

PRELIMINARY REPORTS OF THE SYRIA-JAPAN ARCHAEOLOGICAL JOINT RESEARCH IN THE REGION OF AR-RAQQA, SYRIA, 2009

INTRODUCTION

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Ever since the start of the field works in the region of Ar-Raqqa in February of 2007, the Syria-Japan Archaeological Joint Research in the Bishri Region has conducted thirteen times of works in the field until December of 2009 as follows:

- The 1st season of field works: February 15 to March 3, 2007
- The 2nd season of field works: May 6 to 30, 2007
- The 3rd season of field works: August 1 to 29, 2007
- The 4th season of field works: November 8 to December 12, 2007
- The 5th season of field works: March 3 to April 5, 2008
- The 6th season of field works: April 25 to June 6, 2008
- The 7th season of field works: October 10 to December 2, 2008
- The 8th season of field works: February 23 to April 3, 2009
- The 9th season of field works: April 28 to June 12, 2009
- The 10th season of field works: August 1 to September 9, 2009
- The 11th season of field works: October 11 to 25, 2009
- The 12th season of field works: November 17 to 21, 2009
- The 13th season of field works: December 24 to 30, 2009

Composed of 18 research teams listed below, specialized in natural and cultural sciences, this multidisciplinary Syria-Japan Archaeological Joint Research has worked in the region of Ar-Raqqa and in Japan, in order to clarify how ancient pastoral nomadic tribes contributed to the formation of agriculture-based urban societies along the Middle Euphrates, North-East Syria.

- 1) Supervising Team “Archaeological Research in West Asia based on Integrated Research Methods” (Director: Katsuhiko Ohnuma)
- 2) Research Team “Relationship between the Behavioral Evolution and the Process of Sedentalisation during the Palaeolithic Period in West Asia” (Director: Hiroyuki Sato)
- 3) Research Team “Expansion Process of Food Production Economy and Formation of Community in the Arid Area of West Asia” (Director: Yoshihiro Nishiaki)
- 4) Research Team “A Comparative Study on the Burial Patterns of the Pastoral Nomadic Tribes” (Director: Sumio Fujii)
- 5) Research Team “A Study of the Process of Urbanization in West Asia” (Director: Akira Tsuneki)
- 6) Research Team “Integrated Research on the Assyrian Civilization in Northern Mesopotamia” (Director: Hirotoshi Numoto)
- 7) Research Team “Establishment and Development of the Civilization of Sumerian Writing

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- System” (Director: Kazuya Maekawa)
- 8) Research Team “Development of City-States and the Tribes in West Asia” (Director: Akio Tsukimoto)
 - 9) Research Team “Environmental History of the Middle Euphrates based on Environmental Geology, Environmental Chemistry and C14 Dating” (Director: Mitsuo Hoshino)
 - 10) Research Team “Biological Features of the Ancient Inhabitants of the Middle Euphrates and its Peripheral Region” (Director: Hidemi Ishida)
 - 11) Research Team “Zoological and Botanical Archaeology in the Prehistoric to the City-State Societies of West Asia” (Director: Hitomi Hongo)
 - 12) Research Team “A Study on the Styles and the Genealogy of Masonry Techniques in Ancient West Asian Architecture” (Director: Yasuyoshi Okada)
 - 13) Research Team “Basic Structure and Re-arrangement of the Bishri Mountains Tribal Culture in the Ancient Oasis City, Palmyra” (Director: Saeko Miyashita)
 - 14) Research Team “Developing Data-base of Archaeological Sites of West Asia: An Investigation through the Analysis of Satellite Images” (Director: Ken Matsumoto)
 - 15) Research Team “An Archaeological Study on the Nomadic Tribal Communities in Northern Eurasia: A Comparative Study” (Director: Shu Takahama)
 - 16) Research Team “A Study of the Process of Urbanization in the Steppical Border of Syria in the Third and Second Millennia B.C.” (Director: Michel Al-Maqdissi)
 - 17) Research Team “A Study of the Bronze Age Pottery Obtained by the Syria-Japan Archaeological Joint Research in the Region of Ar-Raqqa”(Director: Michel Al-Maqdissi)
 - 18) Research Team “New Perspectives of Anthropology and History towards Arab Tribal Systems” (Director: Masayuki Akahori)

The members who participated in the thirteen times of the joint works are as below:

Syrian Party: Michel Al-Maqdissi (Supervisor), Anas Al-Khabour (director), Shaker Al-Shbib (director), Ahmed Sultan (Director), Mohamad Sarhan (Director), Ayham Al-Fahry, Mahmmod Al-Hassan, Ibrahim Musa, Mohamad Ali Jajan, Mohamad Ibrahim, Aed Issa and Ibrahim Khalil.

Japanese Party: Katsuhiko Ohnuma (Supervisor and Director), Hiroyuki Sato, Masanobu Tachibana, Yoshihiro Nishiaki, Tomoyasu Kiuchi, Hiroto Nakata, Seiji Kadowaki, Masashi Abe, Sumio Fujii, Takuro Adachi, Kae Suzuki, Kazuyoshi Nagaya, Hitoshi Endo, Kyohei Inoue, Akira Tsuneki, Atsunori Hasegawa, Hirotoshi Numoto, Shogo Kume, Izumi Yoda, Harumi Horioka, Haider Urebi, Mitsuo Hoshino, Tsuyoshi Tanaka, Toshio Nakamura, Hidekazu Yoshida, Takeshi Saito, Kazuhiro Tsukada, Yusuke Katsurada, Yoshiyuki Aoki, Suguru Oho, Ken-ichi Tanno, Lubna Omar, Chie Akashi, Yasuyoshi Okada, Sumiyo Tsujimura, Naoko Fukami, Ryuichi Yoshitake, Yo Negishi, Panagiotis Tokmakidis, Shouko Ueda, Natsuko Fujikawa, Kiyomi Mori, Saeko Miyashita, Hitoshi Hasegawa, Tomoya Goto, Shu Takahama, Toshio Hayashi, Ryuji Matsubara, Toshiki Yagyū, Masayuki Akahori, Hidemitsu Kuroki, Kenichiro Takao, Teruaki Moriyama, Yoshihiko Nakano and Hidemi Ishida.

In the first season, we carried out surveys of archaeological sites and *birs* (wells) in the research region, confirming that there is a bias in the dates of the sites on the Euphrates plateau between the towns of Mansura and Ghanem al-Ali. We also confirmed that most of the sites in the western part of the plateau are dated to the Roman, Byzantine and Islamic periods, while in the eastern part only a few sites are distributed, several of which are dated to the Early Bronze Age.

On the basis of these archaeological surveys, we chose Tell Ghanem al-Ali as the candidate for future excavations, and completed its overall plan in the second season. Thus, trench excavations were started at this site in the third season, and they were continued in the fourth, seventh, ninth and tenth seasons.

