

PROJECT ArAGATS: 10 YEARS OF INVESTIGATIONS INTO BRONZE AND IRON AGE SITES IN THE TSAGHKAHOVIT PLAIN, REPUBLIC OF ARMENIA

ArAGATS PROJESİ: ERMENİSTAN TSAGHKAHOVIT OVASI'NDA 10 YILDIR SÜRDÜRÜLEN TUNÇ VE DEMİR ÇAĞI ARAŞTIRMALARI

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ABSTRACT

Since 1998, Project ArAGATS has conducted systematic investigations of the archaeological landscape of the Tsaghkahovit Plain in central Armenia. This contribution surveys the primary findings for three eras of extensive occupation of the region: the Early Bronze Age, the Late Bronze Age, and the Iron 3 (Achaemenid) period. Of particular importance to the wider archaeology of the South Caucasus are the new insights that this work has provided into the inter-relation of sites within a broad regional landscape and critical new perspectives on key problems that had long plagued efforts at building material chronologies. Additionally, our investigations have been dedicated to shedding new light on the contours of social and political life in Early Bronze villages, Late Bronze Age fortified centers, and Iron 3 towns.

ÖZET

Erken ve Proto Neolitik Dönemlerde Ermenistan'da yerleşim olduğu bilirse de arkeolojik veriler yoğunlukla İlk Tunç (MÖ 3500 - 2400), Son Tunç (MÖ 1500 - 1200) ve Demir Çağ 3 (Ahamenid, Pers Hanedanlığı, MÖ 600 - 300) dönemlerine aittir. Bu makaleyle Tsaghkahovit Ovasında uluslararası ArAGATS projesi tarafından son sekiz yılda yürütülen arkeolojik araştırmalar özetlemektedir.

İLK TUNÇ ÇAĞI

Gegharot İlk Tunç Çağı tabakalarında çanak çömlek açısından farklılık gösteren iki ayrı yerleşim dönemi saptanmıştır. Bunlardan İlk Tunç Çağı I dönemine ait olan kültür katında "Elar-Aragats" türü çanak çömlek ve iki odalı konut yapılarının taş temelleri bulunmuştur. İlk Tunç Çağı II dönemi ait kültür katında ise "Karnut-Şengavit" tipi çanak çömlek, yapı kalıntıları ve mezarlar saptanmışsa da, bu kalıntılar yangın geçirmiş olan İTÇ I tabakaları kadar korunmamıştır.

Gegharot'da bulunan İTÇ çanak çömleği üzerinde yapılan değerlendirme, bölgedeki çanak çömleğin gelişim süreci ve özellikle Ermenistan'daki Kura-Aras buluntu topluluğunun yeniden gözden geçirilmesini gerektirmiştir. Gegharot'dan alınan radyokarbon örnekleri "Karnut-Şengavit" çanak çömleğinin daha önceden düşünüldüğü gibi İTÇ III'e yani 2600-2400 arasına tarihlenmediğini göstermiştir. Ayrıca yapılan çalışmalar İlk Tunç Çağı'nın yaşam biçimi ele alındığında, aynı yerleşimde ayrı mekanlar arasında bile beslenme düzeni açısından büyük farklılıklar olduğunu ortaya koymuştur. Yerleşimde bulunan yabancı hayvanların yanı sıra koyun ve özellikle kuzu kemikleri, topluluğun yarı göçebe bir yaşam sürdürdüğünü ve dolayısıyla yerleşimin mevsimlik olarak kullanıldığını düşündürmektedir. Buna karşılık yerleşimde domuz kemiklerinin çok sayıda oluşu, yerleşimin sürekli olduğunun kanıtı olarak kullanılabilir.

SON TUNÇ ÇAĞI

Tsaghkahovit Ovası'nda Gegharot kalesinin altında bulunan bir kurgan mezarı, Orta Tunç Çağı'nın sonunda yarı yerleşik hayattan tam yerleşik düzene geçiş olabileceğini göstermektedir. Mezarın ortasında 35-40 yaşlarında yetişkin bir erkeğe ait kalıntıların altında bozuk durumda bir bebek iskeleti bulunmuştur. İnsan iskeletleri iki ayrı ata ait olan baş ve bacak kemikleri tarafından çevrelenmiştir. Mezarın Son Tunç Çağı'na tarihlendiğini, bulunan çanak çömlek, obsidyenler, tunç okuçları ve bir bıçaktan anlaşılmıştır. Son Tunç Çağı'nda, ovayı çevreleyen dağ eteklerinde 10-12 adet kalenin kurulmuş olması, bölgenin nüfus yapısında önemli değişimlerin olduğunu göstermektedir. İlk Tunç Çağı Kur-Aras evresinden sonra terk edilen ovanın yeniden iskanı, Son Tunç Çağı'nda başlamıştır.

Gegharot'ta yapılan kazılarda şimdiye kadar tanımlı bir konuta rastlanmamış, buna karşılık işlikler, depo odaları ve zengin bir çanak çömlek çeşitlenmesi veren tören alanları saptanmıştır. Yerleşimin üst kesiminde ve taraçalarında, takı yapımında kullanılan çok sayıda maden döküm kalıbı bulunan maden işlik yerleri ortaya çıkarılmıştır. Söz konusu buluntular, Son Tunç Çağı kale yerleşimlerinin ticarete de yönelik üretim yerleri olduğunu göstermektedir. Kale içerisinde henüz konut alanlarının bulunmaması yerleşimin hala yarı-göçebe olduğunu ve kalenin sosyal ve politik bir merkez olabileceğini düşündürmektedir.

DEMİR ÇAĞI 3 DÖNEMİ

Yapılan yöntemli yüzey araştırmaları, Son Tunç Çağı'ndan sonra ovanın MÖ 1. binyılın ortalarında yeniden iskan edildiğini ve Son Tunç Çağı'nda yapılmış olan kalelerden altısının bu dönemde de kullanılmış olduğunu göstermektedir. Projenin amaçlarının başında, Ahamenid, Pers Hanedanlığı döneminde bölgedeki sosyal yaşamı yansıtan ayrıntıların öğrenilmesidir.

Bu dönemle ilgili incelemeler, Precinct A adını verdiğimiz kalenin güneyinde başlatılmıştır. Çalışmalar özellikle 22 odadan oluşan ve 0,54 hektarlık bir alan kaplayan yer altı yapısı üzerinde yoğunlaşmıştır. Odalar düzenli bir şekilde kalabalık grupları ve depolanmış malzemenin uygun bir şekilde dolanımını ve denetimini düşünerek inşa edilmiştir. Oda duvarlarında sıva hala mevcuttur. Duvarlar 75 cm boyunda olan büyük bazalt taşlardan inşaa edilmiştir. Çanak çömlek genel olarak Demir Çağı 3 dönemine tarihlense de yapılan radiokarbon tarihleri yapının yaklaşık 150 senelik bir süreç kapsamında MÖ 6. yüzyılın ikinci çeyreğinden 5. binyılın sonuna kadar kullanım görmüş olduğunu göstermektedir.

