

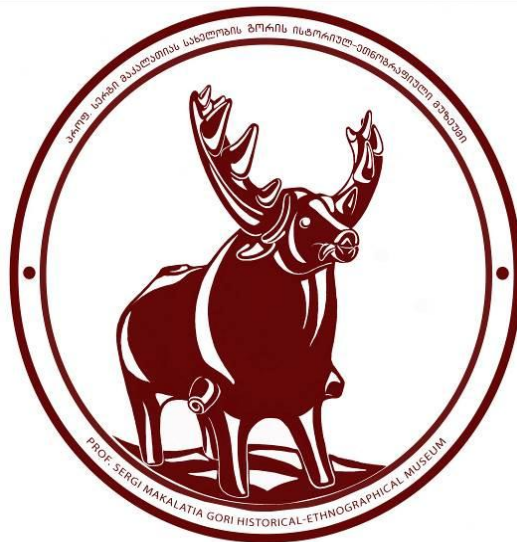
PROF. SERGI MAKALATIA
GORI
HISTORICAL-ETHNOGRAPHICAL MUSEUM

STUDIES IN CAUCASIAN ARCHAEOLOGY



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On the Origins of the Pottery Traditions of the Kura-Araxes Culture

DIANA ZARDARYAN

Institute of Archaeology and Ethnography
National Academy of Sciences of Armenia

One of the first researchers of chronological aspects of the Kura-Araxes culture B. A. Kuftin suggested the idea of the ‘Kura-Araxes Eneolithic’ and placed it within the frames of the Copper Age. Academician B. Piotrovsky had the same opinion on this question [Piotrovsky, 1949: 32-42]. Only H. Martirosyan [Martirosyan, 1964: 22-47] was the first to identify the Kura-Araxes culture as ‘Early Bronze Age phenomenon’ and dated it to the beginning of the second half of the III Millennium BC. K. Kushnareva and T. Chubinishvili followed the same concept. As a result, the Kura-Araxes culture ‘achieved’ an epochal status (the epoch of the Early Bronze Age) and was divided into three phases: Early (3000 - 2700/2600 BC), Middle (2700/2600 – 2400/2300 BC) and Late (2400/2300 – 2000 BC). Periodization of the Kura-Araxes culture suggested by S. Ashurov was different. According to him, its first phase dated back to 3600 - 3400 BC, the Second - 3400 - 2800 BC, and the Third - 2800 - 2400 BC [Rybakov, 1994: 17-18].

New stratigraphic studies of the Kura-Araxes sites combined with the series of radiocarbon dates allowed the researchers to enlarge the chronological borders of the Early Bronze Age. Thus, the First phase, or EBA-I, dated back to XXXV-XXX centuries BC; the Second phase, or EBA-II – XXIX-XXVI centuries BC; and the Third phase, or EBA-III – XXVI-XXIV/XXII centuries BC [Avetisyan et al. 1996: 8-10; Kushnareva, 2000: 53-54].

This division is based on evolution of the Kura-Araxes ware represented by three successive traditions: Elar-Aragats (EBA-I), Shresh-Mohrablur (EBA-II) and Karnut-Shengavit (EBA-III). Ceramics of these traditions differ in techno-morphological features, ornamentation and the way it is applied. R. Badalyan has recently offered a new version of chronology and periodization of the Kura-Araxes culture. According to the new stratigraphic data and ceramic complex from Gegharot settlement, Shresh-Mohrablur and Karnut-Shengavit traditions following the Elar-Aragats (despite differences in geographical distribution) are synchronous phenomena. Thus, the Kura-Araxes culture has two stages:

Stage I, or EBA-I (3500/3350-2900 BC) - Elar-Aragats tradition;

Stage II, or EBA-II (2900-2500 BC) - Shresh-Mohrablur (the Ararat Valley) and Karnut-Shengavit (Aragatsotn, Shirak, Kotayk, Lori Pambak) tradition [Badalyan, 2011: 63-68].