In the fifth to ninth and eleventh seasons, we carried out surveys at the Early Bronze Age hilltop tombs near the village of Ghanem al-Ali, in order to shed light on the funerary aspect of the EBA settlement of Tell Ghanem al-Ali.

Survey of cairns along the northern edge of the Mount Bishri was started in the second season, and sondage at Rujum Hedaja near Bir Rahub was carried out in the fifth to tenth seasons, with a view to explore the pastoral background of the EBA society in the middle Euphrates river basin.

In the third, fifth and ninth seasons, we carried out intensive surveys of archaeological sites to clarify the EBA land-use patterns around Tell Ghanem al-Ali, in order to gain further records of population history in this region since earlier times. And in the third season, Palaeolithic survey was carried out in the research region.

From the first season onward, our geolo-geographical team joined the field works to obtain information on change of natural environment. They conducted surveys in the research region in the third to sixth, tenth and twelfth seasons.

Botanical research on the specimens obtained from the surveys and excavations was carried out in the third, fourth, sixth, seventh and ninth seasons, and faunal research was carried out in the third and fifth seasons.

As to the human bones unearthed from the sondage, morphological studies were carried out in the seventh and tenth seasons.

In a viewpoint that cultural anthropological research is important and indispensable to know the relationship between nomads and agriculturists in the past, our cultural anthropology team researched at the villages of Ghanem al-Ali and Wadi al-Rahum in the seventh and eighth seasons.

Also, we carried out research on the history of the village of Ghanem al-Ali in the fourth and ninth seasons, with ethno-archaeological survey of their modern graves.

The reports presented here are the six working reports of the 8th to 13th field works in the forms of their submission to the Syrian Directorate General of Antiquities and Museums (see Al-Maqdissi, Ohnuma, Al-Khabour, *et al.* (2008, 2009) for the working reports of the 1st to 7th field works).

We like to express our sincerest gratitude to Dr. Bassam Jamous, Director General of the Syrian Directorate General of Antiquities and Museums, who warm-heartedly understands this joint research and is always cooperating with us towards the success of the joint research.

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ARCHAEOLOGICAL RESEARCH IN THE BISHRI REGION
— REPORT OF THE EIGHTH WORKING SEASON —

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April 4, 2009

The 8th working season of the Syria-Japan Archaeological Joint Mission to the Bishri Region was undertaken from February 23th to April 3rd, 2009.

The members of the joint mission from the Syrian and Japanese parties are as follows.

Syrian party: Mohammad Sarhan (Director), Ahmed Sultan, Mohammad Jajan, Ayd Issa.

Japanese party: Mitsuo Hoshino, Tsuyoshi Tanaka, Toshio Nakamura, Takeshi Saito, Yoshiyuki Aoki, Akira Tsuneki, Atsunori Hasegawa, Sumio Fujii, Takuro Adachi, Kae Suzuki, Kazuyoshi Nagaya, Hitoshi Endo, Yoshihiro Nishiaki, Hiroto Nakata, Seiji Kadoaki, Masashi Abe, Shogo Kume, Masayuki Akahori, Hidemitsu Kuroki, and Teruaki Moriyama.

Dr. Bassam Jamous, the Director General of the Syrian Directorate General of Antiquities and Musems, and Dr. Michel Al-Maqdissi, the Syrian Supervising Adviser for this joint mission and the Director of Archaeological Excavations and Research at the Syrian Directorate General of Antiquities and Musems, kindly helped us towards the success of this eighth working season of joint research, and we express our sincerest gratitude to both of them for their heart-warming cooperation.

In this working season, we undertook five kinds of research in the research area (Map 1): 1) geological and geographical field survey, 2) sondage and surface research at Tell al-Ghanem Al-Ali, 3) sondage at Tor Rahum Cairns, 4) survey around Tell al-Ghanem al-Ali, and 5) geohistorical survey of Tell al-Ghanem Ali and Wadi Rahub.

The following sections are the preliminary results of the research works carried out in this field season.



Map 1 Area including the sites researched by the 8th Syria-Japan Archaeological Joint Mission to the Bishri Region in February to April, 2009.

1. Archaeological Investigation at the Tor Rahum Cairn Field 1 on the Northwestern Flank of Mt. Bishri

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Introduction

The fifth investigation season at the Bishri cairn fields took place from the 10th of March to the 2nd of April in 2009 with the kind cooperation of the Department of Antiquities and Museums of Syria. The primary goal of this season was to test our previous perspectives in a broader context and, in so doing, provide further insights into the yet-to-be well known Bronze Age pastoral society behind the Middle Euphrates River Basin. For this purpose, we shifted our focus from the Hedaja Cairn Fields, our main concern until the last season (Fujii 2007, 2008; Fujii et al. 2008a, 2008b), to the Tor Rahum Cairn Field 1 and sounded a dozen burial cairns. What follows is a brief summary of the investigation results of this season.

The Site and Site-setting

The site of Tor Rahum Cairn Field 1 (or TRH-1 in our site registration code) is located ca. 8 km southeast of Bir Rahum, a small village along a local road crossing the northwestern flank of Mt.

Bishri (Fig. 1). It is an elongated site ca. 10 km in total length, being extended along the southern edge of the Rahum Plateau (i.e. Tor Rahum) or an escarpment bordering the Homs prefecture. Because of its unique location, the site commands a fine view of the whole range of the northwestern and southwestern flanks of the Bishri mountain system (Fig. 2).

The site consists of some eighty burial cairns and several dozen small features, the former of which are a part of hundreds of cairns aligning along the escarpment. We defined the site as a 10 km long segment by intercepting the endless chain of cairns expediently between two dirt roads descending southward from the plateau.

The site-setting is characterized by an arid climate and consequent poor vegetation. No natural perennial water sources are available around the site and a dozen wells dug along Wadi Rahum barely support the survival of a local community of Bir Rahum, the only sedentary village in this area. Our investigations suggest, however, that a large group of pastoral nomads were based in this area during the Bronze Age probably taking advantage of a short-term climatic amelioration.

The Investigation

Our investigation started with schematic mapping of the elongated site and, then, shifted to a limited sounding of a part of some eighty cairns. We focused on a westerly sub-segment sandwiched between two large-size cairns, BC-117 and BC-131. In addition, three cairns adjacent to these two landmarks were also briefly tested. It follows then that we investigated a total of eighteen cairns. The soundings were conducted by means of a 1–2 m wide trench crossing the center of a mound from the north to the south. All finds were collected following a grid and locus system.

BC-116

This medium-size cairn, ca. 4.5 m in diameter and ca. 0.3 m in relative height, incorporated a roughly round, ca. 2 m across, ground-type cist fringed with undressed limestone cobbles. Nevertheless, the cist produced neither artifacts nor human skeletal remains.

BC-117

This large-scale cairn ca. 1.1 m in relative height consisted of the following three components: an oval ground-type cist ca. 1.4 m by ca. 1.8 m in floor size, an outer wall of the cist ca. 4 m in diameter, and a peripheral wall ca. 7 m in diameter (Fig. 3). A large amount of human skeletal remains were found *in situ* from the cist floor, but no burial gifts accompanied them.

