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NEW DATA ON DATING OF THE EARLIEST CULTURAL LAYER AT CİĞDEMTEPE MOUND¹

Çiğdemtepe Höyüğündeki En Erken Kültür Tabakasının Tarihlendirilmesine İlişkin Yeni Veriler

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Abstract

This study covers the dating of the ceramic finds from the earliest cultural layer at Çiğdemtepe Mound, one of the significant Early Bronze Age Kura-Araxes settlements in the Bayburt region, located in Northeastern Anatolia. The prime craftsmanship of Kura-Araxes culture, which emerged towards the end of the 4th millennium BC and prevailed in a wide area extending from Trans Caucasia to East and Northeast Anatolia, and from there to the Levant, is the Red-Black Burnished Ware. The form and color contrast in handmade pottery exhibit some variability within the expanse of this culture. Also, its distinctive architecture is notable, particularly house designs with circular plans. Today's Bayburt region was under the influence of this culture, especially in the Early Bronze Ages. In the archaeological surveys and excavations carried out in the region, significant data belonging to the Kura-Araxes Culture have been obtained. Ciğdemtepe Mound also contains many elements of the material culture of Kura-Araxes. The light-colored Black-Topped Ware group may be the most significant archaeological find with its black burnished inner surface and brown-terracotta outer surface, which was revealed in the same layer as the Kura-Araxes ceramics. In this context, the aim of this paper is to date the ceramics based on the results of radiocarbon analysis of the charred wood samples taken from here which were found in the earliest cultural layer of the Çiğdemtepe Mound during the 2020 excavations. In addition, the proposed chronological framework is supported by typological comparisons with similar ceramic groups found in stratigraphically well-defined cultural layers previously documented by archaeological excavations

Keywords: Early Bronze Age, Kura-Araxes Culture, Black-Topped Ware, Red-Black Burnished Ware, Çiğdemtepe Mound, Radiocarbon Dating

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Öz.

Bu çalışma, Kuzeydoğu Anadolu'da yer alan Bayburt bölgesindeki Erken Tunç Çağı Kura-Aras yerleşimlerinden önemli biri olan Çiğdemtepe Höyüğü'ndeki en erken kültür tabakasına ait seramik buluntularının tarihlendirilmesini kapsamaktadır. MÖ 4. binyılın sonlarına doğru ortaya çıkan ve Trans Kafkasya'dan Doğu ve Kuzeydoğu Anadolu'ya, oradan da Levant'a kadar uzanan geniş bir alanda egemen olan Kura-Aras kültürünün başlıca öğelerinden biriside Kırmızı-Siyah Açkılı Seramiktir. El yapımı çanak çömleklerdeki form ve renk kontrastı, bu kültürün yayıldığı alan içinde bazı değişkenlikler göstermektedir. Ayrıca, özellikle dairesel planlı ev tasarımları olmak üzere kendine özgü mimarisi dikkat cekicidir. Günümüz Bayburt bölgesi, özellikle Erken Tunç Çağları'nda bu kültürün etkisi altında kalmıştır. Bölgede yapılan arkeolojik yüzey araştırmaları ve kazılarda Kura-Aras Kültürü'ne ait önemli veriler elde edilmiştir. Çiğdemtepe Höyüğü, Kura-Aras kültürüne ait birçok somut öğeyi de içermektedir. Black Topped Seramik grubu, siyah cilalı iç yüzeyi ve kahverengi dış yüzeyi ile Kura-Aras seramikleriyle aynı katmanda ortaya çıkarılan en önemli arkeolojik buluntu olabilir. Bu bağlamda, bu makalenin amacı, 2020 kazıları sırasında Çiğdemtepe Höyüğü'nün en erken kültür katmanında bulunan kömürleşmiş ahşap örneklerinin radyokarbon analiz sonuçlarına dayanarak seramikleri tarihlendirmektir. Ayrıca önerilen kronolojik çerçeve daha önce Arkeolojik kazılarla belgelenmiş, stratigrafik olarak iyi tanımlanmış kültür katmanlarında bulunan benzer seramik gruplarıyla yapılan tipolojik karşılaştırmalarla desteklenmiştir.

Anahtar Kelimeler: Erken Tunç Çağ, Kura-Aras Kültürü, Black Topped, Kırmızı-Siyah Cilalı Mal, Çiğdemtepe Höyüğü, Rayokarbon Tarihleme

1- INTRODUCTION

The aim of this study is to; it was based on a typological comparison of Early Bronze Age ceramics recovered from layers unearthed during the Çiğdemtepe Mound excavations with similar ceramic finds from other settlements. In addition, the radiocarbon analysis results of the charred wooden remains obtained from the mound layers played a critical role in the ceramic comparisons.

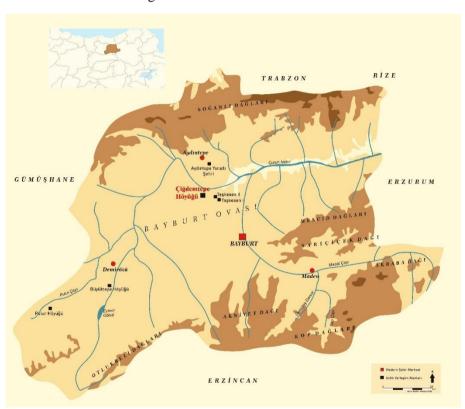
Bayburt (Map)(Çiğdem, 2013: 65)², one of the cities of the Upper Çoruh Basin, which has hosted many civilizations and cultures through the course of history, is abundant in terms of fresh water and underground resources (Ünsal, 2006: 20; Ünsal, 2014: 88; Çiğdem, 2007: 98,100)³, fertile agricultural lands, and transhumance activities that still continue today. The city is located in the transition zone (Sagona, 1990: 425-426; Çiğdem *et al.*,

² The name of the city was Domana during the Urartian period. The name of the city is mentioned as Gymnias in Xenophon's Anabasis. Bayburt in Medieval sources: Babard and Paypert; It is referred to as Bayberd, Payper, Paiperter and Paypert in Byzantine sources. In Ottoman sources, the name of the city is mentioned in today's usage (Koksal, 2011: 1; Bryer-Winfield, 1985:14).