G odasında in situ durumda bulunan çanak çömlek, bazalt öğütmetaşları, serpantin taşından yapılmış tabak önemlidir. Yapılan kimyasal ve mineralojik analiz serpantininin Zagros Dağları'ndan geldiğini göstermektedir. Bulunan hayvan biçimli kaplar özellikle dikkat çekicidir.

Sonuç olarak yapılan genel değerlendirme, bu bölgeyi daha yakından tanımamızı sağlamaktadır. Ovanın yerleşim tarihinde uzun süreli boşlukların oluşu dikkat çekicidir.

INTRODUCTION

The joint Armenian-American Project for the Archaeology and Geography of Ancient Transcaucasian Societies (Project ArAGATS) conducted its inaugural season of archaeological investigations in the Tsaghkahovit Plain of central Armenia during the summer of 1998. The 11 years since have included eight seasons of fieldwork and countless hours of laboratory research conducted by an international team that has included senior scholars and graduate students from Armenia, Canada, France, Georgia, Germany, and the United States¹. We began our work with two seasons (1998, 2000) of intensive pedestrian regional survey along with test excavations at key sites (Avetisyan et al. 2000; Badalyan et al. 2003; Badalyan et al. 2004; Smith et al. 2004; Smith et al. 2009). Since 2002, we have shifted our operations to focus primarily on excavations at the sites of Tsaghkahovit and Gegharot, where well-preserved occupation levels have revealed the broad contours of regional occupation. Although human occupation in the region began during the proto or early Neolithic period (Petrosyan et al. 2007; site numbers Ar/Ge.00.02 and Ar/Ts.00.01 in Smith et al. 2009), the extant archaeological record is dominated by the remains of three major phases of settlement prior to the crystallization of the modern landscape: the Early Bronze Age (*ca.* 2500 BC), the Late Bronze Age (*ca.* 1500-1200 BC), and the Iron 3 (Achaemenid) period (*ca.* 600-300 BC) (Badalyan et al. 2008; Hayrapetyan 2002, 2005; Khatchadourian 2008; Lindsay 2006; Monahan 2004, 2007).

In this article we provide a brief summary of our primary findings to date for each of these three periods. Our investigations overall are unified by three primary goals: 1) to examine the region as an integrated landscape, rather than just a series of sites, and thus draw upon a suite of field and laboratory techniques that highlight the dynamic articulation of places, practices, and institutions; 2) to re-examine the basic outlines of southern Caucasia's archaeological chronology and place existing conventions on a sounder empirical footing; and 3) to push the theoretical foundations of archaeology in the Caucasus beyond the formulation of culture areas to consider the co-constitution of material culture and social life.

The Tsaghkahovit plain (Fig. 1) is a relatively small, geographically enclosed, high elevation intermon-

tane plateau (2100 m a.s.l.) set between the northern slope of Mt. Aragats (4090 m), the southwestern slopes of the Pambak range, and Mt. Kolgat (a.k.a. Mets Sharailer, 2474 m) in western Armenia. It is the smallest and the highest of the three major plains—along with the Ararat and Shirak—that nestle at the base of Mt. Aragats.

THE EARLY BRONZE AGE

To date, our explorations of Early Bronze Age (EB) remains in the Tsaghkahovit Plain have been concentrated at the site of Gegharot (Fig. 2:1). EB settlement levels have been detected at Gegharot by excavations conducted on the summit, the upper western slope, and the lower reaches of the western and southwestern slopes. In some parts of the site, the EB layers are sealed by overlying Late Bronze deposits, while in others they lie directly under the topsoil (including EB I levels). The EB settlement at Gegharot is located on a rocky hillside and constructed of stone architecture. Like most Kura-Araxes sites in Armenia with similar conditions, the deposits are generally quite shallow (typically ranging from 45-70 cm below surface and only in exceptional cases reaching depths of 215 cm). The layers are comprised of stone buildings set atop terraces formed by extended retaining walls.

The EB layers at Gegharot are clearly divisible into two distinct occupation horizons, each containing homogeneous and clearly diagnostic ceramic complexes. The early horizon (EB I), identified by extensive assemblages of 'Elar-Aragats' type ceramics (Fig. 3), was uncovered in a series of stone constructions on the western terrace (comprised of one- and two-roomed residential buildings that were either round or rectangular in plan) and a rectangular collective burial crypt. The late horizon (EB II), distinguished by assemblages of 'Karnut-Shengavit' type ceramics (Fig. 4), includes work areas, residential constructions, and a number of burials on the lower western slope, now partially destroyed by the encroachment of the modern village. The late horizon layers seal the lower horizon occupation levels, which have been uncovered in excavations on both the top of the hill (T16) and the western terrace (T2E). Some of the early horizon buildings contained clear traces of fire (*e.g.*, T17/18), suggesting

that the EB I buildings uncovered on the summit represent complete or partially preserved interiors containing *in situ* material assemblages. In contrast, the depositional context of the late horizon constructions suggests that the settlement was simply abandoned at the end of occupation, as at a number of related sites (e.g., Karnut, Dovri).

The results of the excavations of the EB settlements at Gegharot have provided the basis for a broad revision of the periodization and chronology of the 'Kura-Araxes' material culture horizon within the territory of Armenia. Until recently, the traditional periodization in Armenia was divided into three sequential phases identified by variation in ceramic morphology and decoration covering the period from the middle of the 4th millennium BC to the 24th/22nd centuries BC. The EB I phase was defined by "Elar-Aragats" ceramic types, EB II by "Shresh-Mokhrablur" materials, and EB III by "Karnut-Shengavit" style ceramics (Avetisyan et al. 1996: 8-10; Badalyan and Avetisyan 2007).

A number of factors argue for rethinking the traditional account. First, no settlements boasting 'Shresh-Mokhrablur' assemblages are known outside of the low-lying Ararat Plain, for instance in the mountainous areas of Shirak, Kotayk, and Aragatsotn. Second, layers of Elar-Aragats pottery overlie layers containing Karnut-Shengavit pottery. One interpretation of these data would suggest a general depopulation of the mountainous areas during the EB II phase and their re-colonization during the large expansion in settlements during the EB III (Badalyan and Avetisyan 2007: 303; Smith et al. 2004: 25).