BC-118

This large cairn, ca. 6.5 m in diameter and ca. 0.9 m in relative height, contained an oval ground-type cist ca. 1 m by ca. 2 m in floor area. The cist, encompassed with an ill-delineated outer wall, yielded several flint artifacts and a certain amount of human bones. In addition, a small pit-type tomb dug in later times beside the cist also produced a certain number of human bones including a large skull fragment.

BC-119

This small cairn, ca. 3 m in diameter and ca. 0.1 m in relative height, covered an oval pit-type cist ca. 1–1.5 m in both axes and ca. 0.9 m in floor depth. The cist was sac-shaped in cross-section, being fringed with undressed limestone cobbles around its mouth. Several beads and a dozen flint flakes occurred from fill layers, but no human bones were included.

BC-120

This small cairn measured ca. 3.5 m across and 0.1 m high. It incorporated a round pit-type cist ca. 1 m in diameter and ca. 0.3 m in floor depth roughly in its center, but neither artifacts nor human bones were recovered.

BC-121

An oval pit-type cist ca. 0.7 m by ca. 1 m in floor area and ca. 0.3 m in floor depth was found under a small mound ca. 5 m in diameter ca. 0.2 m in relative height. The cist was not disturbed,

but nothing was found with the only exception of a bronze pin collected by chance around the cairn.
BC-122

This cairn had a diameter of ca. 6 m and a relative height of ca. 0.2 m. Strangely, no cist-like feature was found under the cobble mound. Instead, a large limestone slab was put at the southerly part of the construction surface.

BC-123

This large-scale cairn, ca. 6 m in diameter and ca. 0.7 m in relative height, was heavily disturbed by an illicit digging in the recent past and only the northern half barely remained intact. Two masonry walls were uncovered (Fig. 4). The inner wall was constructed with carefully dressed chalky limestone cobbles, some of which included petroglyphs depicting a quadruped design (Fig. 5). In light of its relatively large diameter (ca. 2.5–3 m), it appears to represent an outer wall of a completely erased cist. The outer wall, on the other hand, was built with larger undressed limestone cobbles and included no petroglyphs. Several beads and a certain number of human bones were found from both disturbed soil and lower fill layers.

BC-124

This cairn consisted of a small mound ca. 3.5 m in diameter and ca. 0.1 m in relative height and a round pit-type cist ca. 1 m in diameter and ca. 0.1 m in floor depth. Nothing was recovered with the only exception of a small flint flake from an upper fill layer of the cist.

BC-125

This stone concentration, ca. 3.5 m across and ca. 0.1 m high, turned out to be a small feature probably attached to the neighboring BC-124. Thus the cairn number was deleted from the list.

BC-126

BC-126 was a small mound with a diameter of ca. 4.5 m and a relative height of ca. 0.3 m, and incorporated a roughly round pit-type cist ca. 1–1.3 m in diameter and 0.6 m in floor depth. The side surface of the cist was carefully covered with a total of nine upright limestone slabs, an unexceptional structure among pit-type cairns at the site (Fig. 6). A small amount of human bones including a complete skull were recovered from the northeastern corner of the cist floor. In addition, some carnelian and snail beads occurred from a middle fill layer.

BC-127

This cairn, ca. 4.5 m in diameter and ca. 0.2 m in relative height, incorporated a trapezoidal pit-type cist ca. 1.5 m on a longest side and ca. 0.4 m in floor depth. A certain amount of human bones, probably representing a secondary interment, were found *in situ* beside the northern wall of the cist. In addition, a bronze pin and a few carnelian beads were recovered from lower layers of both the cist and the mound.

BC-128

This non-descript cairn ca. 3 m across and ca. 0.2 m high contained an oval pit-type cist ca. 0.5 m by ca. 1 m in floor area and ca. 0.3 m in floor depth. Neither artifacts nor human bones occurred despite the good state of preservation.

BC-129

This small cairn was similar to BC-122 in that a large limestone slab was put at the southerly position under the mound to replace a cist. Again, nothing was found except for the slab.

BC-130

This cairn was relatively large in size, being ca. 6 m in diameter and ca. 0.5 m in relative height. A coffin-shaped, well-delineated ground-type cist, ca. 1 m by ca. 2.2 m in floor size, was revealed immediately under the mound (Fig. 7). Finds included a bronze pin, several carnelian beads (Fig. 8), and a shell bead. In addition, human bones occurred in large amounts, which included two complete skulls. In light of their disarticulated state, there is no doubt that they represent secondary interments.

BC-131

This large-scale cairn consisted of the following three components: an oval ground-type cist ca. 0.8 m by ca. 1.3 m in floor size and ca. 0.8 m in height, a vaguely-delineated outer wall of the cist, and a peripheral wall constructed with partly dressed limestone boulders (Fig. 9). A cobble mound, ca. 7 m in diameter and ca. 0.9 m in relative height, covered these features. The cist produced some undiagnostic flint artifacts and a certain number of human bones. Of interest is a small pit-type tomb dug beside the northern wall of the cist, which yielded a bronze dagger and sheath from its floor (Fig. 10, 11).

BC-132

Since a triangular point entirely erased core features, nothing can be said about this cairn except that the mound was ca. 5 m in diameter and ca. 0.3 m in relative height.

BC-133

This cairn, ca. 4 m in diameter and ca. 0.5 m in relative height, included an oval ground-type cist ca. 1–1.4 m in floor size. The cist produced two carnelian beads and a certain amount of human bones.

Summary

The archaeological investigation at the Tor Rahum Cairn Field 1 revalidated the techno-typological sequence tentatively established at the Hedaja Cairn Fields. Taking the western half of the 117–131 sub-segment for example, BC-117 can be dated to the Hedaja Phase 1 on the basis of the existence of both the cist outer wall and the peripheral wall. Likewise, BC-118 can be placed to the Hedaja Phase 2 in light of the lack of the peripheral wall. BC-119 and BC-120 is attributable to the Hedaja Phase 3 in view of the disappearance of the two walls and consequent structural simplification. Given these, it follows that the Tor Rahum Cairn Field 1 also falls within the time range from the end of the Early Bronze Age to the beginning of the Middle Bronze Age. (Bearing in mind the fact that large-scale cairns such as BC-117 and -123 are dotted at certain intervals, it seems that the Tor Rahum Cairn Field 1 contained several coeval sub-segments.) Of particular interest is the unique structure of BC-121, which may represent a cairn form subsequent to the Hedaja Phase 3 type.

It is another result of this season that differences in grave goods among contemporary cairn fields were confirmed. While the Hedaja Cairn Fields often produced pottery sherds and snail beads, the Tor Rahum Cairn Field 1 rarely yielded them and, instead, focused on carnelian beads and flint artifacts. The opposite is the case of human skeletal remains. While little bones were found at the Hedaja Cairn, much was recovered from the Tor Rahum Cairn Field 1. It is intriguing to hypothesize that these contrasts are correlated to the identities of subgroups within the large pastoral group concerned. It is needless to say, however, that further evidence is needed to validate this challenging hypothesis.

