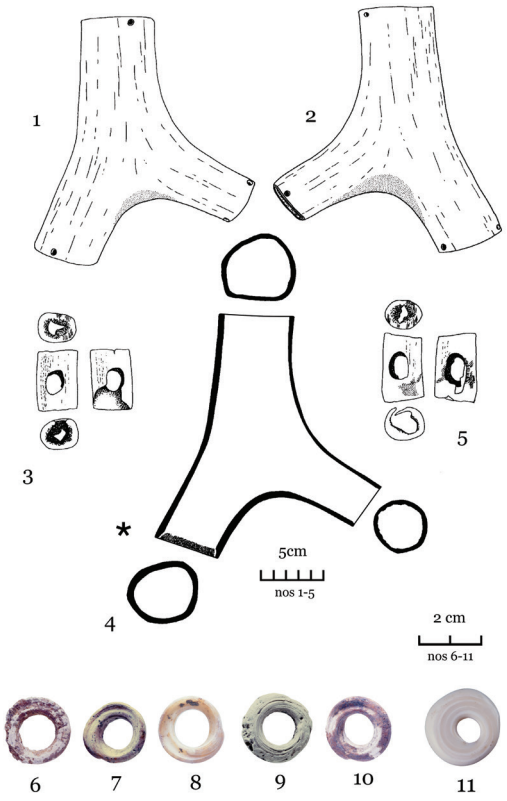

Figure 11- Drawings of the Y-box (Art 2431); **3, 5.** Toggles (left Art 2485; right Art 2432); shell rings: **6.** Art. 2483 (Burial 2, M16 [3617] 1996); **7.** Art 2759 (Burial 3, M16D [3642] 1997); **8.** Art. 2750 (Burial 3, M16D [3647] 1997); **9.** Art. 2751 (Burial 1, M15D [1855] 1997); **10.** Art. 2970 (Burial 1, M16-M15D [3715], 1999); **11.** Art. 1638 (M17AB [126], 1995), a variant shell disc from remnant domestic architecture.

and household implements. Even against this background of local prehistoric use of antlers, the Sos Höyük Y-box is an exceptional piece and, so far, unique for its time.

The contexts of the European boxes may throw light on how the Sos Höyük example may have been used in daily life. Those from graves were often found near the hips of skeletal remains (Tesch 2007: 277). Suspension from belts or hung around the body with straps is possible. Indeed, decorated examples can have crisscross designs suggestive of bags made of netting (Fig. 13: 8). Some examples have elaborate patterns on one face (Fig. 13: 3) with representations of braid-like bands across the reverse side (Fig. 13: 4), as if the object were cradled in some kind of decorative pouch. Perhaps undecorated examples like the Sos Höyük box and others found in Europe (e.g. Fig. 13: 2, 7), may have been held in elaborate leather or textile ties and slings worn across the body. Other examples can depict less structured designs (Fig. 13: 9), as well as representations of animals, soldiers and so on (Górecki 2005; Schulze-Dörrlamm 2001). It has to be noted that numerous antler boxes are also found in and around European fortified settlements. While the reason for these depositions is worth consideration, it is beyond the scope of this article. Nonetheless, they do indicate that the boxes are not restricted to funerary contexts and they were objects of daily use.

Place	Quantity in catalogue	Broad date span AD
Hungary	23	7th-mid-10th
Austria	4	7th-10th
Croatia	5	1st half 9th
Serbia	3	8th-12th
Czech Republic	25	7th-12th
Slovakia	2	8th-10th
Switzerland	1	Post 916
France	1	9th-10th
Germany	15	9th-12th
Poland	8	7th-12th
Romania	3	7th-12th
Greece	1	10th-12th
Bulgaria	1	10th-12th
Ukraine	10	8th-13th
Khazaria	1	9th-10th
Russia	2	10th-12th
Lithuania	1	uncertain

Table 1- (from Górecki 2005)[17].