³ After the Assyrian King Tiglath Pileser III's expedition in 743 BC, the underground resources under the control of the Urartian State were subdued by the Assyrian State, forcing the Urartians to discover new mineral reserve areas. One of these fields is the silver and copper mine field in Bayburt/Maden. Apart from copper and silver, the existence of iron, chrome and lignite deposits in and around Bayburt is also known.

2018: 243, 245-247, 252-253)⁴ bridging the Black Sea with the Caucasus via Eastern Anatolia through natural passages and valleys.

These geographical features of the region also enabled the presence of Kura-Araxes Culture in the Bayburt Region. Thus, the ceramics and radiocarbon readings obtained within the scope of the excavations at Çiğdemtepe Mound are of great importance as they yield the traces of Kura-Araxes Culture in the region.



Map: Bayburt Region.

The successive communities of the Kura-Araxes Culture, which inhabited in a vast area approximately from the middle of the 4th millennium

⁴ It is inevitable that Gümüşhane and Bayburt regions were used for the transition from Trapezos (Trabzon), which was a kind of supply center, to the inner regions of Eastern Anatolia during the campaigns of Rome against Armenia and Parthians. Besides, Bayburt Region in the north of the Euphrates River, which is the natural border between Parth and Rome, must have become an important region in this period.

BC to the 2nd millennium BC, adopted a nomadic or semi-nomadic lifestyle (Takaoğlu, 2000: 11; Işıklı, 2011: 37; Marro, 2011: MAP 1). Two basic plan types – round and rectangular-square— can be observed in the architecture of this culture. However, it is known that the architectural structures of the round or oval plan, in which the early period architecture of the culture was mostly constructed by using mud sealing layer and branch techniques together with adobe, were used extensively in Transcaucasia (Hauptmann, 2003: 22-24; Işıklı, 2011: 79). Yalçın asserts that these types of structures were suitable for the architectural requirements of nomadic communities whose livestock activities were the main source of livelihood (Işıklı, 2011: 79; Yalçın, 2020: 172, Fig. 2). Kwatzkhelebi, Kültepe and Schengawit are main centers where architectural structures of this type are spotted (Sagona, 1984: 46; Işıklı and Ergürer, 2017: 45).

The most special group of material assemblages of the Kura-Araxes Cultural Phenomenon is pottery, which is generally handmade as a domestic production model. According to the available sherds of evidence, the production of ceramics has been carried out by three different methods. Işıklı states that these techniques are "ring or slab building/coiling technique, shaping by hand and fabric marking technique". He adds that the ring or slab building/coiling technique was commonly utilized in Kura-Araxes ceramics unearthed in Erzurum and Bayburt regions (Işıklı, 2005: 211; Işıklı, 2007: 327-328; Sagona and Zimansky, 2009: 148; Işikli ve Öztürk, 2019: 16-17). The pottery clay inclusions are large in large-sized vessels and small in small vessels (Arsebük, 1976: 83-84; Işıklı, 2005: 163; Yaylalı, 2007: 174). The ceramic paste is generally composed of stone, plant remains, mica, lime, sea shell and obsidian crumbs (Isıklı, 2007: 328; Isıklı ve Öztürk, 2019: 17). There is variation between the clay and outer surface colors of ceramics. The clay colors range from black to brown and from brown tones to gray and buff colors. It is noted that the color change and formation in the clay colors are caused by the temperature differences during the firing of the ceramics (Işıklı, 2005: 160; Yaylalı, 2007: 174-175).

Although the contrast of outer black, inner red or brown color is common in Eastern Anatolia, it appears as an early feature (Palumbi, 2008: 15). On the other hand, in some examples, this color contrast can be seen in the application of a light color on the outside and a dark color on the inside (Işıklı, 2005: 158, 160; Yaylalı, 2007: 175; Korucu, 2012: 63-64). The form repertoire in the assemblages of the Kura-Araxes Cultural Phenomenon is not diverse. Mainly, pottery and jars are significant. However, with the effect of regional differences, bowls, trays, lids and pot-stands appear as subgroups that

constitute the form repertoire (Yaylalı, 2007; 176; Can, 2010: 80).

Decorations are the most important element in Kura-Araxes ceramics with their cultural characteristics. They are created using three different techniques. These are: "embossing", "scraping" and "grooving" techniques (Ünsal, 2006: 74; Can, 2010: 80; Işıklı, 2011: 73; Işıklı and Akarsu, 2014: 432; Yiğitpaşa, 2016: 47; Işıklı *at al.*, 2019: 320). The decoration repertoire of Kura-Araxes Culture is shaped within the framework of two main patterns. Geometric motifs and shapes comprise the first of these patterns. The other is compositions consisting of stylized natural motifs. The most common elements in geometric shapes and motifs are parallel straight and wavy lines, various zigzags, triangles, checkerboard motifs, crosses, equilateral triangles, quadrilaterals, assorted broken lines, spirals, concentric circles, and complex geometric shapes. Plant and animal figures predominate in the stylized natural composition (Yaylalı, 2007: 175; Can, 2010: 80; Işıklı, 2011: 75; Yiğitpaşa and Can, 2012: 281).

Another prominent application in the ceramic tradition of Kura Araxes Culture is the carefully slipping and high-quality burnishing. Burnishing has been generally applied on the outer surfaces of ceramics since the early periods of this culture throughout Eastern Anatolia. The professionally applied burnishing process can create a metallic shine on the outer surfaces. This quality burnishing ensures that the ceramics gain a slippery and shiny appearance (Işıklı, 2005: 522; Yaylalı, 2007: 175; Korucu, 2012: 64). It can be applied on a single surface of ceramics as well as on both surfaces (Işıklı, 2007: 329; Işıklı, 2011: 70).