Another remarkable result is the finding of the bronze dagger and sheath from BC-131. Both of these, though not derived from the main body of the cist, would provide a reliable key to the dating of the Bishri cairn culture. In addition, the occurrence of a large amount of human skeletal remains including three complete skulls would open a way to anthropological studies of the pastoral population who materialized the Bishri Bronze Age cairn entity.

Concluding Remarks

The investigation at the Tor Rahum Cairn Field 1 has enabled us to realize anew the archaeological potential of the Bishri region. Further investigation would hopefully contribute to a better understanding of the yet-to-be well known cultural sphere behind the Bronze Age urban societies along the Middle Euphrates River Basin.

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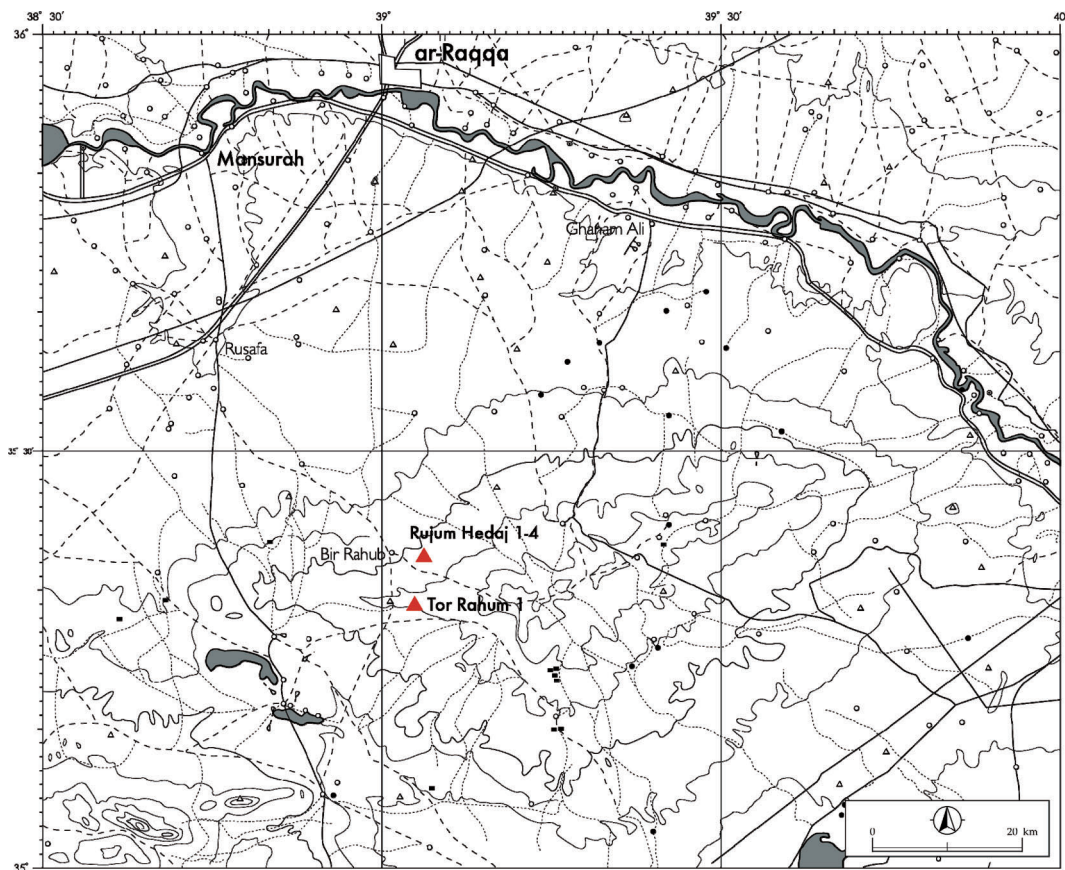


Fig. 1 The location of the Tor Rahum Cairn Field 1.



Fig. 2 A general view of the site (from W).



Fig. 3 A general view of BC-117 (from SW).



Fig. 4 A general view of BC-123 (from W).



Fig. 5 A petroglyph from BC-123.



Fig. 6 A general view of BC-126 (from SE).
Note the skull at the northwestern corner.



Fig. 7 A cist tomb of BC-130 (from NE).



Fig. 8 Various beads from BC-130.

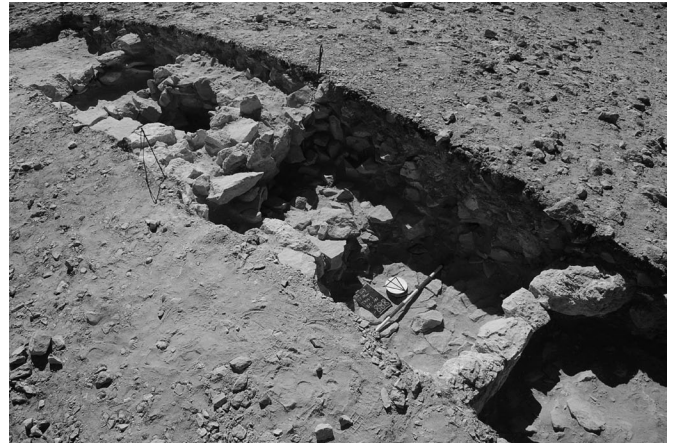


Fig. 9 A general view of BC-131 (from NE).



Fig. 10 A pit-type tomb beside the northern wall of the cist (from NW).



Fig. 11 A bronze dagger and sheath from BC-131.

2. Geo-historical Survey of Ghanem al-Ali and Wadi al-Rahum

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 Teruaki MORIYAMA (Research Fellow, Orient Library)

Introduction

In this archaeological research in the Bishri region, the geo-historical research was attempted for the first time in this 8th working season. It tried to clarify the interrelationship between nomads and sedentary people in the pre-modern, modern and contemporary eras to complement the archaeological findings and to see its continuity through the time.

Major method of geo-historical survey is the mixture of folk history and archive works. In this mission, Akahori, expert in folk history, concentrated his efforts in interviews with the people living in the neighborhood of the archaeological sites. Kuroki, specializing in modern history of the 18–19th

history of Aleppo and Raqqa Governorates, took a role of archive and library research using the geographical descriptions on the sites in the modern era, including geographies in Arabic, travel journals, diplomatic and commercial reports written by Europeans in English and French. Moriyama, majoring in the 10–13th century history of the same region covered the similar kind of descriptions in the pre-modern eras mainly written in Arabic.