Some of the researchers (A. Sagona, T. Kiguradze) suggested to consider the earliest phase of the Kura-Araxes cultural complex as one of the cultures of the Late Chalcolithic and date it back to the last quarter of the Fourth Millennium BC. According to A. Sagona and T. Kiguradze, the Middle-Late Chalcolithic is dated back to 4000–3200/3100 BC [Kiguradze et al. 2003: 40], and the same chronological boundaries include the earliest phase of the Kura-Araxes culture, or the EBA-I. However, at the sites where the Kura-Araxes layers are overlying directly the Chalcolithic ones (Kyultepe I, Adablur, Berikldeebi, etc.) no typological characteristics between the so-called Proto-Kura-Araxes and the Kura-Araxes ceramic complexes are identified. And, in spite of obvious origins of the ceramic complex of this culture at the Sioni or Teghut-like sites, related to the very end of the Chalcolithic period, the problem of fixation of a site to specific data of genetic connection between the Chalcolithic and the Early Bronze Age (or Kura-Araxes) cultures is still open, which means that the sites directly preceding the Kura-Araxes culture (Proto-Kura-Araxes, or Late Chalcolithic), are poorly studied.

In recent years new Late Chalcolithic sites (Nerkin Godedzor [Avetisyan et al. 2006: 6-18] and Areni-1) have been excavated and studied in the Southern part of the Republic of Armenia. The Chalcolithic layers of these sites contain local and imported Chalcolithic painted pottery along with samples made in the Chalcolithic technical-technological traditions. They are close to the Kura-Araxes cultural tradition by morphology and typological attribution, and are represented by classical Kura-Araxes pottery examples. Such displays may confirm the ideas pointing to the local origins of the Kura-Araxes culture coming from the Chalcolithic, and the attempts of reconsideration of chronological boundaries of its early phases, even up to placing these within the limits of the Late Chalcolithic (qualitative new revival of the ‘Kura-Araxes Eneolithic’).

Areni-1 cave is situated to the east from the village of Areni in the limestone formations of the left bank of the Arpa River (tributary of the Araxes River). Archaeological investigations here have been carried out by the Armenian-American-Irish joint expedition since 2007 (the head of the expedition is Boris Gasparyan, Institute of Archaeology and Ethnography, NAS RA). The site has at least 5-6 occupational horizons of the Chalcolithic period with total power of cultural layers more than 4 meters.

In six years the upper three horizons were studied. Series of radiocarbon dates as well as study of archaeological material allow us to place these horizons within the following occupational phases:

Late Chalcolithic Horizon I (the upper horizon of the site) - 3700-3400 cal. BC.

Late Chalcolithic Horizon II (separated from the Horizon I with a dung layer) - 4000-3800 cal. BC.

Late Chalcolithic Horizon III (separated from the Horizon II with a dung layer) - 4300-4000 cal. BC.

The ceramic material of **Horizon I** is mainly represented by the so-called ‘Godedzor’ tradition ware. By its morphology this pottery resembles the Kura-Araxes ware of the Early

Bronze Age (cylindrical neck, hemispherical handles), but preserves technological features of the Chalcolithic vessels. This ware is represented by various shades of orange and brown colors and is made of clay with straw, dung and sand inclusions. In general, surface is not burnished. There are also typical Kura-Araxes andirons. This ceramic complex indicates a genetic link between the Kura-Araxes culture and the Late Chalcolithic. Such kind of vessels, reflecting transition from the Chalcolithic to the Early Bronze Age, was also recorded at the site of Nerkin Godedzor in southern Armenia. But in Areni-1, besides the mentioned ware, there were also found examples of classical Kura-Araxes black-burnished ceramics with characteristic features of its first phase ('Elar-Aragats' tradition) - three-parted structure and ornamentation (oblique grooves and round impressions) having exact parallels with the pottery of the Early Bronze Age sites such as Elar, Aragats, Gegarot and Talin (Fig. I).

The pottery of **Horizon II** of Areni-1 represents three coexisting simultaneous ceramic traditions prevailing in the South Caucasus in the first quarter of the IV millennium, including the 'Teghut-Berikldeebi' and the 'Leylatepe' ones.

The 'Teghut-Berikldeebi' tradition is characterized by the lighter shades and is made of relatively pure clay, without impurities, or with a little amount of organic inclusions and are well fired. It is represented by large and medium-sized pots with extended and rounded body, rounded bottom and a cylindrical or bell-shaped neck. Rims of these vessels are either absent or Γ -shaped. Ceramics of this tradition are found at the Late Chalcolithic sites of Armenia, Georgia and Azerbaijan.

The 'Leylatepe' tradition ceramics is prevalent in the present-day Azerbaijan. The vessels found at the cave of Areni are dark, have egg-shaped or rounded body, cylindrical or bell-shaped neck with rounded or sharpened rim. This cookware has dark shades; it is relatively thin-walled, made of clay with mineral admixtures and is well fired. The pottery of both traditions, discovered in Areni, is burnished and decorated with relief cones and bands, incised lines, notches on the edge of the rim and grain-like impressions. There are also pierced decoration in the form of series of holes below the rim, and combed surface. Several fragments from Horizon II have incised signs on the external surface, which are also typical for the mentioned ceramic traditions.