During the 2020 excavations at Çiğdemtepe Mound, the pottery belonging to the Kura-Araxes Cultural phenomenon was found from the same deposit; the outer surface was light colored and the inner blackness tends to excess asymmetrically from the lip to the body on the outer surface. Both surface treatments and morphological features reveal that this belongs to the ware group called *Black-Topped Ware* in the archaeological literature⁵. *The Black-Topped Ware* group can be seen in different areas and periods. Black-Topped ware group, which is commonly encountered in Anatolia, especially in Western and Central Anatolia, is also encountered in Egypt and the Balkans

⁵ Sarı stated that the pottery recovered from Çiğdemtepe Mound with a black inner surface and a light-colored outer surface are Black-Topped wares. She also underlined that the local features are prominent in the Black-Topped wares of Çiğdemtepe Mound. Personal interview with Associate Professor Deniz Sarı. Fidan states that these potteries recovered from Çiğdemtepe Mound are similar to Küllüoba and Demirci Mound Black-Topped bowls. Personal interview with Associate Professor Erkan Fidan.

in the Neolithic Period (Dengiz, 2019: 16) This ware group, which has been seen in the Central Black Sea, Western Anatolia and Central Anatolia since the Late Chalcolithic Age, is seen in Cyprus during the Early Bronze Age (Ay, 1998: 36-37; Sarı, 2007: 647; Dengiz, 2019: 17; Kılıç, 2021: 111).

The most distinctive feature of the Black-Topped Ware group is the surface treatments. The inner surfaces of the ceramics of this ware group are generally black and burnished. On the outer surfaces, burnishing is not seen most of the time. A smooth or roughly smoothed process is observed on the outer surfaces that are not burnished. The blackness on the inner surfaces of the vessels outweighs unevenly from the lip to the body. Colors ranging from beige to brown and terracotta can be seen in the parts other than the outer black area (Sarı, 2004: 20). The coloration on the inner and outer surfaces of the ceramics is related to the kiln conditions during the firing of the ceramics and the positions of the vessels (Seeher, 1987: 109; Dengiz, 2019: 22-23). In the Black-Topped Ware group, bowls consisting of sub-form groups depending on the rim and profile shape stand out as forms (Dengiz, 2019: 19). Motifs made with grooving technique are observed in the decoration repertoire of this group. In particular, intertwined half and full circles, "V" motifs, floral and chevron motifs can be noticed on the inner surfaces of the bowls (Sarı, 2007: 653; Picture 1: 5-12; Palumbi, 2012: 270-271; Dengiz, 2019: Picture 1: a-b, j, 1; Picture 2: a-b, d).

Conducting archaeological excavations in an interdisciplinary way is essential in terms of enhancing the consistency and reliability of the data obtained. At this point, the results of the analysis of the carbon samples taken from the deposits make a significant contribution to the dating of the archaeological materials. To this end, the archaeological materials unearthed during the excavations at Çiğdemtepe Mound in 2020 were substantiated with the age determination of the carbonized wood residues taken from three different deposits, and they yielded significant results. Samples taken from the deposits as a result of excavations in Area B, F-8 square grid of the mound yielded two different periods, one of which was in two phases. These periods are the Early Bronze Age IA-B and the Middle Ages⁶.

2- LOCALIZATION OF ÇIGDEMTEPE MOUND

Çiğdemtepe Mound takes its name from Çiğdemtepe village, which is located in the south of the Mam Stream, which divides the Aydıntepe Plain

⁶ The samples were analyzed at the Scientific and Technological Research Council of Turkey, Marmara Research Center, Earth and Marine Sciences Institute. Analysis results of samples with registration number 217/41 were reported on 15/09/2021.

into two. It is positioned in the east of Çiğdemtepe village, in the south of Aydıntepe county, 11 kilometers northwest of the central district of Bayburt, 15 kilometers from Bayburt and 1 kilometer from Arpalı Town. The mound is situated at the western end of a natural plateau extending from east to west. The northern half of the mound has been exposed to illegal diggings. (Picture 1-2)⁷.



Picture 1: The picture Sagona's took.



Picture 2: Looted Trench at F-8 Square Grid. View Before the Excavation.

⁷ Aydıntepe Plain is one of the four plains that make up the Bayburt Plain. For detailed information on the Bayburt region, see: (Karakoyunlu, 1990: 4-5; Özey, 1994: 437-495; Sagona and Sagona, 2004: Fig. 12/1, 121, 321; Ünsal 2006: 167; Adak, 2016: 17; Çiğdem and Emir, 2017: 21-22; Ünsal 2018, 46. Strabon, "Antik Anadolu Coğrafyası", 40.). It is called "Tomla-i Süfla / Aşağı Tomla" in the Ottoman Period (Özger, 2007: 209).

3- RESEARCH HISTORY AND EXCAVATIONS AT CIĞDEMTEPE MOUND

Kökten, who laid the foundations of archaeological studies in the Bayburt region in the 1940s, acknowledges that as a result of the surveys he conducted in the Aydıntepe plain, he did not find any cultural artifacts belonging to the Prehistoric Age (Kökten, 1944: 465-486). Sagona was the first scientist to reveal the archaeological potential and cultural richness of the region with extensive surveys (Sagona, 1990: 425-430; Sagona, 1992: 397-403; Sagona, 1993: 261-268) and excavations (Sagona and Sagona, 2004). Sagona, who discovered Ciğdemtepe Mound in 1990 and brought it to the archaeological literature, evaluated the settlement in the category of smallscale mounds and noted that the mound suffered from illegal excavations with heavy construction machinery (Picture 1). In addition, in the light of the data he gathered, he divided the mound into three different periods chronologically. These are: Early Bronze Age, Iron Age and Middle Ages and later (Sagona and Sagona, 2004: 121, Fig. 13:1, 321, Fig. 14:1). In another study, the same team, who evaluated the ceramics on the surface of the mound, argues that the black, red and brown polished wares are Kura-Araxic wares and based on these data, they contend that the mound was inhabited in the EBA (Sagona, 1992: 398).