We conducted general survey of the Raqqa region but paid particular attention to the areas around two archaeological sites; one was the area around the site of Ghanem al-Ali, including the villages of Gharnata (which is widely known as Ghanem al-Ali), Jibli, Sharida, Sabkha, Hameidat (known as Bui Hamad) and more; the other was Bi'r Rahum (or known just as Rahum) in Wadi Rahum and its neighboring communities including Bi'r Zamla, Chulat, Bi'r Sa'id, Bi'r Rashid and more. In addition, archive and library research was conducted in Damascus and Aleppo.

Research schedule

The research around the archaeological sites started on March 16, 2009 and ended on March 24. The schedule was observed as it was planned with a little modification as the following.

- March 16: Interview research in Bi'r Rahum by Akahori.
- March 17: Interview research in Bi'r Rahum by Akahori and archive research in Damascus by Kuroki.
- March 18: Research data assessment by Akahori and archive research in Damascus by Kuroki.
- March 19: Interview research in Bi'r Rahum and archive research; collection of documents in Aleppo by Kuroki.
- March 20: Interview research in Ghanem al-Ali by Akahori; archive research and collection of documents in Aleppo by Kuroki.
- March 21: Interview research in Ghanem al-Ali by Akahori and Kuroki; archive research and collection of documents in Damascus by Moriyama.
- March 22: Interview research in Bi'r Rahum by Akahori and Moriyama; archive research and collection of documents in Aleppo by Kuroki.
- March 23: Interview research in Bi'r Rahum by Akahori and Moriyama; archive research and collection of documents in Aleppo by Kuroki.
- March 24: Interview research in Raqqa by Akahori; archive research and collection of documents in Damascus by Kuroki and Moriyama.
- March 25: Archive research and collection of documents in Damascus by Moriyama.
- March 26: Archive research and collection of documents in Damascus by Moriyama.
- March 27: Archive research and collection of documents in Damascus by Moriyama.
- March 28: Archive research and collection of documents in Damascus by Moriyama.

Analysis of collected data and documents will be continued furthermore through 2009. Especially cross check of the names of tribal groups collected in interviews and those recorded in historical documents should be urgent task to be tackled.

Bi'r Rahum

Bi'r Rahum is on the extreme end of the road south from the town of Mansuriyya. Its estimated population is about 300 and almost all of them consider themselves belonging to the lineage of al-Tushush, a part of the Fad'an tribe of the Anaza. Usually the Fad'an is called tribe or qabila and the Anaza is considered as an aggregate of five tribes. The Anaza is one of the largest tribal groups in the eastern part of the Arab world.

They used to be nomads in the old times but now live their sedentary life in the village. Residents of neighboring villages regard them as nomads of Bedouins, they themselves do not accept that

idea. It is a fact that most of them have sheep and goats, but only a small part of dwellers have tents in other areas like Tadmor and make periodical movements between the village and camps. This transhumant way of herding animals still remains in the area.

The village name is constituted by the word “bi’r” or well and “Rahum,” which is a personal name. The former term is coming from the fact the village place have many wells. Now they have 15 wells used for their daily life in combination with usage of a midde-sized open-air basin gathering rainwater. Some of the wells were dug after people settled in the village, but many of them have been there since before the foundation of the village and have been traditionally used by nomads. The latter term “Rahum” is the name of a legendary nomad who became an owner of this area and sometimes said to be the very person who dug wells of this village. He is said to have acquired this area in the Ottoman era.

More than 10 extended families can be found, each of which, roughly saying, forming its own compound in the village. Each well also belongs to one of those compounds, but usually usage of other families are not rejected.

The villagers have regular contacts with the nomads in the summer time. In most cases, visiting nomadic people are said to belong to Anaza who come from the Gulf area, but recently those belonging to other groups like Shammar appear to feed their livestock. Village men of Bi’r Rahum say that nomads can use wells of the village as they like, but in some cases they may be charged for usage of wells. It should be confirmed in the survey in the next working season.

No other people in the neighboring villages situated between Bi’r Rahum and Mansuriyya belong to Anaza. Almost all of them identify themselves as Bu Khamis, a part of the Idlim. Idlim is the tribal aggregate whose main body is in southeast Syria and southern Iraq. Both of Anaza and Idlim traces their blood line to Zubayda, who moved from Yemen to Nejd in the historical past, but their ancestry is clearly distinguished among them. In the villages belonging to Bu Khamis, contacts with nomads are said to be very rare nowadays.

In that sense, Bi’r Rahum is an exceptional case in this area, in points of its ancestry and relatively intimate contacts with nomads. It is likely that people of Bi’r Rahum were sedentarized later than those of villages of Bu Khamis. Relatively longer distance between Bi’r Rahum and neighboring Bi’r Zamla in comparison with that of villages of Bu Khamis to one another seems to support this idea.

Roughly saying, Bi’r Rahum is a village in the bordering area where nomads and sedentary people meet each other and exchange. Its dwellers are relatively newly settled ones and therefore socially marginal both for nomads and sedentary people. It makes them possible to bridge smoothly two types of people whose livelihood are based on different conditions.

Ghanem al-Ali

The village of Ghanem al-Ali is much larger than Bi’r Rahum. Its number of residents is estimated some thousands. Most of the residents are descendants of Ghanem al-Ali, from whom the village name is originated. The name Ghanem al-Ali is the name of their ancestor, and that of their village and that of their lineage now, though the formal name of the village is changed to Gharnata recently.

This large village is in fact a complex of four residential areas; three of which is occupied by every three sub-lineages of Ghanem al-Ali, that is, al-Muhammad al-Ali, Maradhikh and Homeydat; the fourth is called Subi’at, where offspring of a brother of Ghanem, Muhammad al-Ali is residing.

The lineage Ghanem al-Ali is a part of the tribe Bu Sha’ban which also traces ancestry to Zubayda just like Anaza and Idlim. Bu Sha’ban occupies the area along the Euphrates between Raqqa and Deir al-Zur. Their residential zone extends along the river but often keeping some distance from it. It is partially because they were sedentarized mainly in the Ottoman era, when the river-side areas of the Euphrates were already occupied by villages of people who had been living as farmers since

old times. In the nearby areas of Ghanem al-Ali, we can see descendants of his brother, Muhammad al-Ali, to form some villages, in one of which, Qusbi, a tomb of Muhammad is located. Unfortunately nobody knows where Ghanem al-Ali is buried.

Degree of sedentarization of people in Ghanem al-Ali exceeds those of Bi'r Rahum and even of Bu Khamis. They identify themselves as traditional farmers, Rifi, while the latter two do not use that term but prefer the term Arab. For instance, in the cemetery of the village of Ghanem al-Ali, tombs of eight saints, Muhammad al-Shuyukh, Ahmad al-Shuyukh, Jasim al-Shuyukh, Mu'jil al-Musa, Muhammad al-Musa, Khalaf al-Musa, Ali al-Faraj and Muhammad al-Faraj, are kept and visited by village women for intercessory invocations. Those saints, salih, are said to have been villagers in the old times where the village of Ghanem al-Ali was still small and located in the area nearer than the place where it is now, and to have been members of the Rifa'iyya, one of the most popular Sufi orders in Syria and the eastern part of the Arab world. That kind of Sufism and saint veneration totally lacks in the case of Bi'r Rahum and villages of Bu Khamis. Though the Sufism is, generally speaking, rarely found among the Bedouins, the fact that even the saint veneration, which is usually popular among them, is totally absent requires additional interpretation. It may indicate that the period of sedentarization of the people of Bi'r Rahum and villages of Bu Khamis is later than that of the people of Ghanem al-Ali.