However, a series of radiocarbon dates from EB Gegharot suggests the need to revise the absolute dating and relative position of the 'Karnut-Shengavit' complexes that had been traditionally attributed to the EB III phase and dated to the 26th-24th B.C. (Smith et al. 2009: 49-51). Excavations of Early Bronze Age layers at Gegharot seem to suggest that the 'Karnut-Shengavit' occupations chronologically follow directly from the 'Elar-Aragats' complexes. Moreover, while the radiocarbon dates for the 'Elar-Aragats' complexes (Tab. 1: AA-72047, AA-72046, AA-72069, AA-72070, AA-72061, AA-72060, AA-52898, AA-72213, AA-72214, AA-66888, AA-56969)

place the EB I phase at Gegharot squarely within the traditional dating of 3500-2900 BC (Badalyan 2003: 20-26), the dates for Gegharot's 'Karnut-Shengavit' complex (Tab. 1: AA-52900, AA-56968, AA-66894, AA-66895, AA-72066, AA-72053, AA-72045, AA-72067) suggest a date of occupation between 2900 and 2500 BC-synchronous with the dates for the 'Shresh-Mokhrablur' complexes at Mokhrablur (Badalyan and Smith 2008: 53-54; Badalyan et al. 2008: 90). Thus, we can assume that the EB II phase in Armenia is represented by two synchronous local ceramic complexes-the 'Shresh-Mokhrablur' assemblages of the Ararat valley and the 'Karnut-Shengavit' assemblages of the mountainous areas to the north. In other words, the "Karnut-Shengavit" ceramic style is not assignable to the EB III phase but rather is a geographically distinct horizon of the EB II phase.

Nevertheless, it does seem that the two EB settlement horizons at Gegharot were separated by a hiatus in occupation, although not one so lengthy as to be captured in the radiocarbon data. In the excavation of T2E on the western terrace, we uncovered a sterile layer of shallow colluvial granitic sand overlying the EB I collective tomb and underlying an EB II domestic complex. This would suggest that at least this part of the site had been abandoned for some time. Perhaps this hiatus is also evidenced by a certain shift in the plans of the EB I and II settlements relative to each other. Indeed, some areas of Gegharot occupied during the EB I phase do not show signs of resettlement during the subsequent period, while in other parts of the site EB II constructions are built directly on bedrock. Thus it is possible that there is no genealogical connection between the two occupation horizons at Gegharot. Speaking more broadly, it is possible that the hiatus in occupation between the EB I and II phases at Gegharot reflects a wider historical and cultural trend in the development of the Kura-Araxes material culture horizon with relatively homogeneous early (EB I) communities being replaced by a mosaic of local variations during the later (EB II) phase.

In addition to re-shaping our sense of the historical phasing and development of the Kura-Araxes horizon, the results of excavations of the Gegharot settlements have also helped to adjust our understanding of Early Bronze Age economic life and

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demographic processes in the South Caucasus. First, traditional accounts of the expansion of Kura-Araxes communities interpreted the settlement of mountainous regions as the result of steady increases in population in the valleys, an increasingly arid climate, and the depletion of pasture land, which led to a gradual expansion in the exploitation of highland resources (Kushnareva 1993: 71-72, but *cf.* Kohl 2007: 88). However, it is now clear that mountainous areas lying above 2000 m a.s.l., were settled at the first stage of the Early Bronze Age (*e.g.*, Gegharot, Tsaghkasar, etc.) roughly simultaneous with the first Kura-Araxes settlements in the Ararat valley (*e.g.*, Mokhrablur, Norabats, etc.).

Second, it is apparent that the range of economic variation between Kura-Araxes communities is determined not only by differences in environment among regions, as previously thought. Comparison of two contemporary EB I faunal collections from Gegharot demonstrate considerable diversity in subsistence practices within a single settlement. For example, within a single EB I room uncovered in operations T17 and T18 ($n=252$) sheep and goat comprised 65.13 per cent of the faunal remains compared to only 31.4 per cent for cattle (the ratio of goat to sheep within this room was 3:2 compared to a ratio of goat to sheep of 1:7.69 for EB Gegharot as a whole (Badalyan et al. 2008: 92). Wild animals were represented by isolated specimens of deer, gazelle, wolf (possibly), and bird. The small size of this collection and the diversity of wild species points to the random nature of the hunt. Alongside this faunal collection was found a collection of 11 bone spindle whorls and three awls. In contrast, the faunal assemblage from operation T12 ($n=662$) is comprised of 20 per cent sheep and goat and 80 per cent cattle. It is significant that in this assemblage, no wild animals were identified.

While the predominance of sheep and goat and the presence of wild animals is a possible indication of seasonal transhumance practiced by some of the inhabitants of the area around operation T17/18, this room also provided the most vivid evidence of Gegharot's agricultural economy in the form of four composite sickles including 13 flint blades, and large amounts of barley. In addition, the faunal assemblage from operation T12 and the remains of pigs on the settlement indicate that at least part of Gegharot's population led a sedentary life (Monahan 2007: 387).

THE LATE BRONZE AGE

No evidence of sustained occupation of the Tsaghkahovit Plain during the Middle Bronze Age has been detected by either our survey or excavations. The transition from the mobile communities of the Middle Bronze Age to the complex polities of the Late is currently most conspicuously visible in the assemblages from a single kurgan burial found just below the fortress of Gegharot (Fig. 5:1). The kurgan had two main chambers. The west chamber contained a diverse collection of animal bones and a ceramic repertoire that constitutes a perfect transitional Middle to Late Bronze Age assemblage (Fig. 5:2-9), including wares continuous with earlier traditions as well as initial iterations of Late Bronze Age styles (Smith et al. 2009: 27-30). The central chamber contained the skeleton of an adult male, 35-40 years of age, laid to rest atop fragments from the body of a young infant. The human skeletons were bracketed by the heads and forelimbs of two horses. Ceramic vessels in the chamber all belong to the emergent traditions of the Late Bronze Age, as do the obsidian and bronze arrowheads and the single bronze knife.

Within a few years of the kurgan's construction, the new political landscape of southern Caucasia's Late Bronze Age was emphatically emplaced within a series of fortified hill-top sites constructed along the margins of the plain. At least ten and possibly as many as twelve fortresses were constructed in the foothills surrounding the plain during the Late Bronze Age. Furthermore, excavations of mortuary sites across the plain have revealed interments contemporaneous with the entire occupation sequence documented at the Late Bronze Age fortresses. Taken together, the explosion in the quantity and diversity of settlements and burial clusters in the Tsaghkahovit Plain dating to the Late Bronze Age speaks to a significant demographic shift which brought sizable new populations into a region that had been largely uninhabited following the abandonment of the Early Bronze Age Kura-Araxes villages.