Concerning European parallels to antler box, only on a few occasions has any kind of plug or stopper been preserved. Some discussions have suggested lids or corks, which were corded and tied to the main box near the branched tine opening (Tesch 2007: 230). One from Stommen, Tarsled parish, Västergötland province (Sweden) had two simple segments of wood, cut, shaped and wedged into the openings though they were shrunken over time and were no longer tightly fitted (Nerman 1954: fig. 1). Neither had additional nails or pegs to hold them in place. Two large and beautifully preserved boxes were found in underwater archaeological investigations concerning remnants of a medieval bridge in waters around Ostrów Lednicki island, which lies between Gniezno and Poznań (Poland). One had a well-made rounded stopper with a cross cut in the top that was still in the branched tine opening (Fig. 12: 2; Szulta 2005: 78, pl. 11; Górecki 2005: 87, fig. 1: 2.).

Antler boxes have been divided into two basic shape categories reflecting the point at which they were cut from the antler (Fig. 12: 1). On the basis of finds in burials, the T-shaped boxes were associated with male burials and the Y-shaped were connected with female interments[18]. As only one example has been found from Bronze Age

17 Table 1 is based on Górecki 2005. The reader should note that discrepancies between Górecki (2005) and Schulze-Dörrlamm (2001) do occur in the documentation both in choice of publication of the antler boxes and in the documentation and there are a few problems with the figure numbers.

18 Słowińsk 2018 (website, last accessed 15 March 2019); it would seem that sex of the human remains was

contexts in Turkey, there is not enough evidence to suggest that its shape held the same gender-specific connections as suggested for those found in the Middle Ages. While we should also be cautious about drawing parallels concerning function of the boxes, there is some merit in outlining what has been suggested regarding how the European antler boxes were used.

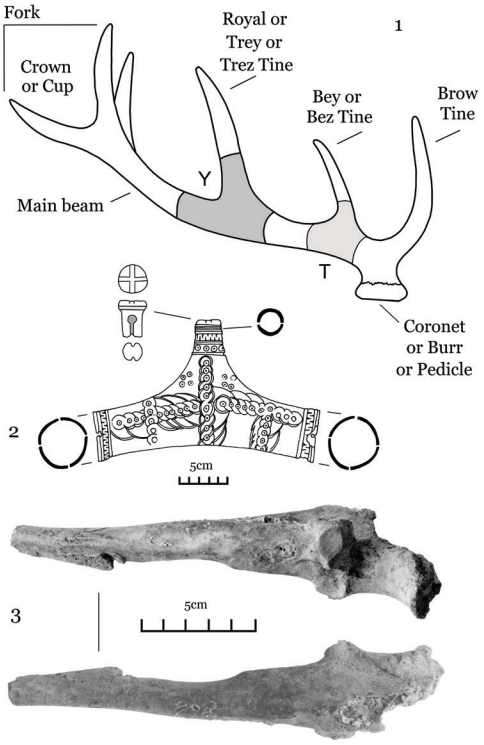

Figure 12- Antler terminology (after Constantine 2014 fig. 6 and Overbeck-Bierbrauer 1979, fig. 4); **2.** Large antler T-box with lid on the smaller opening from Lake Lednica, Łubowo, Poland (after Górecki 2005: fig. 1: 2); **3.** Bone with notch and use wear sheen, which was possibly the bow from a bow drill from Sos Höyük (Art 2439).

One unequivocal purpose can be assigned to the example now in the British Museum, which was found near the Grüneck castle, Ilanz, Graubünden canton (Switzerland) in March, 1811. It held coins dated up to *c*. 916 AD[19]. This example's openings were sealed with silver discs, but its use as a money box might have been secondary (Tesc 2007: 231; Nerman 1954: 56). Boris Kolchin and colleagues proposed that such containers were used for salt and, picking up this notion, Sten Tesch also discussed the historical and cultural significance of salt as a commodity (Kolchin-Yanin-Yamshchikov 1985; Tesch 2007: 232-233). Holders for medicinal herbs and ointments has also been suggested[20]. They have been linked to saddle or bridle mounts, which could have a somewhat similar form (Tesch 2007: 229, 231; Grimm 1957; Žak 1963; Fuglesang 1991). Others argue that the sturdier examples might have been handles or parts of weapons and tools (Gorecki 2005: 122; Piaszykówna 1950: 118; Dostál 1981: 53). By the 14th century and after, gunpowder boxes

based on the contents found in the graves. An example from Podzamcze in Szczecin (Poland) is illustrated, which is decorated with drilled dots, hatched bands arranged like straps across the body and a cross on one side (it is T-shaped). See also Gorecki 2005: 113.