In addition, we can pay attention to the existence of one exceptional village like Bi'r Rahum in this area. There is a village, Zur Shammar, to the east of Ghanem Ali and that it is considered to be a village of Bedouins. In this case, the term "Bedouins" seems to mean that they belong to the different tribal groups and settled in this area by some reasons later than other people belonging to Bu Sha'ban. That kind of enclaves of ex-nomads would be found in the widely spread agricultural areas along the Euphrates.

The area around the Ghanem al-Ali barely has direct contacts with nomads today. Instead of water wells, villages have plentiful water from the Euphrates and can provide the nomads rich grassland after cultivation, but the nomads today do not seem to reach this area. They have contacts with co-tribesmen in Syria, Iraq and sometimes in Arabian Peninsula, but those contacts cannot be thought as co-existential mode of interrelationship between nomads and sedentary people in the daily life.

Overview

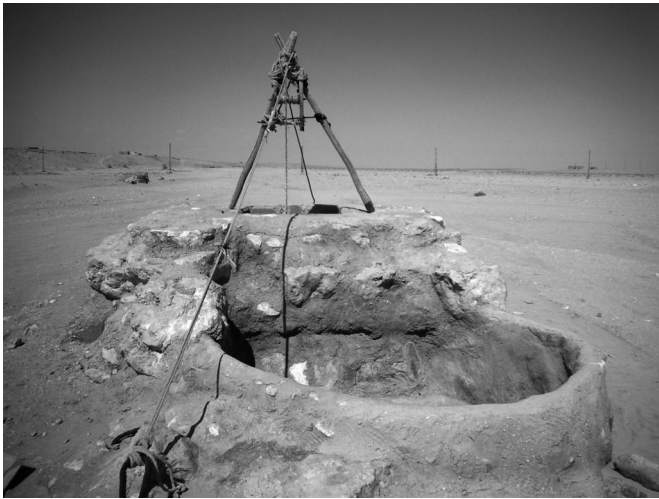
If we believe the villagers' folk knowledge about their history, people living around two archaeological sites, Ghanem al-Ali and Wadi Rahum, were originally nomads and sedentarized in the Ottoman period or later in the first half of the 20th century. In the meantime of sedentarization, they lost identity as nomads and became to consider themselves as merely Arab or even Rifi. In this context, people or villages who are sedentarized later than others are called "Bedouins."

Regular contacts with nomadic people are found only in the village of Bi'r Rahum in summer. It seems to mean that such kind of contacts are mainly established in the fringe area of sedentary zones as long as nomads and sedentary people are in co-existential mode. In the Ottoman era and before, contacts may have been seen in the nearer area to the Euphrates, but as the sedentarization was accelerated in the modern times, the place of contacts took distance from the river-side area and now in Wadi Rahum.

If this hypothetical understanding is applicable, the historical development of sedentarization can be said that newly comers always make their place of residence in the peripheral area of agricultural zone along the Euphrates and thus expand the zone to outwards from the river, though sometimes leaving intruded enclaves of ex-nomads as in the case of Zur Shammar. In the case of this survey, people of Ghanem al-Ali and its neighbors except for those of Zur Shammar were the first comers, then people of Bu Khamis were the second, and people of Bi'r Rahum were the last ones to settle down in the region. Seeing from the sedentary people, we can say that sedentarization is the process

to absorb nomads and assimilate them into sedentary life. In that process, newly settled ex-nomads took a role to mediate the interrelationship between nomads and sedentary people, which is now taken by those of Bi'r Rahum. All of Bu Sha'ban, Bu Khamis and Fad'an were settled in this area in relatively recent times, but they must have had different experiences in the different places in the different times in the modern history of the region.

Still the analysis of collected historical documents is untouched and further detailed research based on interviews would be required in the coming season. However, if we presume that the basic geographical setting, environmental conditions and forms of both of Nomadism and agriculture have been preserved ever since the oldest times, the above mentioned tentative overview of the system of contacts between nomads and sedentary people may be possibly applied to the explanatory works in archaeological studies now underway in this mission.



Picture 1 Water well in Bi'r Rahum.



Picture 2 Dwelling compound in Bi'r Rahum.

الموسم الثامن من أعمال البعثة الأثرية السورية اليابانية المشتركة العاملة في منطقة البشري

بدأت أعمال الموسم الثامن لهذه البعثة الأثرية المشتركة في منطقة البشري بتاريخ 23 شباط وانتهت بتاريخ 3 نيسان من عام 2009 .

يدير البعثة من الجانب السوري احمد سلطان , فيما يديرها من الجانب الياباني كاتسوهيكو اونوما .

الشكر الجزيل للدكتور بسام جاموس المدير العام للآثار والمتاحف في سورية والدكتور ميشيل مقدسي مدير التنقيب والبحث العلمي في المديرية العامة للآثار والمتاحف والمشرف المستشار لهذا البحث الأثري , لما قدموه من دعم في سبيل إنجاح هذا الموسم .

في موسم العمل هذا تم التركيز على خمسة أنواع من العمل العلمي المطبق في منطقة البحث :

أولاً : استكمال أعمال السبر الاختباري والمسح الأثري لتل غانم العلي :

(الكيرا تسونوكي , بروفيسور جامعة تسوكوبا 0 احمد سلطان , المديرية العامة للآثار والمتاحف 0 اتسونوري هاسيكواوا , جامعة تسوكوبا)