Radiocarbon dates and material assemblages indicate that the fortresses at Gegharot and Tsaghkahovit were among the earliest Late Bronze Age constructions in the region, with initial occupations dating to approximately 1500 BC. Gegharot fortress (Fig. 2:1) appears at present to have consisted of a series of

free-standing buildings, semi-subterranean constructions, and intervening open spaces set within a citadel and western terrace that was circumscribed by a cyclopean stone masonry wall. The area of the fortress is only 0,36 ha, making it the smallest of the major Late Bronze Age sites on the plain. Tsaghkahovit, in contrast, is the largest site in the region, sprawling across a large fortified outcrop, a nested series of descending terraces, and a series of extramural constructions radiating outward from the base of the hill. Despite their relative sizes, however, at present it appears that it was Gegharot that claimed significant privileges within the region's increasingly politicized productive economy. The results of Instrumental Neutron Activation analysis of ceramics and faunal studies of caprine remains point to a consistent movement of subsistence and craft products into Gegharot indicative of a significant asymmetry in local material flows (for a more extensive discussion, see Monahan n.d. and Smith et al. 2009: 381-392). This differential exchange suggests at the very least a politicization of the regional economy, requiring not only new institutions of rule, but also a more or less well-constituted community of subjects responsive to the demands of authority.

Our ongoing investigations into local institutions in the Tsaghkahovit Plain are providing an increasingly detailed sketch of Late Bronze social life in the South Caucasus. Of the two primary sites of our current excavations, Gegharot has proved to be considerably better preserved (thanks to a series of destruction events) and, as a result, more informative. No domestic areas have been found at the site to date. Instead, we have uncovered a series of discrete spaces focused on craft production, storage, and religious devotion. Two shrines have been uncovered at the site. Both were rooms centered on clay basins backed by stelae (one stone, the other ceramic). Both contained an extensive ceramic inventory, ranging from censers to large storage jars (Fig. 6). While this discovery, along with a similar find at Metsamor (Khanzadian et al. 1973) has clearly established the presence of religious institutions within Late Bronze Age fortresses, it has also complicated simple functional classifications by emphasizing the deep integration of religious practice with the region's political economy.

The terrace and summit of Gegharot also appear to have hosted facilities for metal working, including

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molds for making jewelry that have been found in close association with idols or figurines. The evidence for metal working at Gegharot and other sites in the region (including Aragatsiberd to the southeast) has further emphasized that Late Bronze Age fortresses were not collection depots for an aggrandizing elite, but were instead key nodes within a complex network of production and exchange. Given that the majority of metal production tools from Gegharot appear to relate to the production of jewelry rather than weaponry, it is quite possible that metal production at the site was less a part of a commodity economy than a network of political reciprocity and dependency in which objects of exchange served to mediate regional geopolitics.

The emergent institutions of the Tsaghkahovit Plain were forged within a wider regional process of political centralization that seems to have begun in the South Caucasus and eventually incorporated most of the Armenian Highland. Furthermore, the populations in the plain appear to have been in contact with neighbors farther to the south. In 2006, we uncovered two cylinder seals at Gegharot, traditional items of bureaucratic administration known from across the ancient Near East, but relatively rare in the South Caucasus. Both cylinder seals are of the Mitannian Common Style that gained considerable popularity across southwest Asia and the eastern Mediterranean during the fifteenth and fourteenth centuries BC. These seals were generally mass-produced and traded widely. In the South Caucasus, several examples of Common Style seals are known; however, all except for the seals from Gegharot come from burials.

Given the extensive institutional apparatus in evidence at the region's major fortified sites, the absence of domestic areas within the fortress precincts raises the question as to where both the rulers and subjects of this emergent complex polity resided. There are two possible answers to this question and they are by no means mutually exclusive. The first is that Late Bronze Age communities were constructed in the shadows of the fortresses, in areas that, at Tsaghkahovit, were later covered by Iron 3 occupations. This is Lindsay's (Lindsay 2006; Lindsay et al. 2010) suggestion based on the results of his excavations and gradiometry survey below the east and southeast slopes of Tsaghkahovit. But the scale of these Late Bronze Age 'lower towns' does not, as

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yet, adequately represent the large populations visible in the mortuary remains of the region.

Thus a second possibility is that significant segments of the Tsaghkahovit Plain's Late Bronze Age communities retained the highly mobile lifeways of the Middle Bronze Age. This hypothesis is based solely on negative evidence at present. The failure of our regional survey to record a single unfortified Late Bronze Age village is striking. It is of course possible that such communities were once set on the plain proper, an area adversely impacted by Soviet land amelioration programs and thus largely beyond recovery. Yet the minimal settlement features visible in the pre-amelioration era aerial photos argues quite strongly that this is unlikely to have been the case. If large segments of the population retained mobile lifeways well into the Late Bronze Age, then the fortified sites surrounding the Tsaghkahovit Plain are perhaps better described as *temenoi*, places in the landscape marked off as the domain of critical social and political institutions.

It is important to point out that both Gegharot and Tsaghkahovit were destroyed in contemporaneous conflagrations at the end of the Bronze Age. Not only does this regional catastrophe speak to the closely coordinated rhythms of settlement and abandonment across the entire plain, it also provides a stark reminder of the pervasive militarism of the era, the enduring significance of political violence, and the potency of the institutions that wielded it.

THE IRON 3 PERIOD

In 2005, Project ArAGATS broadened the temporal scope of its research at Tsaghkahovit beyond the Late Bronze Age to examine a later occupation dating to the Iron 3 period, when the site was rebuilt as a town of the Achaemenid Persian Empire (*ca.* 550-330 BC). The project's systematic survey of the Tsaghkahovit Plain had demonstrated that social life returned to the region during the mid-first millennium BC, with the reoccupation of six fortresses initially constructed during the Late Bronze Age. The principal objective of the ongoing investigations of Tsaghkahovit's Iron 3 occupation is to examine the contours of social life within a single settlement that was reconstituted during the period of Achaemenid rule. More specifically, these investigations are detailing the ways in which past local traditions of the

Late Bronze Age and new social conventions linked to the institutions of Achaemenid dominion together contributed to the making of empire in this one town of the Armenian satrapy. The work at Iron 3 Tsaghkahovit seeks to understand the role that conquered communities of the Persian Empire played in the maintenance of imperial hegemony through their everyday spatial and material practices (Khatchadourian 2008, forthcoming).

Excavations of the Late Bronze Age fortress at Tsaghkahovit conducted between 2000 and 2003 had exposed Iron 3 levels that hinted at a thorough reconfiguration of the fortress within the ruins of its more monumental predecessor. Modest architectural remains and artifact assemblages uncovered in the course of those investigations point tentatively to the transformation of this prominent locale within the site into a workaday space, rather than a center of community authority, as during the Late Bronze Age (Khatchadourian 2008). In light of the project's research questions, intensive investigations of Iron 3 Tsaghkahovit have focused on an area of the site to the south of the fortress, termed Precinct A, a 22-room semi-subterranean complex covering approximately 0,54 ha (Fig. 2:2). The complex is conspicuously condensed compared to the other clusters of rooms distributed around the base of the Tsaghkahovit outcrop (Fig. 7:1). In 2005, eight test trenches were excavated in various rooms of Precinct A (C, E, J, K, L, M) in order to verify that the units of this complex were contemporary with one another and datable to the mid-1st millennium BC. Following on the sampling strategy of 2005, in 2006 and 2008 excavations aimed at broader exposures within the complex and thus targeted two rooms in their entirety (H, G) and substantial portions of three others (C, D, I).