The first excavation work carried out in 2018 at Çiğdemtepe Mound under the auspices of the Bayburt Museum Directorate lasted twelve days. The short-term excavation focused on the trench where the vault remains are positioned as reported by Sagona. During the excavations, it was reported that the alluvium, debris flow and stone material in the interior of the architectural remains were partially removed, and the vault remains and the associated rock cavity could not be reached thoroughly. Therefore, it has been stated that it is very challenging to determine for what purpose the vaulted structure and the architectural elements associated with it were used. Besides, it has been affirmed that the terracotta material (amorphous and profiling ceramic pieces) coming from the periphery of the destroyed part of the "tunnel" on the surface has the characteristics of the Middle Ages and Early Bronze Ages⁸.

Excavations at Çiğdemtepe Mound continued in 2020 under the

⁸ Information about the 2018 excavations carried out under the auspices of Bayburt Museum Directorate was obtained from the excavation result report written by the Bayburt Museum Director, Archaeologist A. BEDİR. The "2018 Bayburt Çiğdemtepe Mound Salvage Excavation Final Report" (2018 Yılı Bayburt Çiğdemtepe Höyüğü Kurtarma Kazısı Sonuç Raporu) dated 15.11.2018 and numbered 2, which has not yet been published, is in the digital and file archive of the Bayburt Museum Directorate.

direction of Bayburt Museum Directorate. In the first stage, the mound area was divided into grid squares measuring $10\,\mathrm{m}\,\mathrm{x}\,10\,\mathrm{m}$, and the site datum point, which intersects the mound at two points, was determined. In addition, the height of the mound's summit above sea level was measured as 1617.15 meters.



Picture 3: Architectural Remnants of Layer IIB.

As a result of the excavations carried out in the trench (Picture 2) which suffered from illegal excavations in the F-8 grid square; Wall No 1, consisting of 5-6 rows of stone foundations, 7-8 rows of mud-brick blocks and a height varying between 2.5-3 meters were uncovered.



Picture 4: A General view of the Excavation Site.

The wall rises above the foundation layer consisting of a single row of stones, in which yellow core mud mortar is used, with a height of 0.30 m (Picture 3). Existing remains of Wall No. 1 points that the wall extends to the west (Drawing, Picture 4). Also, it extends in east-west direction to another wall, which we define as wall No. 2, at the eastern end of the trench. They exhibit similarities regarding the construction materials utilized.



Picture 5: Architectural Remnants of Layer IIA.

Wall No. 2 extends in the north-south direction (Picture 5). The foundation of the wall consists of randomly arranged slate stones. The adobe blocks of this wall are smaller in size than the wall No. 1, they are half the size and their colors are different. No flooding was observed on the wall No. 2 extending towards the center of the mound.



Picture 6: Floor Structure No.1.

At the foundation level of Wall No. 2 and in the section between Wall No. 1 and Wall No. 2, at 1614.34 elevation, a floor structure consisting of compressed soil was unearthed (Picture 6). While the part to the south of the floor structure No. 1 was exposed to modern destruction, the other part must have been carved during the construction of the foundation part of the Wall No. 1. A large number of amorphous and profiled sherds belonging to mainly small sized vessels with Black-Topped Ware were found on the base plane. Burnt wood remains were also detected on the same floor. A sample from these remains yielded 3096-2913 BC (Graph). A weak medieval architecture was marked in the east of the Wall No. 2 from the foundation level. A large number of glazed Medieval ceramic fragments were found inside this wall structure, which we define as Wall No. 3, in which semi-processed local limestones were used. The analysis of a radiocarbon sample taken from 1614, 12 elevations within this weak architecture also yielded 1301-1370 AD (Graph).

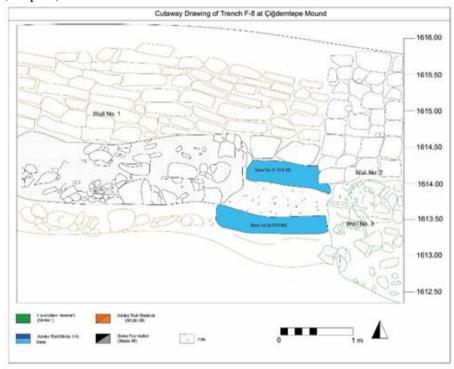
Some parts of the Wall No. 3, which is the foundation wall, extend under the wall No. 2. Although the analysis result of the radiocarbon sample taken from the core part of Wall No. 3 points to the 14th century AD, there is a possibility that this wall may have a connection with the mudbrick Wall No. 2.



Picture 7: Floor Structure No.2.

Below the floor structure, at 1613.88 elevation, floor No. 2 with a small area was found under the basement layer of the Wall No. 1 (Drawing, Picture 7). On floor No. 2, sherds of pottery and lids similar to those recovered from

floor No. 1 were unearthed. In addition, obsidian pieces, animal bone fragments and carbonized wood remains were found on floor No. 2. Radiocarbon sample taken from this floor structure yielded 3132-3009 BC (Graph 1).



Drawing: Cutaway Drawing of Trench F-8 at Çiğdemtepe Mound.

4- ÇIĞDEMTEPE MOUND CERAMICS

During the excavations at Çiğdemtepe Mound in 2020, the ceramics coming from floor no. 1 and 2 found in the F-8 grid square were evaluated. All of the ceramics from these deposits are handmade. Most of the ceramics coming from floor no. 1 are Black-Topped Ware ceramics. In addition, amorphous Kura-Araxes ceramics were recovered from floor No. 1.

Six pedestal bowl fragments, two carinated bowls, a shallow bowl and a simple profile bowl belonging to the Black-Topped Ware category were uncovered from floor No. 1 (Cat. No. 1-4)⁹.

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⁹ Sagona emphasizes that *omphalos* type *pedestal bowls* and shallow bowls are local forms. Moreover, he underlines the strong local features in the EBA deposit of Büyüktepe Mound.