19 Pfister 1844: 551-552; Pfister 1847: 74-75, with an illustration of the box; the coins are listed as Emperor Louis II (875 AD), Carloman (878-880 AD), Charles III (as emperor, AD 880-888), Lambert (892-898 AD) and Berengarius (as king; 888-916 AD); see also Overbeck and Bierbrauer 1979 concerning the Ilanz antler box.

20 Gorecki 2005: 122; Schuze-Dörrlamm (2001: 544) speculates that the shape mimics the female body and the contents may have related to increasing fertility.

were fashioned out of antler in a similar manner. But apart from the coins held in one, none of these functions has been proven categorically.

One final suggestion links the boxes to containers for tinder and this function has some appeal[21]. The interior of the Sos Höyük is somewhat decayed by time in the ground, but the neat blackened band on the interior of the bevelled opening and some slightly darkened patches on the inner wall might indicate such material was kept in the box (Fig. 10). If the notched bone found in the shaft did serve as a bow drill, then part of the equipment placed in the tomb served in fire production (Fig. 12:3). Neither identification is certain, but together they are suggestive. Like gunpowder, keeping tinder dry was essential to the process of lighting a fire. Ideal tinder is made from dry, fine organic particles; grasses, some tree barks and fungi are well suited to this purpose. Miller Christy's 1903 series for *The Burlington Magazine for Connoisseurs* has a fascinating account of tinder sources and production in historic times (Christy 1903: 60). The most famous ancient example of a tinder collection was among the possessions carried by 'Ötzi', whose frozen remains were recovered from the mountains on the Italian-Austrian border in 1991; his remains are dated to the prehistoric period (3400 and 3100 BC). Among his possessions was a large quantity of black matter in a leather bag identified as "classic fire starting tinder", *Fomes fomentarius*, tinder or hoof fungus (Peintner-Pöder-Pümpel 1998: 1156-1157, 1160). Considering tinder as a possible commodity stored in the antler box, there is scope and reason to have the black residue on the inner rim of the Sos Höyük example analysed in the future.

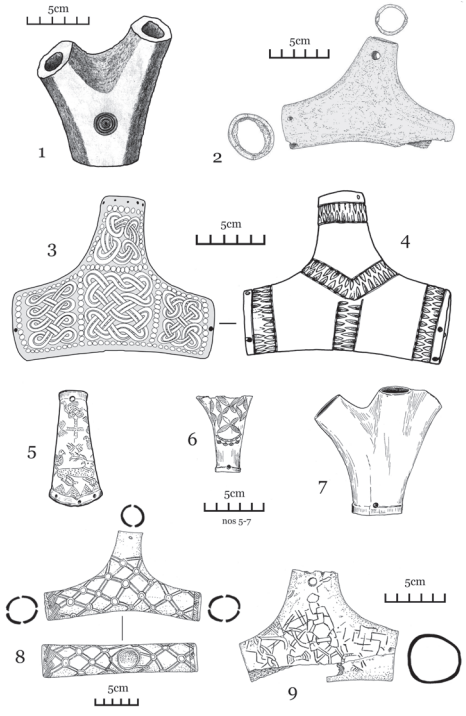

Figure 13- Antler Y-boxes: one with concentric circle design from a Roman villa site near Mansfield Woadehouse, England dated to c. 3rd-4th century AD (after Rooke 1787, pl. 24:11); **2.** From Czermno, state (after Florkiewicz-Wołoszyn 2018, fig. 1); **3–4.** T-shaped antler box found near Grüneck, Ilanz, Graubünden canton, Switzerland (1811), British Museum inv. no. 1847,0824.1. Well-worn decorated surfaces comprising intertwined ribbons and inter-looped circles on the smaller neck on the exterior in zones defined by spots; on the back (**no. 4**) the design is simpler, bands edged with repeating 'v-shaped' notches around the openings and in a Y-shape around the body imitating lashes or straps (after Overneck-Biernrauer 1979, fig. 123; back view by the author based on the British Museum catalogue photo); **5.** Decorated antler object identified as a neck for a wineskin (after Pletnev 1967, fig. 42: 12); **6.** As for **no. 5** (after Pletnev 1967, fig. 42: 11); **7.** Antler box with four openings (after Pletnev 1967, fig. 42: 10); **8.** from Kalisz-Zawodzie, Greater Poland Voivodeship, Poland (after Florkiewicz-Wołoszyn 2018, fig. 3 from M. Piaszykówna 1950, fig. 1); **9.** from Kalisz-Zawodzie, Poland (after Florkiewicz-Wołoszyn 2018, fig. 4).