Precinct A is built into the slope of a ridge and is thus multi-leveled. The absolute elevations of the floors decrease from southeast to northwest, such that rooms H, G, and C are at a higher elevation than room I, which in turn, is at a slightly higher elevation than the floor of room K. Rooms generally contain two doorways which provide passage to two neighboring rooms (Fig. 7:2). The regular arrangement of rooms speaks to considerable architectural planning and a deliberate intention to create spaces that could at once facilitate interactions amongst sizable numbers of individuals and yet also control circulatory flows. All rooms are par-

tially dug out, although those that are backed against the slope of the ridge are more fully subterranean (e.g., H, G, and E). The walls of the complex are dry-stacked with traces of plaster coating still visible on the lower courses of some walls. The masonry consists of large roughly hewn basalt blocks averaging 75 cm in length, interspersed with smaller stones. Wall foundations were likely surmounted by additional courses of stone and perhaps a wooden superstructure. Pairs of roughly hewn bases in all excavated rooms suggest a partially or fully flat roof that required vertical supports, probably wooden posts, to assume some of the weight from the load bearing walls. Other interior room features include pits, flagstone floors, and short stone alignments that resemble troughs, but whose function remains unclear.

The ceramic inventory in these rooms, broadly speaking, consists of the complete repertoire of Iron 3 pottery, as it is known from other sites in Armenia (Karapetyan 2003). Yet despite the breadth of the repertoire, the assemblages included a disproportionate quantity of bowls relative to jars, pots, and jugs among the diagnostic sherds in most rooms (Fig. 8:4-5). The majority of these vessels is slipped, fired red, and burnished, although black and light-brown burnished treatments are also common. Based on preliminary Bayesian analysis of ten radiocarbon determinations, it appears that Precinct A was occupied for approximately 150 years, from the second quarter of the sixth century to the last quarter of the fifth century—an absolute date range that is broadly consistent with the relative chronology of the site provided by ceramics and small finds. We turn now to a brief discussion of some of these key artifacts.

Several lines of evidence attest to the importance of Precinct A within the Iron 3 settlement as the center of authority in the town and its centrality as a locus for certain material practices that reproduced Achaemenid hegemony². Particularly salient were the findings from two rooms of the complex—rooms G and H. In room G, a remarkable collection of artifacts found *in situ* on the floor of the room, including a ceramic stand, basalt mortar, and footless serpentine plate merit close examination (Fig. 8:1-2). Chemical and mineralogical analyses of the plate conducted by Arkady Karakhanyan and colleagues of Armenia's Institute of Geological Sciences point

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to a probable provenance in the Zagros mountains. Very likely imported from heartland Persia, the plate is morphologically identical to over 200 such serpentine and chert plates found in a building at the imperial capital of Persepolis known as the Treasury (Schmidt 1957). These have been associated with a very specific (and today much debated) ritual known as the *hauma* ceremony. This ceremony is thought to have involved the use of a shallow stone plate, a mortar and pestle, and a stand or table to produce a drink made from the crushing of a plant. Though hinted at through evidence from the empire's capitals, the *hauma* rite is best understood from later Zoroastrian practice, and thus the artifacts in question at both Tsaghkahovit and Persepolis may pertain to a different kind of ritual activity. Nevertheless, what is significant for the research at Tsaghkahovit is not the possible *hauma* ceremony, *per se*, but the evidence that a specific practice of the Achaemenid establishment took place in this distant town of the empire.

The assemblage of artifacts from room H likewise points to the occurrence of activities that were inflected with distinctly Achaemenid overtones. On the floor of this room was a striking proportion and concentration of consumption vessels compared to other rooms of the complex (78 per cent of the sampled pottery from this floor) (Fig. 8:4-8), a diversity of faunal remains (including not only the sheep, goat, cattle, and pig common from across the complex, but also red and roe deer, gazelle, fish, birds, bear, *etc*), and various kinds of distinctive objects that, taken together, suggest the occurrence of feasting activities. Paramount among these distinctive objects is an incomplete zoomorphic vessel in the form of a corpulent recumbent ibex, gazelle, or goat with four appliquéd legs, each with precisely rendered joints and hoofs (Fig. 8:3). This kind of beast is not known in the earlier iconography of the Armenian Highland, yet it is firmly rooted in the arts of Iran and of the Achaemenids, often in conspicuously meaning-laden scenes linked to ritual practice (Root 2002). Feasting activities at Tsaghkahovit may have been defined in part in relation to Achaemenid consumption and ritual practices, albeit altered and localized to accommodate the resources and social exigencies of this remote mountain town.

Taken together, the evidence from Tsaghkahovit to date suggests that Achaemenid hegemony in this

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one town of the empire was sustained through routine practices that modified and recombined local past traditions of the highlands (linked to the fortress institution) with those of the Achaemenid present. The Project ArAGATS regional survey showed that following a 500 year hiatus in occupation of the plain that began with the destruction of the Late Bronze Age fortress polities, returning communities of the Iron 3 period gravitated with unmistakable regularity to the dilapidated remains of the abandoned prehistoric fortresses. The acute predisposition of these new inhabitants of the plain to the earlier Late Bronze Age fortresses signals the endurance of pre-existing socio-political institutions that preserved certain spatial practices (namely, the hilltop fortress) as essential to the laying down of new roots. The fortress tradition was integrated into the local structures of social life and thus into the process of Achaemenid hegemony at Tsaghkahovit.

However, research in Precinct A is demonstrating that the relationship between the Late Bronze Age past and the Achaemenid-era present is not reducible to a mere mimicking of old traditions. During the Iron 3 era the fortress was an enduring, but not a fixed and immutable institution of social life. Results of excavations in the extra-mural complex tentatively suggest that even as the fortress remained a meaningful place that cued certain earlier ways of living collectively, it lost its practical status as the prime spatial location for the everyday practices that secured authority. Local leaders of Iron 3 Tsaghkahovit shifted the locus of authority beyond the fortress walls and incorporated certain Achaemenid ritual practices into the everyday life of a single town under empire. Future excavations at

Tsaghkahovit will continue to explore these phenomena and shed further light on one of the least understood periods in the archaeology of the Armenian Highland.

CONCLUSIONS

Large scale, systematic investigations of the Bronze and Iron Age sites of the Tsaghkahovit plain continue to reveal a complex picture of development that both details local specificities and situates the region within wider historical trends. Our work to date has revealed a series of occupations that witnessed significant socio-political transformations from small-scale, largely self-sufficient village communities, to complex polities centered in cyclopean fortresses, to large towns founded in the shadow of empire. Interestingly, between each of these major phases of settlement, the region appears to have been abandoned, leaving curious hiatuses in the archaeological record. As a result, the region resists reduction to a singular evolutionary narrative but instead demands close attention to historical contingencies over the *longue durée*.