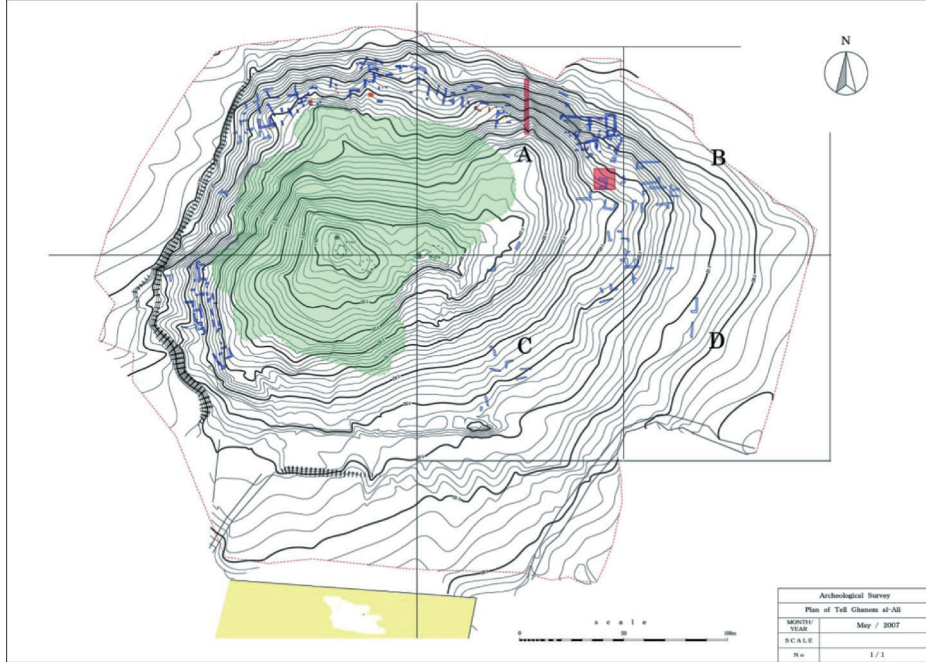
فقد تم تقسيم العمل في موقع تل غانم العلي لهذا الموسم إلى قسمين رئيسيين , هما استكمال أعمال السبر الاختباري في المربع رقم 2 من تل غانم العلي, وكذلك إجراء مسح أثري للقسم الشرقي من سطح تل غانم العلي .

حيث هدفت أعمال السبر في المربع 2 من التل إلى الوصول إلى تأريخ أوسع لتل غانم العلي , فخلال موسم العمل هذا تم الوصول إلى التربة العذراء من التل , وقد دلت جميع الطبقات الأثرية التي امتدت على طول هذا المربع أنها تؤرخ إلى عصر البرونز القديم 3 و 4 (من EBIII إلى EBIV) . وبناءً على ذلك يمكن القول بأن تل غانم العلي قد لعب دوراً هاماً في نشوء المجتمعات السامية الرعوية التي ظهرت خلال الفترة الممتدة من نهاية عصر البرونز القديم وحتى بداية عصر البرونز الحديث 0

فيما هدفت أعمال المسح إلى الكشف والتعرف على عمارة الأبنية الظاهرة على سطح التل , فقد أشارت نتائج هذا الموسم بأن هذه العمارة الظاهرة على سطح تل غانم العلي والتي تعود إلى عصر البرونز القديم غير منتظمة في بنائها 0

مسح أثري لسطح تل غانم العلي : فمنذ بداية المواسم الأولى في تل غانم العلي لوحظ وجود مجموعة من عمارة الأبنية متناثرة على سطح التل والتي من الممكن أن تساعد في دراسة المخطط التنظيمي لهذه المستوطنة خلال عصر البرونز القديم , دون القيام بأعمال تنقيب, حيث تم توزيع القسم الشرقي من سطح التل إلى أربع مناطق متناظرة (A-B-C-D) كما قسمت كل منطقة إلى مجموعة من المربعات بقياس 100×100م . , وبناءً على ذلك فقد تم البدء بأعمال

المسح للقسم الشرقي من هذا التل وذلك من خلال تنظيف السطح الخارجي لهذه العمارة وتصويرها وتوثيقها وتسجيلها وذلك باستخدام نظام التوتل ستيشن 0



خريطة طبوغرافية لموقع تل غانم العلي توضح عمارة الأبنية الظاهرة على سطح التل

حيث ظهرت معالم الأبنية بشكل واسع في جنوب شرقي المنطقة A وجنوب غربي المنطقة B , وقد كانت عمارة هذه الأبنية عبارة عن جدران حجرية باتجاه غرب شمال غرب وشرق جنوب شرق , وبقياس 6×5م 0

كما لوحظ وجود مجموعة من التنانير منتشرة داخل جدران الأبنية , مما يشير إلى أن هذه الأبنية لم تكن مجرد مطبخ للمنزل وإنما كانت مكان لتحضير الخبز وقد أشارت مجموعة الكسر الفخارية التي تم جمعها من سطح هذه الأبنية أنها تعود إلى عصر البرونز القديم 0

أيضا تم الكشف عن مجموعة من الغرف المستطيلة بقياس 6.5×4م و4×5م حيث اعتبرت امتداد غرف لأبنية ضخمة , وعلى الأغلب أن هذه المنازل تألفت من مجموعة من خمسة غرف وساحة , ويبدو أن هذا النوع من الأبنية كان أحد نماذج السكن الرئيسية في تل غانم العلي خلال عصر البرونز القديم 0

ومع ذلك فقد تم العثور بجانب جدران هذه الأبنية على جرة فخارية صغيرة تؤرخ إلى عصر البرونز الوسيط 0

هناك نموذج آخر من الأبنية الضخمة التي تألفت من مجموعة من الغرف المربعة الموزعة على نسقين , حيث امتدت هذه الأبنية شمال غرب المنطقة C , إحدى غرف هذه الأبنية كانت بقياس 4×4م , أيضاً تم العثور بداخلها على تنور

و من الجدير بالذكر بان معظم الكسر الفخارية التي تم جمعها من على سطح التل تنتمي إلى عصر البرونز القديم وبشكل خاص EBIII و EBIV a بالرغم من العثور على عدد محدود جداً من الفخار الذي يعود إلى عصر البرونز الوسيط



جدران الأبنية الظاهرة على سطح تل غانم اعلي

إذا معظم الجدران الموجودة ضمن هذه المنطقة تشير إلى وجود مجموعة من الغرق المستطيلة الصغيرة , وبناءً على ذلك يمكن القول بأن هذه الأبنية ربما كانت النموذج الرئيسي للمنازل السكنية لأهالي تل غانم العي القدماء 0

استكمال أعمال السبر في المربع 2 : يتوضع هذا المربع عند المنحدر الشمالي من التل بعرض 4م (شرق غرب) وبطول 26م (شمال جنوب) ,



وكان الهدف من إجراء هذا السبر الذي بدأ منذ الموسم الأول عام 2007 هو التوصل إلى تاريخ دقيق لتل غانم العلي 0

وبناءً على ذلك فقد تم تقسيم المربع إلى ست خطوات تميزت من خلالها سبعة سويات من العمارة ,

ففي هذا الموسم استمرت أعمال السبر من أجل الوصول إلى السوية الأقدم في تل غانم العلي , حيث تم الكشف في هذا الموسم عن السوية السابعة والسوية الثامنة بعد ذلك تم الكشف عن التربة العذراء للتل تحت السوية الثامنة مباشرةً ففي السوية السابعة تم الكشف عن ثلاث غرف مفصولة بواسطة جدران والذي تم ذكره في نتائج أعمال الموسم السابق , هذه الجدران كانت مشيدة من قطع من اللين بقياس 60×30سم حيث بلغ عرض كل جدار من هذه الجدران حوالي 60سم وباتجاه شمال غرب و جنوب شرق. وتبين أن هذه الجدران اللبينية بنيت مباشرة على الأرض في القسم الجنوبي الغربي من الغرفة, إذ لم يُعثر على أساسات حجرية لهذه الجدران, كما تم العثور أيضاً على حفرة صغيرة بلغ قطرها 60سم وعمقها حوالي 50سم 0