21 Mention of tinder as a possible item held in antler boxes: András 2018: 68 (the cover of the book depicts another antler container).

It has been argued that some simpler cylinders fashioned out of sections of the antler beam (Fig. 12: 1) might have been spouts, which were attached to wine skins; these too can be elaborately decorated or left plain (Fig. 13: 5-6; Pletnev 1996: fig. 42: 10-12). In view of the European examples, however, our original suggestions that the Sos Höyük Y-box was a connecting part of a larger device, perhaps a musical wind instrument or some other apparatus seems unlikely (Sagona-Erkmen-Sagona-Howells 1997: 185). Even though millennia separate the examples, at the very least the examples from the Middle Ages do give some insights into the basic function of the Bronze Age item as a box or container.

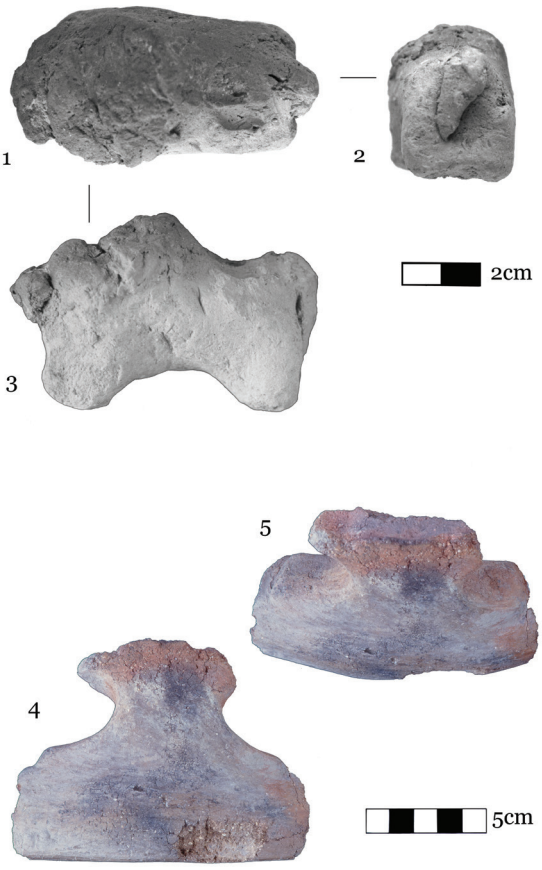

Figure 14- Damaged animal figurine, top (**no. 1**), rear (**no. 2**) and side views (**no. 3**); **4–5.** Fenestrated stand, which probably supported a pot, front view (**no. 4**), and top view (**no. 5**). Both objects are from the shaft of M16-Burial 2.

Toggles, Beads, Shell Ring and Ochre Toggles: Though the finds in M16-Burial 2 were few, the other items are also noteworthy and point to cultural and ritual practices. A pair of toggles made from segments cut from an antler tine into which large holes were pierced through the sides was found in the burial (Fig. 9 left; 11: 3, 5; Sagona-Erkmen-Sagona-Howells 1997: fig. 10: 2). One was located near the hands and one near the feet of the skeleton and they were presumably used to bind the limbs or to secure a shroud around the body. Whether the deceased was a bound victim or the toggles were used to tie the corpse into a crouched position is unclear. Ritual death has been recorded in funerary contexts elsewhere. For instance, an unnatural death has been suggested for six of the individuals placed in Ananauri kurgan 3 dated to the mid-third millennium (2400 BC) and assigned to the Bedeni culture (Makharadze-Murvanidze 2014: 29).