Today, Project ArAGATS is the longest-lived international archaeological project in Armenia. With no less than five completed or in-progress dissertations emerging from this work, ArAGATS has made a lasting impact upon the emerging new era of scholarship. Our research agenda places a high value upon the intensive, long-term exploration of a single area. We are optimistic that such concentration can reveal the hiatuses, catastrophes, abandonments, and crises that make for a historically rich archaeology.

NOTES

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² For a more detailed discussion of the findings from Tsaghkahovit see Khatchadourian 2008.

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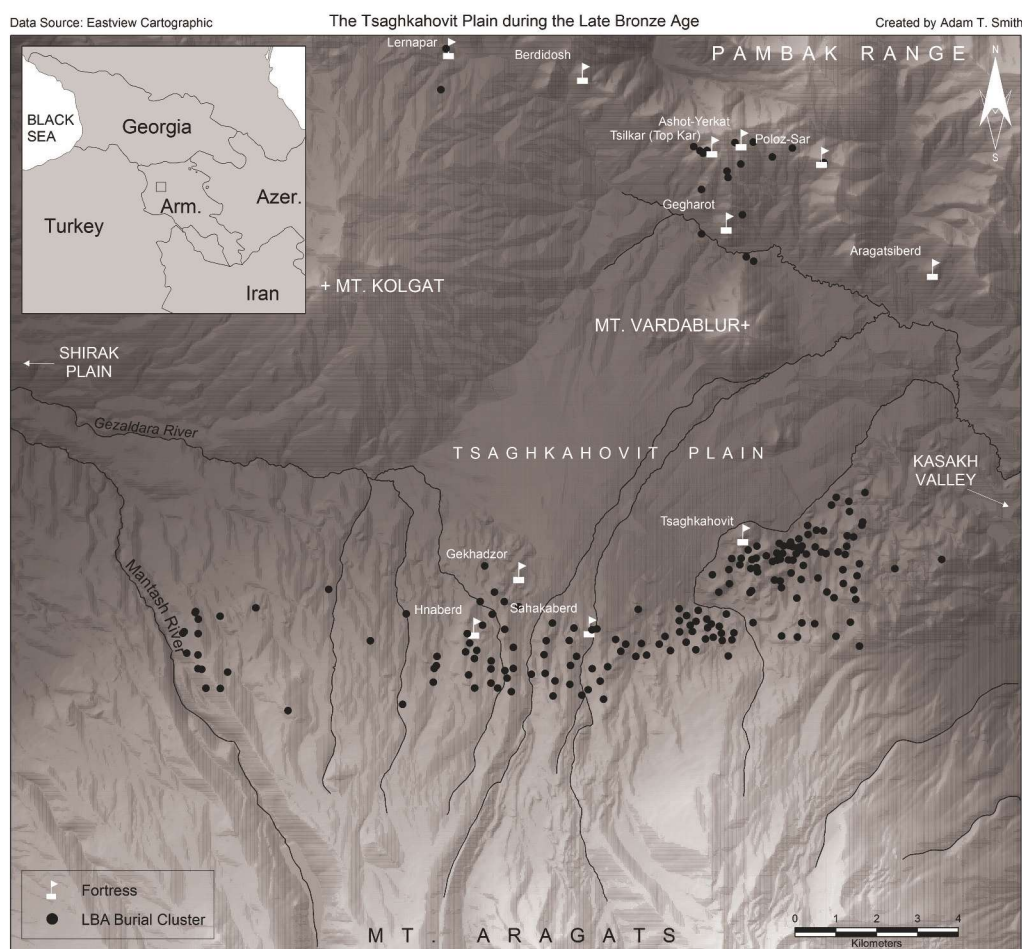
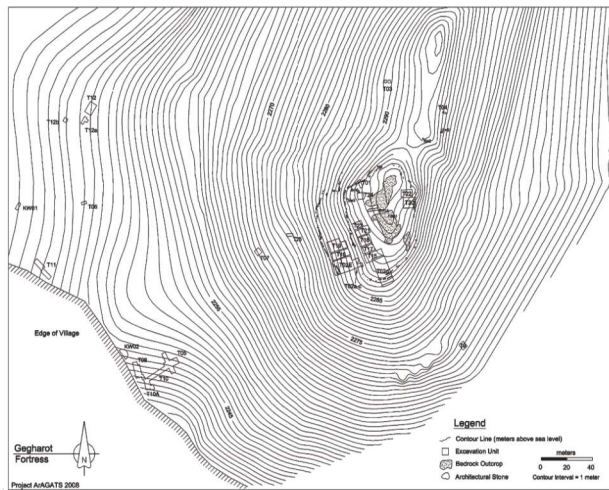
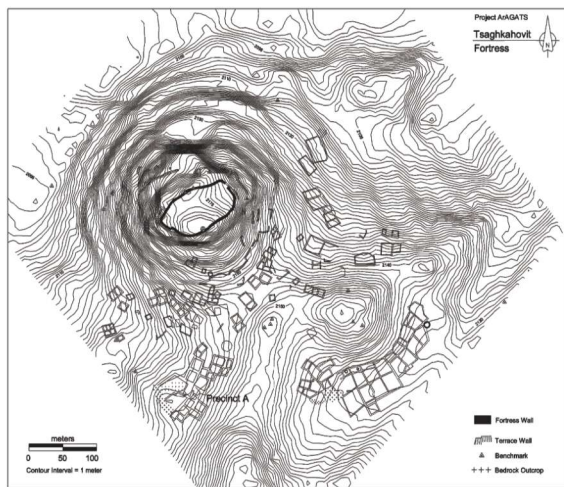


Fig.1- Regional Map of the Tsaghkahovit Plain, Armenia.



1



2

Fig. 2- 1 Plan of Gegharot; 2 Plan of Tsaghkahovit

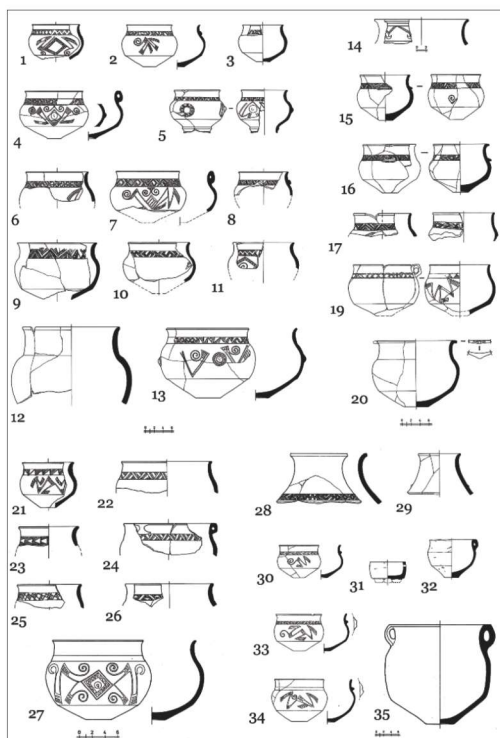


Fig. 4- Kamut-Shengavit (EB II) ceramics from Gegharot: 1-13: operation T-21; 14-20: operation T-20; 21-27: operation T-19; 28-35: operation T-2E.