In pedestal bowl parts, the pinching technique with non-standard heights and diameters protrudes towards the inner surface of the bowl (Catalog 1). The thickness of the rims and the narrow-angled upturns suggest that these pedestals may belong to bowls with a round body. The interior parts of this form group are black and burnished. The outer surfaces are in brown tones and flattened. In this medium-quality fired form cluster, slip-coated can be seen on both surfaces. In terms of both surface treatment and form features, this type of ceramics has been encountered in the Early Bronze Age layers (Sagona et. al., 1991: 157, Fig.8:3; Sagona et. al., 1992: 38, Fig. 4:10) of Büyüktepe Mound, during the survey studies (Sagona, 1993: 264, Fig. 1:5; Sagona and Sagona, 2004: 425, Fig. 110:19, 471, Fig. 133:4, 473, Fig. 134:15, 523, Fig. 159:4, 555 Fig. 175:3) carried out in the Bayburt Region and at Bayburt/Pulur Mound (Kökten, 1944: Levha: 6.:4). Except for the Bayburt Region, this type of pottery was attributed to the VIB1 layer of the Early Bronze Age I (Palumbi, 2017: 122, Fig. 6: i; 123, Fig. 8: b) of Arslantepe, and to the Late Chalcolithic Age layer of Değirmende Mound/Malatya (Burney, 1958: 201, Drawing 242) and Çadır Höyük (Steadman et. al., 2007, 395, Figure 6. A-B). Sagona evaluated these types of vessels within the Ware 3:1-Kura-Araxes [Early Trans-Caucasian]) ware group (Sagona and Sagona, 2004: 168-170).

The shallow bowl recovered from Çiğdemtepe Mound exhibits a completely regional characteristic (Cat.No. 2). Except for the known samples in Büyüktepe (Sagona *et. al.*, 1992: 38, Fig. 4:7,12. Sagona, 1993: 197, Fig. 1:3) and Çayıryolu Tepe (Sagona and Sagona, 2004: 474-475, Fig. 135:1-5) in the Bayburt Region, this type of bowl has not been found anywhere in the sphere of influence of Kura-Araxes culture and in the settlements where the Black-Topped ware group is seen in Anatolia. However, considering the firing and surface treatments, this bowl should be considered as a local Black-Topped Ware group ceramic.

The other form group coming from floor no. 1 is bowls. Bowls with two different forms are categorized as simple profile and carinated bowl. The inner surface of the bowl with a simple profile (Cat. No. 3) is black and bright burnished. The blackness on the inner surface overflows onto the outer surface. No burnout is visible on the outer surface; a smoothed process has been applied instead of burnishing. Slip-coated is seen on both surfaces. Bowls similar to the bowl with a simple profile recovered from floor No. 1 are known from Tepetarla, Danişment/Pulur, Çayıryolu Tepe and Büyüktepe

Işıklı considers this type of bowls as a production of pinching technique (Sagona et. al., 1992: 29-30; Işıklı, 2011: 245-246).

(Sagona and Sagona, 2004: 418-419, Fig. 107: 13-14; 436-437, Fig. 116:1; 470-471, Fig. 133:2, 492-493, Fig. 144:1) settlements in the Bayburt Region. They have been also encountered in Arslantepe (Palumbi, 2017: 122, Fig. 6: h, l-m, q; 123, Fig. 8: a-e), outside the Bayburt Region, and in the Early Bronze Age I layer (Fidan et. al., 2015: 68, Figure 4: B) of Demirci Höyük and Early Bronze Age II layer of Küllüoba (Sarı, 2004: Levha 14:5, Levha 16: 8), where the Black-Topped Ware group is widely dispersed.

Another group of ceramics recovered from floor No. 1 is the carinated bowls (Cat. No. 4). Both pieces have a round lip and an "S" profile. They are in the same form and their inner surfaces are black. The black color on the inner surface has disproportionately exceeded the outer surfaces of the ceramics. Bright burnishing is seen on the inner surface. The outer surface colors are brown in light tones. Mica and sand inclusions are noticeable in the clay. Both pieces were fired at medium scale. No burnout has been noted on the flattened outer surfaces. Bowls of this type are encountered in the Bayburt Region, Taşkesen I and Çayıryolu Tepe I settlements (Sagona and Sagona, 2004: 424-425, Fig. 110: 17, 470-471, Fig. 133: 9).

Two lids belonging to the Red-Black Burnished Ware category, three deep bowls belonging to the Black-Topped Ware category, a carinated bowl with a vertical rim and a bowl with an inverted rim were found on floor No. 2. On the other hand, amorphous ceramic pieces belonging to both ware groups were recovered from floor No. 2 and its surroundings.

The evaluated deep bowls (Cat. No. 5) have round lips. The inner surfaces of the pieces are black and burnished. There are cracks on the inner surfaces of the samples with slip-coated on both surfaces. The outer surfaces are roughly flattened. The black color on the inner surface overflows outward. No burnishing is seen on the outer surfaces. Sand and mica inclusions are observed in the moderately fired samples. On the outer surfaces, light brown is seen, except for the black that protrudes from the inside out. No bowls of this type are encountered in any other settlement in the Bayburt Region, except for Çiğdemtepe Mound. A similar deep bowl of this type is encountered in the settlement of Çoğulhan/Kahramanmaraş (Brown, 1967: 146, FIG. 12: 117).

The vertical rimmed carinated ceramic (Cat. No. 6) recovered from the base No. 2 has a rounded lip. The inner surface of the ceramic is black and burnished, and there is no burnt on the outer surface. The outer surface is roughly flattened and cracks appear. The inner black does not protrude, but a slight blackness on the lip stands out. Sand and mica inclusions are observed in the medium-sized fired piece. Similar ceramics of this type are found in

Pulur Höyük in the Bayburt Region (Sagona and Sagona, 2004: 518-519, Fig. 157:3) Outside the Bayburt Region, they are encountered among the ceramics of the Aşağı Kartal Höyük dated to the Early Bronze Age II, of the Porsuk Basin Mounds (Kılıç, 2021: Levha 60a:6).