In the ceramic complex of Horizon II of Areni-1 there is also a separate group of ware that is not typical for the mentioned traditions, therefore, it is conventionally considered as 'Areni' tradition. These vessels repeat the shapes of the pottery of the 'Teghut-Berikldeebi' and 'Laylatepe' traditions, but unlike those are made of clay with inclusions of very fine sand and fine organics and are not burnished. These vessels have distinctive bow-shaped, hemispherical, triangular and trapeziform handles placed vertically or horizontally on shoulder. Among the decorations there are relief knobs, almond-shaped applications, incised lines, chevrons, zigzags, waves, notches on the edge of the rim, pierced decorations below the rim and impressions in the form of small holes on the shoulder. The colors of the pottery of this tradition are grayish-beige and light brown. Among this pottery there is a subgroup characterized by non-typical for the Late

Chalcolithic of the South Caucasus locally made monochrome and bichrome painted ware [Zardaryan, 2013: 49-50].

Among the pottery of Horizon II there is a group of vessels, shapes and manufacturing techniques of which are not specific to the Kura-Araxes culture, however the excellent black burnishing is very reminiscent of that. This horizon also recorded findings of pots reminiscent of the Kura-Araxes culture (with hemispherical and bow-shaped handles), produced in other pottery traditions (Pl. II/1-4).

The material from **Horizon III** has been studied only recently; therefore some of the data presented in earlier publications [Zardaryan, 2011: 53-57] is updated and changed. Most of the ceramic material earlier considered as the second horizon pottery originated from test sounding and mixed layer. Thus, according to the latest data, the ceramics from Horizon III of Areni-1 is also represented by several pottery traditions – it's very rich and varies in technological and morphological characteristics. One of the traditions points to a direct analogy with synchronous site of Ovchulartepe in Nakhichevan [Marro et al. 2011: 53-100], which just as Areni-1 cave is located in the Arpa river gorge.

Vessels of this phase are made of clay either with slight inclusions of grayish fine sand and organics or with addition of coarse-grained mineral inclusions (sandstone, calcite and other). These are well (and even perfectly) fired and presented by all the shades of brown (except dark), yellow and red. The pithoi are large and medium-sized with globular body and a low cylindrical neck; pots and jars have ovoid body and prominent or straight low neck; medium and small vessels are with rounded body or in the shape of a pomegranate with a cylindrical or flared low neck. Bottoms are rounded or flat. Most of the vessels have modeled rims. Bowls are deep – hemispherical or bell-shaped, or low with flat bottom. The handles of the vessels are either the so-called hemispherical 'Nakhichevan lugs', or small bow-shaped, located on the body, shoulder or neck. All the ceramics demonstrate a good surface treatment. It is either slipped or perfectly burnished, or combed. Among the pottery decorations of Horizon III there are relief knobs, twisted rope-like and horseshoe-like applications, embossed bands triangular in section and bands with round impressions. All of these are located in the upper parts of the vessels. Notches decorate the edge of rim. There is the only anthropomorphic relief application decorating a fragment of a large pithos. Meanwhile, in Ovchulartepe the storage vessels are decorated with zoomorphic applications.

Painted pottery is also typical for Horizon III of Areni-1. It's more variable than the pottery from the Horizon II and is represented by monochrome (red or black figures on beige (raw) background), bichrome (black figures on red painted background, or red on black), and polychrome (dark and red figures on 'raw' surface) ware.

However, despite all the mentioned pottery finds from Horizon III, the most interesting is the ceramics with all characteristics of the Kura-Araxes culture ware, but different in technological feature, found *in situ* (Pl. II/5-11). This kind of pottery is of high quality, thin-walled (from 3

mm), its external surface colors are beige, yellow, brown, black and the internal surface is beige, light-brown, or dark-brown. It's made of pure clay or with a little amount of grit and calcite inclusions or fine organics, and is perfectly fired. The external surface of almost all the ware is perfectly burnished. The internal surface is smoothened or bears burnished stripes. Morphologically this ware also matches the examples of the classical Kura-Araxes pottery and reflects a three-parted construction. Hemispherical handle is located on shoulder. This pottery group bears decorations like round impression on the base of the handle – close to the rim, and relief oblique short bands on body (Pl. II/10). It is also important to mention the presence of an incised sign on body of a light-brown burnished pot (Pl. II/11). Besides this high-quality Kura-Araxes-like ware there's also a small amount of thick-walled pottery fragments with black external surface covered with a silvery gloss (Pl. II/5). The internal surface of these potsherds is white or beige. In contrast to the thin-walled pottery, made of almost pure clay, these fragments are made of clay, tempered with gravel and grog. According to the petrographic analysis, performed by Mark Iserlis from the University of Tel Aviv (Israel), these two types of the Kura-Araxes-like ceramics are made of local clay.