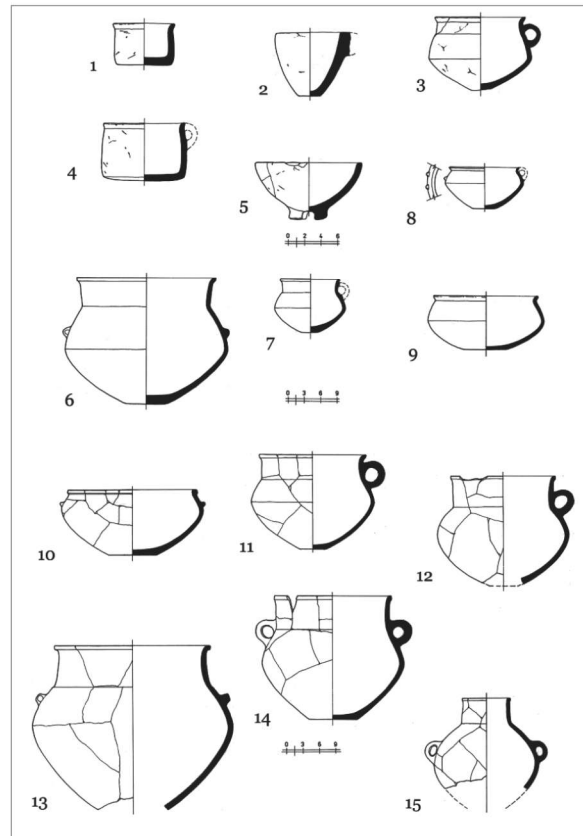


Fig.3- Elar-Aragats (EB I) ceramics from Gegharot: 1-5: operation T-17-18; 6-9: operation T-2E (tomb); 10-15: operation T-12.

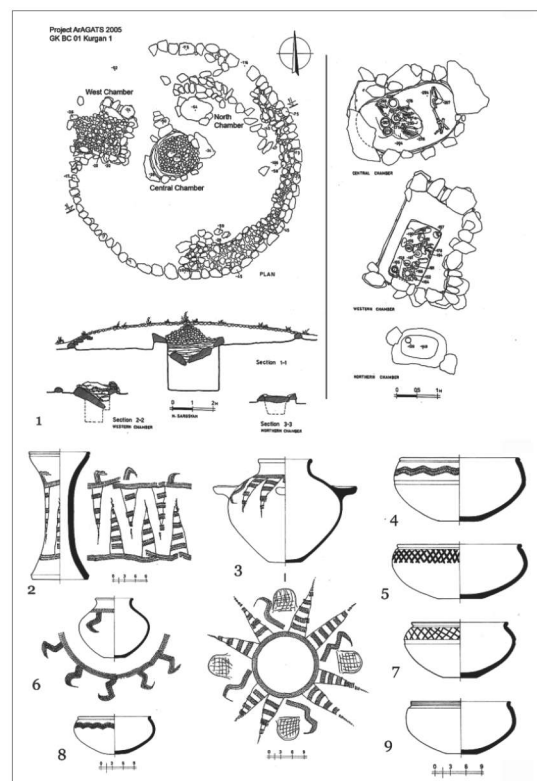


Fig. 5- Gegharot Kurgan 1: 1 plan and section; 2-8) select ceramics from the west chamber showing both close ties to late Middle Bronze Age (1-6, 8) as well as classic Late Bronze Age (7, 9) ceramic styles.

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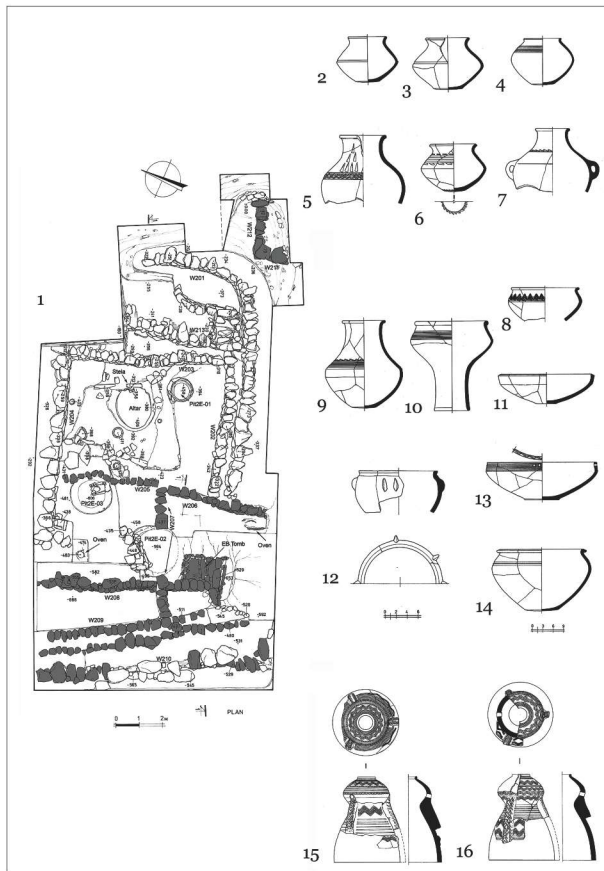


Fig. 6- T2E Shrine at Gegharot, plan and select ceramics.

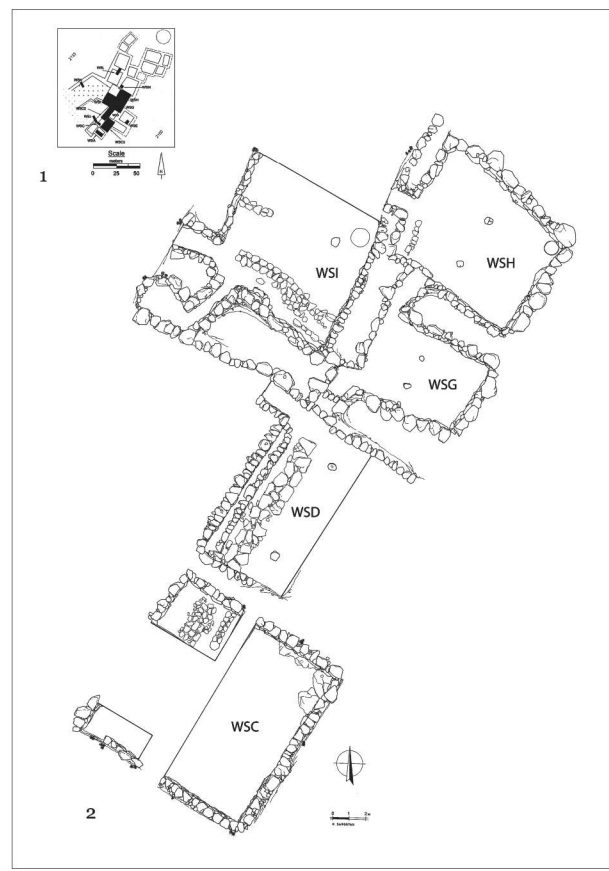


Fig. 7- 1 Plan of Precinct A based on surface architecture; 2 Architectural plan of rooms C, D, G, H, and I.