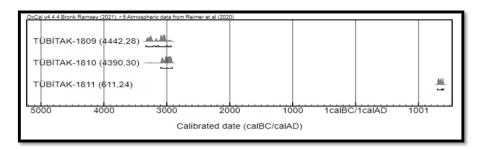
The last piece belonging to the Black-Topped ware group recovered from floor No. 2 is the bowl with an inverted rim (Cat. No. 7). The bowl with black burnished inner surface was fired in medium scale. The blackness on the inner surface overflows onto the outer surface. There is no burnishing on the outside, but it is roughly flattened. Sand and mica were used as inclusions. No bowls of this type have yet been identified in any other settlement in the Bayburt Region, except for Çiğdemtepe Mound. Outside the Bayburt Region, ceramics from the Porsuk Basin Mounds dated to the Early Bronze Age II and Aşağı Kartal Höyük (Kılıç, 2021: Levha 60a: 8) are found in Iznik, Membercik and Yenişehir I settlements (French, 1967: 82, FIG. 19:7; 83, FIG. 20: 37).

The important group of finds recovered from floor No. 2 is the terracotta lids that stand out with their decorations (Cat. No. 8-9). All of the lids exhibit burnishing and slip applications. Black and grayish-black colors are dominant on the upper surfaces with decorations. On the interior surfaces, brown, black, gray, and reddish colors are noticeable. Linear, circular and diagonal lines were engraved on the upper surfaces of the lids with the grooving and scraping technique. The diameters and heights of the lids are not standard. They are flat and disc in form. Lids similar to disc and flat form lids in the Bayburt Region are known from centers such as Büyüktepe (Sagona et. al., 1993: 73, Fig. 3.:4. Sagona and Sagona, 2004: 493, Fig. 144:5), Ballı Kaya, Çayıryolu Tepe, Kilise Tepe, Perakende Tepe and Karaköy (Sagona and Sagona, 2004: 419, Fig. 107: 10; 477, Fig. 136: 1-3; 555, Fig. 175:2; 565, Fig. 180:8; 595, Fig. 195:5) Additionally, they are found in Erzurum Güzelova Höyük (Koşay and Vary, 1967: Lev. XVI, G.310, G.207; Lev. XVII: G. 344, G. 202, G. 349) and Norsuntepe (Sagona, 1984: Fig. 103:1) in the expanse of Kura-Araxes culture, except in Bayburt Region.

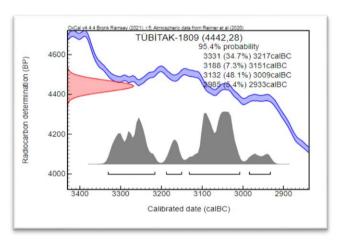
5- RADIOCARBON READINGS

An important part of the 2020 excavations at Çiğdemtepe Mound are the results obtained from radiocarbon samples analyzed¹⁰ from three different levels. It is significant in terms of being the first results obtained after Sagona in the Bayburt Region and they yield very low deviations (Graph 1-3).

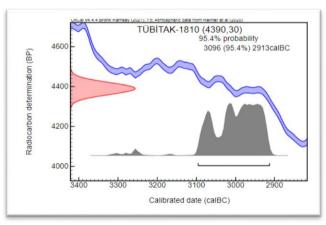
¹⁰ Carbonized wood residues were analyzed by TUBITAK MAM.



Graph 1: Çiğdemtepe Mound, C¹⁴ Analysis Results.



Graph 2: Early Bronze Age IA: Layer IIA.



Graph 3: Early Bronze Age IB: Layer IIB.

According to Sagona's chronology suggestion for Kura-Araxes Culture, it is contended that Çiğdemtepe Mound was inhabited by Kura-Araxes communities during Kura-Araxes I and Kura-Araxes II periods (Işıklı, 2011: 64, Picture 12) Furthermore, these results attested that the mound was inhabited during the Early Bronze Age IA and IB and the Middle Ages. Therefore, according to the data obtained from the excavations at Çiğdemtepe Mound in 2020, two separate layers can be mentioned, one of which has two phases. These layers are the Medieval Layer: Layer I; Early Bronze Age IA: Layer IIA (Graph 2) and Early Bronze Age IB: Layer IIB (Graph 3).

6- DISCUSSION AND CONCLUSION

The Bayburt region was in the sphere of influence of the Kura-Araxes Culture, which characterized Eastern Anatolia in the Early Bronze Ages, and yet, scholars considered it within the Erzurum Region while evaluating it in an archaeological sense (Isıklı, 2011: 244-247).

The mountains and mountain ranges that encompass the northern and eastern borders of the Bayburt Region and partially the southern borders must have played an active role in the cultural transformation and development of the region. While the interaction and communication of the region with the east is mainly provided through natural passages, communication and interaction in the south-west and west is maintained by depression areas, plains, natural roads and passages that are fragmented by rivers, which offer an unhindered transportation network. In this context, it is plausible that the cultural interaction of Bayburt Region with Central Anatolia will be stronger.

The archaeological artifacts and findings gathered from the excavations at Çiğdemtepe Mound in 2020 were obtained from a narrow area. Notwithstanding, these data provided significant results for the region. Two different phases belonging to the Early Bronze Age I period have been revealed by both architectural and ceramic finds. Layer IIA architecture has been attributed to approximately 3096-3070 (2σ) BC according to the results of the analysis of the radiocarbon sample (Tübitak-1810) taken from floor No. 1.11 The fact that the counterparts of Black-Topped Ware ceramics (Cat. No. 1-4) in the Bayburt Region and centers outside the region have been dated to the Early Bronze Age shows the consistency of the radiocarbon readings. In this context, it is possible to date the ceramics recovered from floor No. 1 to the Early Bronze Age I period.

Layer IIB architecture has been attributed to approximately 3132-2933

¹¹ Prof. Dr. Ünsal YALÇIN interpreted and evaluated the calibrated analysis results.

(2σ) BC, according to the results of the analysis of the radiocarbon sample (Tübitak-1809) taken from floor No. 2. Black-Topped Ware and Red-Black Burnished Ware ceramics were recovered from this layer together. It is possible to date the Black-Topped ceramics (Cat. No. 5-7) to the Early Bronze Age I period based on similar samples and radiocarbon readings. Also, it seems probable to attribute the Kura-Araxes lids unearthed from Level IIB to the Early Bronze Age I period in the light of similar examples and radiocarbon readings.