The similar situation is observed at the synchronous site of Ovchulartepe, where the vessels with characteristics of the Kura-Araxes culture ceramics are present in the horizon dated to 4300-4000 cal. BC.

Fragments of imported ware are also found among the pottery of the Horizon III. Technological features of the imported examples are very similar to the technological features of high-quality samples of Kura-Araxes-like ceramics from the same Horizon of Areni-1. These lightweight, thin-walled potsherds are pinkish, orange, light brown, brown and have black polished external and burnished internal surface.

Taking into account all these findings coming together in the same context in Horizon III of Areni-1, we can assume that ceramics with the Kura-Araxes characteristics are a product of imitation of the imported high-quality polished and burnished ware (the origin of which is still unknown) and synthesis of its technological features and local morphological signs. The study of the ceramic complexes of the following habitation periods at the site of Areni-1 shows that this ware continued the formation, maintaining and developing its technical-technological and morphological features, and in the final phase of the Late Chalcolithic (3700-3400 BC) when its formation is completed, it appears as a well-known classical Kura-Araxes ware of the Early Bronze Age.

However, noteworthy, that in the horizons of the final phase of the Late Chalcolithic of Nerkin Godedzor none of the classical Kura-Araxes pottery examples were found.

მტკვარ-არაქსის კულტურის სამეთუნეო ტრადიციების წარმოშობის საფუძვლები

დიანა ზარდარიანი

არქეოლოგიის და ეთნოგრაფიის ინსტიტუტი
სომხეთის მეცნიერებათა ეროვნული აკადემი

რეზიუმე

მტკვარ-არაქსის კულტურის ქრონოლოგიური ჩარჩოების შესახებ მსჯელობა დიდი ხანია მიმდინარეობს და ეს საკითხი კვლავ ღიად რჩება. ერთ-ერთი მოსაზრების მიხედვით ადრე ბრინჯაოს ხანას ენეოლითური საწყისები აქვს. ეს მოსაზრება გამყარებულია სამხრეთ სომხეთში მდებარე არენი-1-ის გამოქვაბულის გათხრებიდან მოპოვებული მასალის შედეგად, სადაც ენეოლითური და მტკვარ-არაქსული კერამიკის ნიმუშები ერთად აღმოჩნდნენ გვიან ენეოლითურ ფენებში. ჯერჯერობით შესწავლილია გვიან ენეოლითური ხანის სამი ფენა, რომლებიც კალიბრირებული 14C თარიღებით მიეკუთვნებიან ძვ. წ. 4300-3400 წწ. სამეთუნეო წარმოების ზოგიერთი ნიმუში გენეტიკურ კავშირს ავლენს გვიან ენეოლითურ ხანასა და მტკვარ-არაქსის კულტურას შორის. აღნიშნულ თიხის ჭურჭლებს აქვთ ან მტკვარ-არაქსისთვის დამახასიათებელი მორფოლოგიური ნიშნები (ცილინდრული ყელი, მომრგვალებული და მცირედ გადაშლილი პირი, ნახევრადსფერული ყური), ან იმეორებენ გვიან ენეოლითური კერამიკის ფორმებს. ეს უკანასკნელი კარგად არის გამომწვარი, ისევე როგორც ადრე ბრინჯაოს ხანის მტკვარ-არაქსული სამეთუნეო პროდუქციის ნაწარმი. აგრეთვე აღსანიშნავი და მნიშვნელოვანია, რომ არენი-1-ის მესამე ჰორიზონტის მტკვარ-არაქსის კერამიკის ნიმუშები ტექნიკური და ტექნოლოგიური მახასიათებლებით ემსგავსებიან იმპორტული თიხის ჭურჭლის ნაწარმს, რომელიც ამავე ძეგლზე აღმოჩნდა. სავარაუდოდ ეს გარემოება გამოწვეულია მაღალხარისხოვანი იმპორტული პროდუქციის (ნაპრიალები და კარგად გამომწვარი) იმიტაციით (აღნიშნული კერამიკის წარმომავლობა ჯერჯერობით უცნობია), და მისი ტექნოლოგიური მახასიათებლების ადგილობრივ ფორმებთან სინთეზით. ამ პერიოდის კერამიკული კომპლექსების შესწავლა არენი-1-ის გამოქვაბულიდან გვიჩვენებს, რომ აღნიშნული თიხის ჭურჭელი აგრძელებს ტექნიკურ და მორფოლოგიურ განვითარებას და გვიან ენეოლითის პერიოდის ფინალური ფაზის (ძვ. წ. 3700-3400) დროს ჩნდება ადრე ბრინჯაოს ხანის მტკვარ-არაქსის კულტურის ცნობილი კლასიკური თიხის ჭურჭელი.