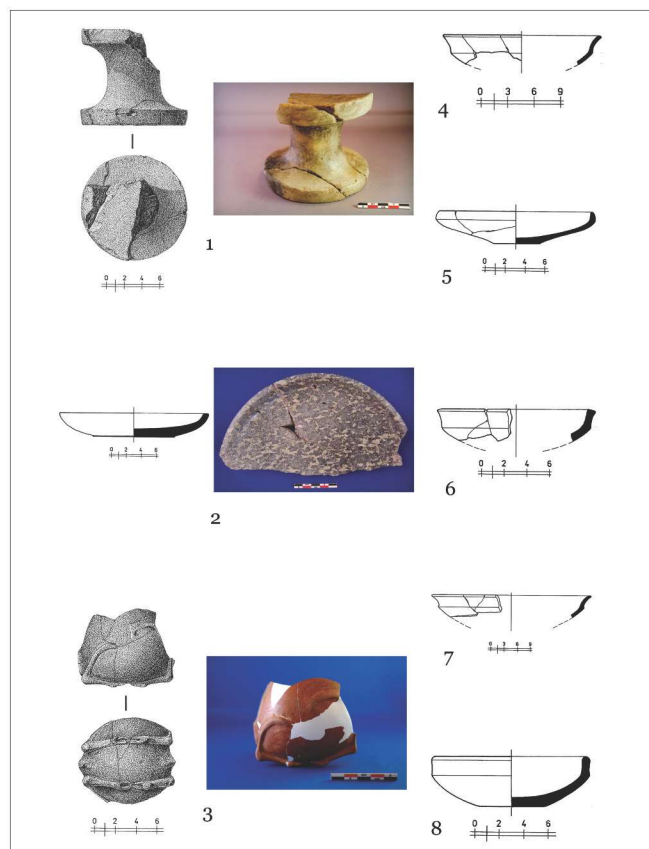
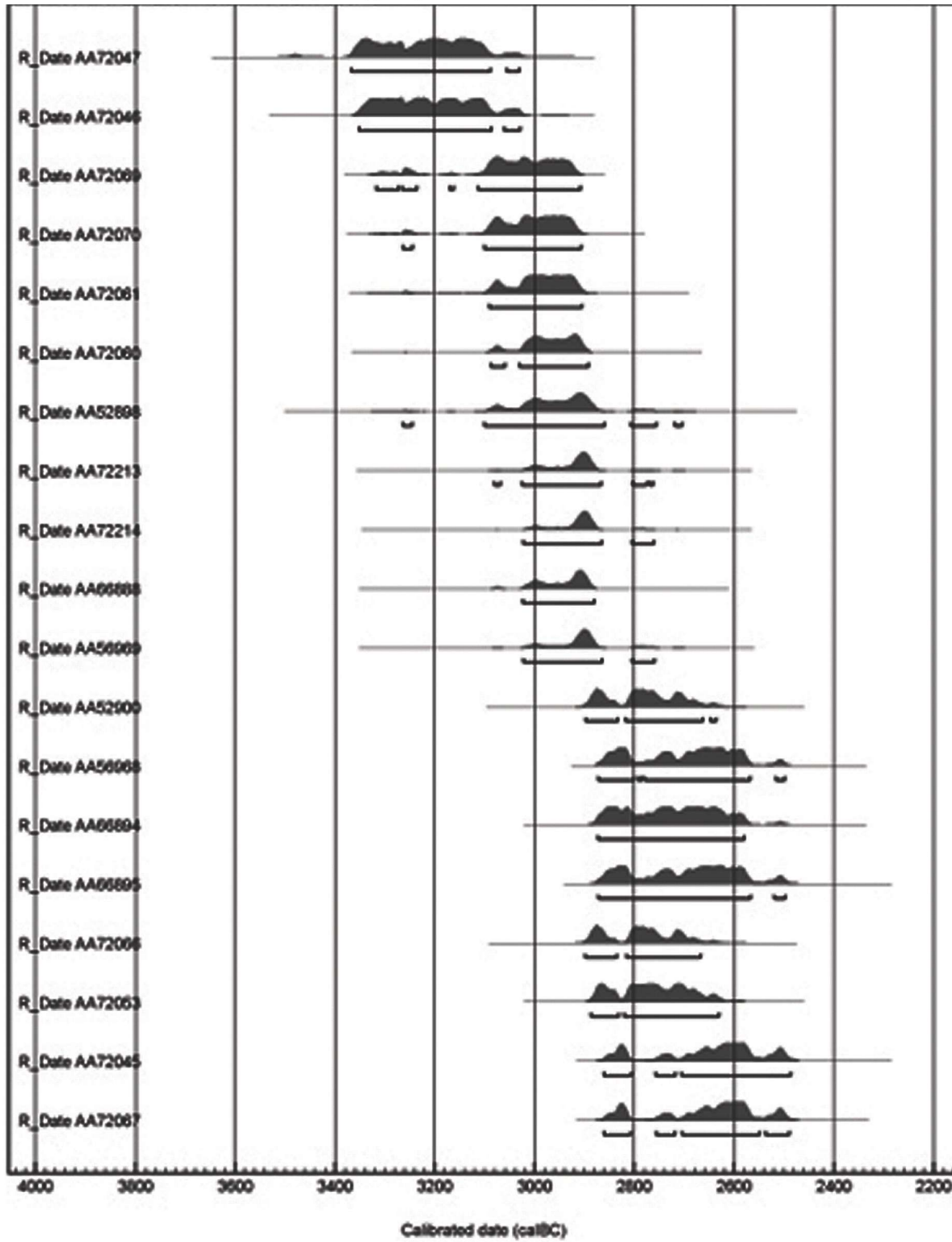


Fig. 8- 1 ceramic stand; 2 serpentine plate; 3) zoomorphic vessel; 4-5) examples of bowls found on the floor of room H.

OxCal v4. 0.5 Bronk Ramsay (2007); r.5; IntCal04 atmospheric curve (Reimer et al 2004)



Tab. 1. Early Bronze Age calibrated radiocarbon determinations from Gegharot.