We can observe some variances as well as similar features between the Level IIA Black-Topped Ware group ceramics and the Level IIB Black-Topped Ware ceramics. Dissimilar aspects are visible in the forms. Especially deep bowls and carinated bowls with steep rims differ at this point and these bowls are not seen in Layer IIA. Shallow and pedestal bowl parts are innovations for Layer IIA. In addition, the pedestal bowl pieces that Sagona evaluates in Kura-Araxes ceramics are evaluated in the Black-Topped Ware group in terms of both surface treatments and clay components and firing techniques. In addition, the fact that similar ones have not yet been detected in Anatolia, outside the Bayburt Region, strengthens our assumption that the shallow bowls are local forms. In both layers, sherds of light-colored amorphous ceramics belonging to Kura-Araxes ceramics with a black burnished outer surface and brown to the terracotta inner surface were found.

It is significant that the Kura-Araxes ceramics and the Black-Topped Ware group, which were widely identified in Western and Central Anatolia during the Late Chalcolithic and Early Bronze Ages, were recovered from the same layer. The fact that the Black-Topped Ware group has not yet been identified in the Erzurum Region, apart from Bayburt, brings up another controversial topic. The Black-Topped Ware group has not extended to the Erzurum Region and this can be related to the geographical structure of the Bayburt Region. However, this assumption can be made based on the available data and research, and it should not be forgotten that this argumentation is dynamic. Future excavations in settlements that can yield prehistoric artifacts and findings, especially in the Erzurum Region, may shed light on this matter.

The fact that the samples representing the Black-Topped Ware group are dense in the proportional distribution of the amorphous and profile-bearing ceramic sherds indicates that the Central and Western Anatolian Early Bronze Age cultures were more dominant at Çiğdemtepe settlement. However, it should be held in mind that these results were obtained according to the data from the excavations carried out in a narrow area.

Another significant result reached in the excavations at Çiğdemtepe Höyük in 2020 is the architectural remains, which we think belong to a sophisticated and massive structure. The architecture of Layer IIB, which was heavily destroyed in the south of Çiğdemtepe Mound, and its stone-based mud-brick walls contain features that have not been seen in the East Anatolian and Northeast Anatolian Regions until today, both in terms of height and architectural features.

Both architectural remains and terracotta finds reveal the influence of a dominant local Early Bronze Age culture in the region. In addition, significant differences are observed between Layer IIA architecture and Layer IIB architectural remains. According to the available data, Layer IIB architecture, which we think is the earliest settlement layer of the mound, differs from Layer IIA architecture with a more systematic construction technique and monumentality. Especially the bedrock layer in Layer IIB architecture of the Early Bronze Age settlers of Çiğdemtepe Mound must have emerged as a result of the concerns for insulation purposes.

Consequently, the architectural remains of at least two sub-phases belonging to the EBA period, which were unearthed in the 2020 excavations, have undergone intense destruction at present. Even the stone foundations and mudbrick bodies that survived the damage reveal the eminence of this structure. These architectural and other archaeological artifacts and findings clearly demonstrate the significance of Çiğdemtepe Mound, which could be the convergence spot of eastern and western cultures and the gate of the east to the west.

7- SUMMARY

Bayburt Region has been home to many human communities and civilizations in prehistoric and historical times. Its location and topographical features enabled the region to be used as a road route for both settlement and transit. The rich food resources and fertile agricultural lands of the region contributed positively to the living conditions. These living standards enabled the region to host a dense settlement in prehistoric times, especially during the Early Bronze Age. As a matter of fact, many settlements in the region such as Büyüktepe Höyük, Pulur Höyük and Çiğdemtepe Höyük carry tangible cultural assets that bear witness to the Early Bronze Age.

Excavations at Çiğdemtepe Höyük, one of the key settlements of the region, were initiated in 2018 under the direction of Bayburt Museum Directorate. The excavations in the first season were short-term and focused more on creating the infrastructure for the excavations to be carried out in the

coming years. Comprehensive excavations at the mound started in the 2019¹² season and continued in 2020.

This article includes the identification and evaluation of the ware group called Black-Topped in the literature with the in-sutu ceramic sherds belonging to the Kura-Aras Culture on the floor structures unearthed as a result of the excavations carried out in Çiğdemtepe Mound in 2020. It also includes the results of the analysis of the charred wood remains recovered from the contexts in the sector where the excavations were carried out.

The Kura-Ara Cultural Phenomenon is one of the cultures that existed in the Near East for a long period of time. The most important element in the package of this cultural phenomenon is the handmade, black-red colored pottery with relief, groove and incised motifs. Another characteristic feature of this ware group is the elaborate slip and quality burnishing. On the other hand, the pottery of the Kura-Aras phenomenon was shaped according to the artistic dynamics of the geographical regions where they were identified, and their form and color contrasts varied.

The Black-Topped ware group is a ware group seen in different geographies and periods. This ware group is found intensively in Anatolia, especially in Central and Western Anatolia. The most distinctive characteristic of this ware group, which is found in Egypt, Cyprus and the Balkans, is the surface treatment of the ceramics. The interior surfaces of Black-Topped ceramics are generally black and bright burnished.

This study shed light on the Early Bronze Age of the Bayburt Region. The finds and findings from the rescue excavations of Çiğdemtepe Mound and the radio carbon analysis results of the charred wood remains taken from the sequences of the mound have provided us with important results to illuminate the Early Bronze Age of the region.

As a matter of fact, it is understood that the region was in intense interaction and communication with Central Western Anatolia during the Early Bronze Age, and towards the end of the period, it interacted with the Kura-Aras Culture. This study aims to concretize this interaction and communication and has made significant contributions to the archaeological infrastructure of the region.