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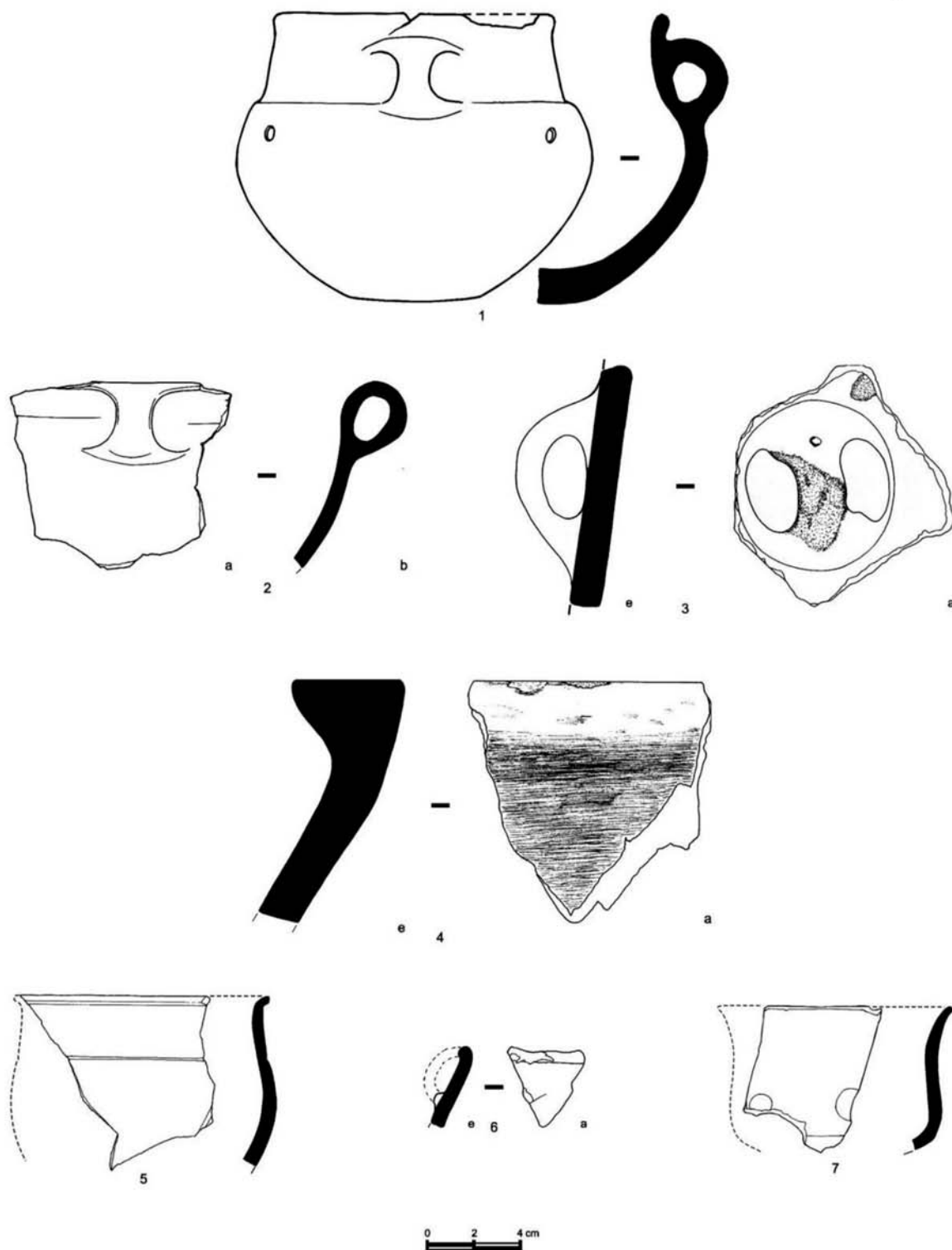
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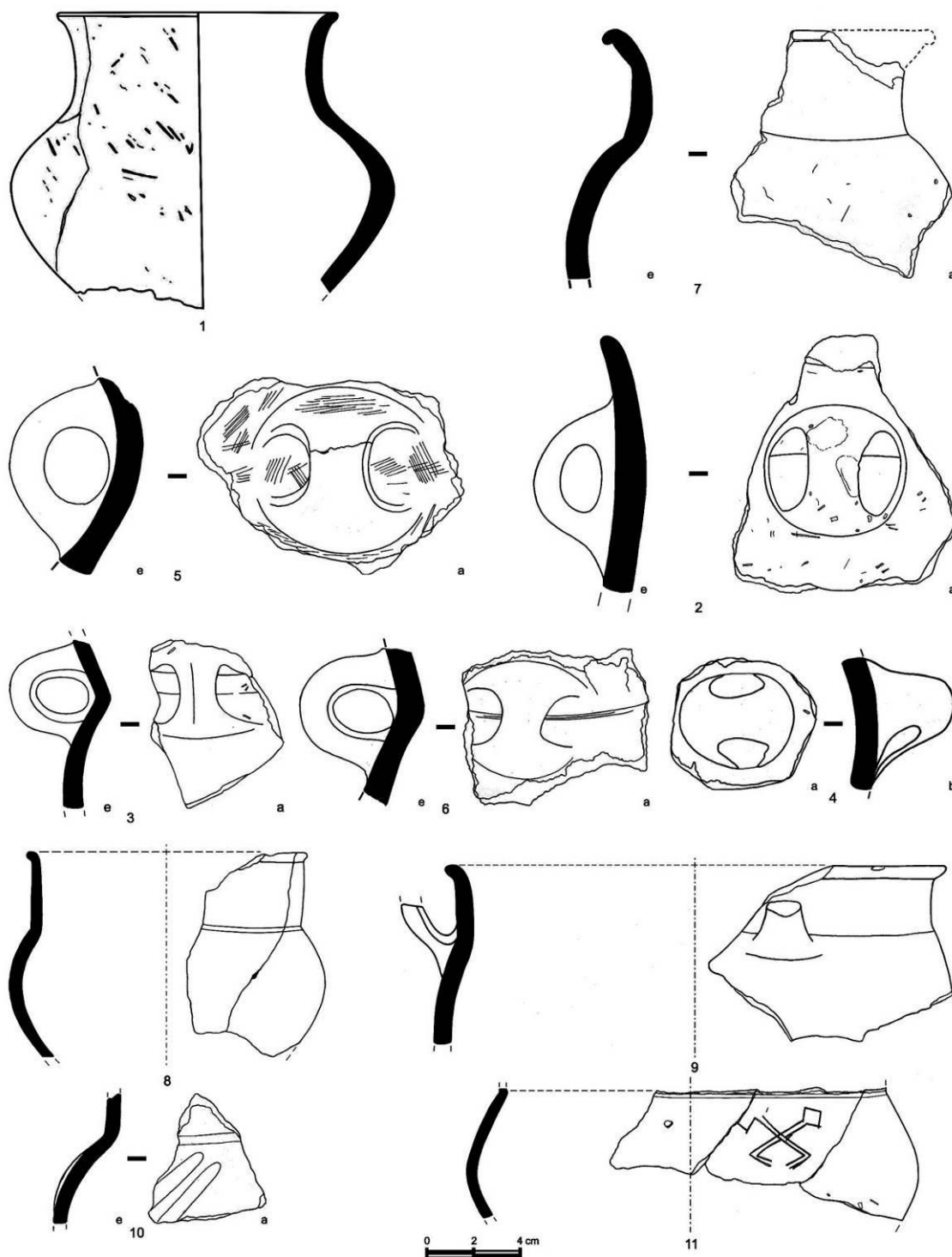
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Fig. I.



Areni-1 cave. The First Chalcolithic Horizon (3700-3400 cal. BC).

Fig. II.



1-4. The Second Chalcolithic Horizon (4000-3800 cal. BC).

5-11. The Third Chalcolithic Horizon (4300-4000 cal. BC).