There is a fundamental difference between these two practices. Additional individuals like those in the Ananauri kurgan are presumed to have been sent to their early deaths to accompany the seventh and principal deceased person in the tomb (Makharadze-Kalandadze-Murvanidze 2016). Whereas the woman in M16-Burial 2 was the sole occupant of the grave. A similar treatment was recorded for another burial at Sos Höyük.

M15-Burial 1 (Fig. 15), which will be discussed in due course concerning the shell rings found in that tomb. It held the skeleton of a man aged between 50 and 60 years old. The bones were in disarray except for the arms and hands, which were fully articulated, but crossed as if bound and they were placed beside the other bones (Fig. 16). It can be suggested that these corpses were arranged, perhaps shrouded, then kept until an appropriate time and place was identified for their burial. This mortuary practice could be a response to highland climates, which experience freeze and thaw conditions and this method of dealing with the deceased has been described as a 'prolonged burial'. Such a delay in burial can result in the uneven disarticulation of the remains before the final interment (Parr-Briggs-Sagona 1999: 164-165). This is also a plausible explanation for communities, which were more mobile during this period, as has been mooted for pit phase settlements like that at Sos Höyük (Sagona 2018: 298). Such groups may have wanted their family members to be buried in locations with ancestral or territorial meaning and hence, their remains were preserved until those locations were reached.

Shell: A shell ring in the M16-Burial 2 takes on great significance when considered against similar examples in burials found at Sos Höyük in subsequent years (Fig. 9 lower centre)[22]. Two rings were found in M16-Burial 3 dated to 2560-2525 BC and assigned to the Kura-Araxes period and two were in M15-Burial 1 excavated in 1997 dated to 2575-2300 BC, which contained a pot displaying early (prototype) Trialeti characteristics[23]. The shell type used is the *Conus* or cone shell sourced from the Mediterranean or Black Sea.

Figure 15- M15-Burial 1, Trench M15d (1997).

An identical and well preserved example was found in kurgan 54 at Mentesh Tepe (Azerbaijan) of the Martkopi phase and it was associated with the burial of a man aged 40 years old or more found on the roof of the chamber (dated to the second half of the 3rd millennium BC; Pecqueur-Decaix-Lyonnet 2017: 184, fig. 10). Why he was found in this part of the tomb is a source of debate, but two young female burials in the

22 Two shell rings were found in 1997 (Art 2750 and Art 2759); M16-Burial 3, was immediately under M16-burial 1, Sagona-Erkmen-Sagona-McNiven-Howells 1998: pls. 2-3.
23 One shell ring from M15-Burial 1 was found in 1997 (Art 2751; Sagona-Erkmen-Sagona-McNiven-Howells 1998: 34) and the second was found when excavations continued in the same spot in 1999 (Art 2970).

chamber, again point to unnatural deaths (Pecqueur-Decaix-Lyonnet 2017: 191). The rings from Sos Höyük are too small to be worn on the finger and they were not found among bones of the hands. They could have been carried or worn as amulets.

Figure 16- The fully articulated arms and hands of the skeleton, but placed beside the other bone remains.

Beads: Although the beads recovered from M16-Burial 2 were initially recorded as stone, only the single bead found in the fill of the shaft was of the hard white stone, possibly sepiolite (or meerschaum). Nodules of this material outcrop in the mountains north of the site although no evidence of bead manufacture has been found at Sos Höyük. Under magnification, it would appear that the beads from the burial, which were originally strung together were manufactured from frit (or possibly faience), much degraded by leaching while in the ground; the surface qualities and shape differences can be seen in the photographs (Fig. 8:1 frit; Fig. 8:2 stone). Rather than stained by proximity to dyed cloth, the beads were probably a pale blue hue and only fugitive traces of the colour remains (Fig. 8:1). Frit or faience beads have been recorded from other Kura-Araxes contexts and were possibly sourced from Mesopotamia (Carminati 2014: 170-171).