It is noteworthy that handmade ceramics belonging to the Black-Topped Ware group were found in the same layer with materials belonging to

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¹² For detailed information on the excavations at Çiğdemtepe Mound in 2019, see Akyüz, 2022.

the Kura-Aras culture. Radiocarbon analyses on carbonized wood samples indicate that these ceramics date to the early 3rd millennium BC. The findings were supported by comparisons of similar ceramics in other settlements with stratigraphic context. This study contributes to a better understanding of the local character of the Kura-Aras Culture in Eastern Anatolia and the spread of Black-Topped Ware.

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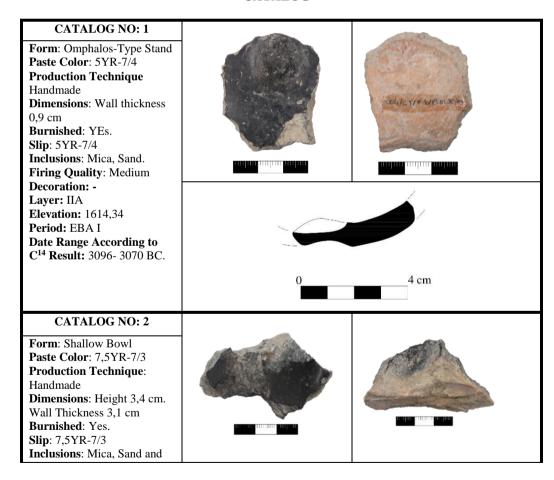
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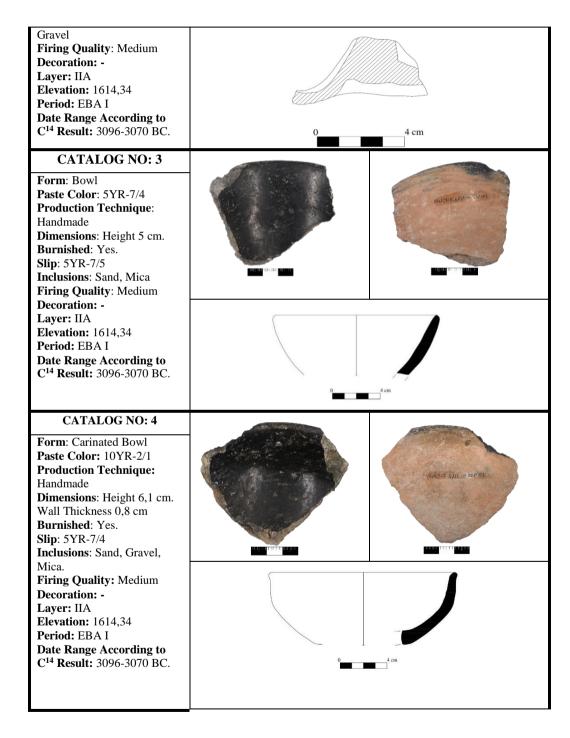
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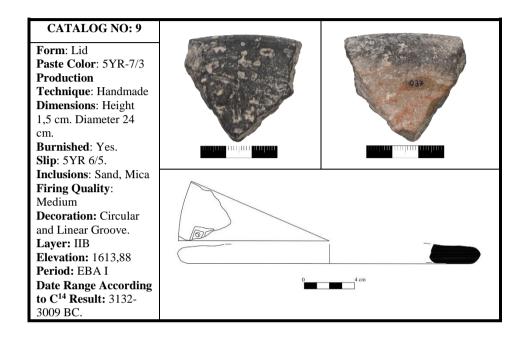
CATALOG





CATALOG NO: 5 Form: Deep Bowl Paste Color: 7,5YR-7/4 **Production Technique:** Handmade **Dimensions**: Height 3,2 cm. Wall Thickness 1,2 cm Burnished: Yes. **Slip**: 7,5YR-7/3 Inclusion: Sand. Firing Quality: Medium **Decoration: -**Layer: IIB **Elevation:** 1613,88 Period: EBA I **Date Range According to** C¹⁴ Result: 3132-3009 BC. CATALOG NO: 6 Form: Vertical Rimmed Carinated Bowl Paste Color: 10YR-2/1 **Production Technique:** Handmade **Dimensions**: Height 3,1 cm. Wall Thickness 0,6 cm Burnished: Yes. uuu nidaa uuuu иши пијин шиш **Slip**: 7,5YR-6/3 **Inclusion**: Sand, Mica Firing Quality: Medium **Decoration: -**Layer: IIB **Elevation:** 1613,88 Period: EBA I **Date Range According to** C¹⁴ Result: 3132-3009 BC.

CATALOG NO: 7 Form: Bowl with an Inverted Rim Paste Color: 7,5YR-Production **Technique:** Handmade **Dimensions**: Height 3.7 cm. Wall Thickness uluu uuluu uuluu wan majan <mark>wa</mark>jw 0,7 cm Burnished: Yes. **Slip**: 7,5YR-7/3 Inclusions: Sand, Mica Firing Quality: Medium Decoration: -Layer: IIB **Elevation:** 1613,88 Period: EBA I **Date Range According** to C¹⁴ Result: 3132-3009 BC. **CATALOG NO: 8** Form: Lid 14/CT/F-8/14,88.00 Paste Color: 7,5YR-7/2 Production Technique: Handmade **Dimensions**: Height almi antira antim 1,7 cm. Diameter 13 cm Burnished: Yes. Slip: 7,5YR-7/2. Inclusions: Sand, Gravel Firing Quality: Medium **Decoration:** Linear Groove Layer: IIB **Elevation:** 1613,88 Period: EBA I **Date Range According** to C¹⁴ Result: 3132-3009 BC.



Çatışma beyanı: Bu çalışma ile ilgili taraf olabilecek herhangi bir kişi ya da kurum ile finansal ilişkilerimizin bulunmadığını dolayısıyla herhangi bir çıkar çatışmasının olmadığını beyan ederiz.

Destek ve teşekkür: Çalışmada herhangi bir kurum ya da kuruluştan destek alınmamıştır. Varsa kurum veya kişiler belirtilir.

Katkı Oranı Beyanı: Prof. Dr. Ali Yalçın TAVUKÇU %50; Uzman Erman AKYÜZ % 50.