Ochre: Red ochre usage in burials from the Maikop period (c. 3800-2800 BC) has been recorded in the broader region (Sagona 2018: 164, 166, 169). The tradition continues into later contexts and samples of red ochre were noted in Sos Höyük M16-burial 2[24]. Ochre was also reported in a number of Bedeni and Trialeti contexts. For instance, it was sprinkled over the roofing logs of the large kurgan 3 at Ananauri (Makharadze-Murvanidze 2014: 54). The red pigment was present in kurgan 54 at Mentesh (Pecqueur-Decaix-Lyonnet 2017: 190). Concerning horse burials in Armenia during the early and middle Trialeti period, Farhad Quliyev also noted the presence of red ochre (Quliyev 2008: 304).

24 Ochre was also present in the Sos Höyük grave deposit (samples 438, 450A).

Conclusions

Where do we rank M16-Burial 2 in terms of social status? A placement of a single pot was made in this and other graves at Sos Höyük. There was no gold, no other metal work, nor monumentality of the actual burial site itself, yet simple strings of imported, faded blue frit beads point to distant trade connections, perhaps to Mesopotamia where glazed material is known to have been manufactured. Similarly, rings fashioned from cone seashells were carried inland from the Mediterranean or the Black Sea, which might have appealed to the ancient consumers as exotic artefacts. The distribution of these shell rings, five from Sos Höyük and one from Mentesh Tepe from roughly contemporary funerary contexts raises a question about the mechanism of distribution of these items from their marine source. It seems logical that production of rings from the cone shell took place close to the sea. Nearly four hundred kilometres lie in a direct line between Sos Höyük and Mentesh Tepe, but in reality, many more kilometres would have to be travelled though mountain valleys and plains to pass from one territory to the other and many more besides to carry the rings inland from the coast. Both the frit beads and shell rings point to somewhat safe passage through the regions involved, which allowed the movement of people and for such merchandise to be distributed.

The antler boxes occur among communities whose economy included exploiting deer. Hunting may have been an aspect of their economy, but gathering the annually shed antlers could have been a seasonal activity for those who made objects from antlers (Luik 2011: 36). We are in the curious situation of having a sole antler box from prehistoric contexts in Turkey and numerous examples from centuries later, when antler boxes become relatively common, though undoubtedly treasured possessions among European communities in the Middle Ages. The carefully crafted Bronze Age antler box, possibly part of a fire making kit, might represent the ability of the deceased to tend to the household needs for heat and for food preparation. Even if the antler box was no more than a container for other valued items or commodities, the Sos Höyük example is still a remarkable survival reflecting on the growing complexity of antler working in the third millennium. Zurab Makharadze encapsulated the general strides in production of wooden, leather, and textile artefacts found in the Ananauri kurgan. He suggested the grave goods displayed, “versatility of technologies” and a “high level of various crafts.” (Makharadze 2016: 29). Even without excessive signs of elite status, the Sos Höyük burial does hold similar indications of such achievements albeit on a modest scale.

Binding of the deceased as part of a possible prolonged burial practice before the final interment invites more questions than answers. Did the bound corpse remain in plain sight for some length of time or was it placed in a some kind of container or bundle until a burial site was chosen and prepared? Protection of the remains from animals would be a consideration in lengthening the burial process. Within a mobile society, this would mean the deceased travelled with the community until the final

resting place was reached. Behind such a notion is the sense of homeland or territory, to which groups returned to bury their dead and they chose Sos Höyük on more than one occasion.

Like the heavy dusting of ochre over the Ananauri tomb roof, red ochre was present in the Sos Höyük grave, which suggests that this commodity played a role in a funerary ritual even though the social status of the two burials was quite different. Antonio Sagona wrote extensively about the significance of red ochre in ancient societies:

> Red ochre is a globally important substance and highly symbolic. It is its 'redness', a visually stimulating colour, which is so appealing to humans. In many cultures extending back into the Palaeolithic, red ochre was often associated with blood, vigour, and life. (Sagona 2018: 142-143)

Meagre though the objects are in M16-Burial 2, each find has a significant background story to impart. Similarly, the mortuary evidence points to complex notions governing burial procedures and to underlying belief systems that were current among communities in the region during the closing years of the Early Bronze to Middle Bronze Age.

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