أما في السوية الثامنة فقد كانت على بعد 40سم أسفل السوية السابعة , كذلك تم الكشف عن ثلاثة غرف فيها , حيث كانت الجدران باتجاه جنوبي شمالي , وهي مشابهة لجدران الأبنية التي تكشفتها في السوية السابعة 0 أيضاً شيدت جدران هذه الأبنية من اللين بقياس مشابه لقطع اللين المستخدم في السوية 7, حيث كانت عمليه بناء الجدران في هذه السوية أكثر ترتيباً من السوية السابعة , كذلك كان هذا الجدار بعرض 30سم 0

وبعد توثيق وتسجيل هذه الجدران في السوية الثامنة تمت إزالتها حيث تم الحفر بعمق أسفل هذه السوية , حيث تم الكشف عن طبقة سميكة من الرماد التي احتوت أيضاً على الفحم على عمق 40سم أسفل السوية الثامنة , إذ لم يتم العثور على أية عمارة , استمر الحفر بعمق أيضاً حيث لوحظ وجود بعض الكسر الفخارية بالإضافة إلى قليل من الفحم دون وجود أية عمارة , استمر الحفر بعمق أكثر حتى الوصول إلى التربة العذراء لهذا التل 0وعلى ذلك يمكن القول بأن تل غانم العلي لا يحتوي على سويات عمارة قبل عصر البرونز القديم ,

وكنتيجة لأعمال السبر التي جرت في المربع 2 , يمكن القول أن تل غانم العلي يحتوي على سويات أثرية تمتد من منتصف الألف الثالث وحتى بدايات الألف الثاني قبل الميلاد , حيث ازدهرت هذه المستوطنة خلال عصر البرونز القديم 3و4 , وعلى ذلك فإننا نلاحظ بأن تل غانم العلي يُعتبر من أهم المستوطنات على حوض الفرات الأوسط والتي تلعب دوراً هاماً في دراسة نشوء القبائل البدوية الرعوية في المنطقة 0

ثانياً : مسح أثري للمنطقة المجاورة لتل غانم العلي :

(يوشيهيرو نيشياكي:بروفيسور,جامعة طوكيو 0ماساشي آبي ,طالب0سيجي كاداواكي ,طالب 0شوغو كومي,طالب0هيروتو ناكاتا , دكتور)

فقد امتدت منطقة البحث لهذا الموسم على مساحة 10 كم تقريباً حيث غطت أعمال المسح الأراضي المجاورة لتل غانم العلي والممتدة بين المنطقة المنخفضة من نهر الفرات المغطاة بالحقول الزراعية الخضراء وبين الهضبة الجنوبية لنهر الفرات التي قطعت بمجموعة من الأودية التي كانت روافد نهر الفرات منذ القدم , ويعتبر وادي الخرار أحد أكبر هذه الأودية

والذي يبعد حوالي 2 كم جنوب نهر الفرات في المنطقة الممتدة بين تل غانم العلي في الشرق وتل حمادين في الغرب حيث تم مسح هذا الوادي من كل جهاته 0

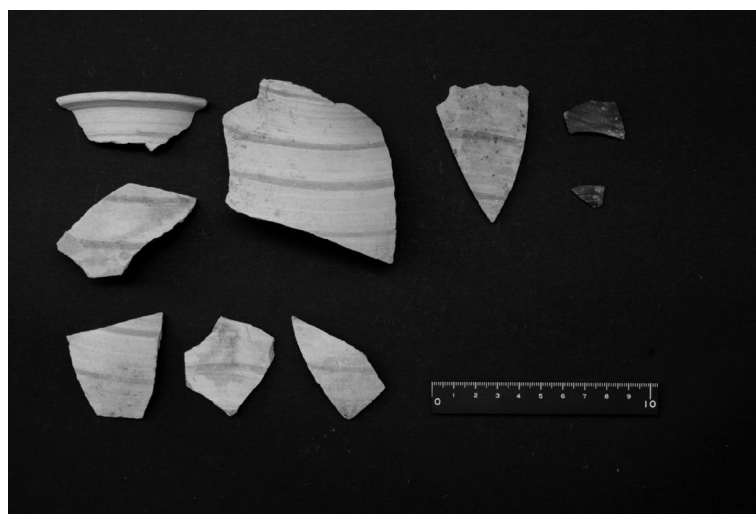
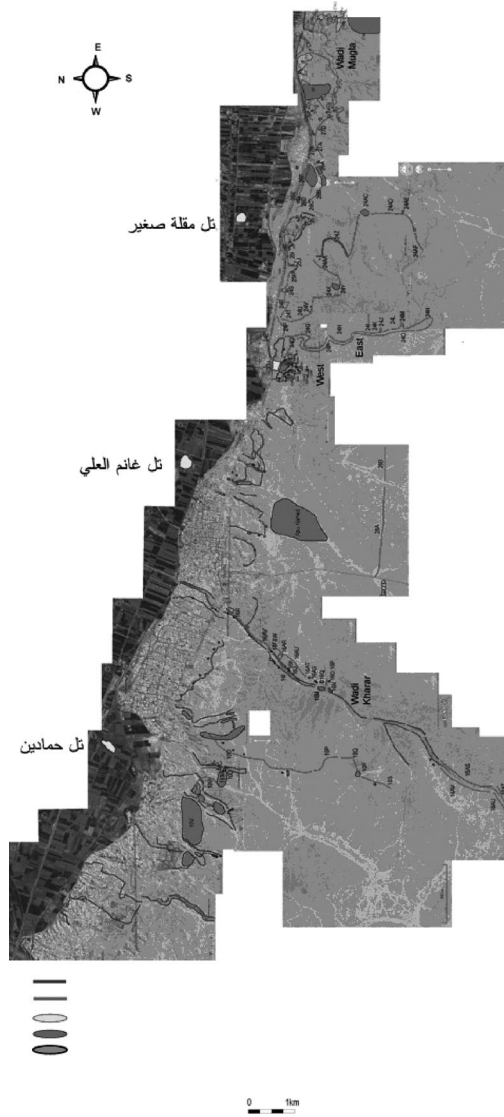
كما تم تحديد أربع مناطق من أجل إجراء المسوحات فيها , حيث شملت الأولى المنطقة الممتدة شرق وادي جزلة وشملت الثانية الامتداد الجنوبي لوادي الخرار أما الثالثة فشملت تل مقلة صغير الذي يمتد على الضفة اليمنى لنهر الفرات إلى الشرق من تل غانم العلي فالمسوحات السابقة لهذه المنطقة أرخت هذا التل إلى عصر البرونز القديم ومن الممكن أنه يتزامن مع تل غانم العلي , وأخيرا المنطقة الرابعة والتي امتدت حوالي 5-6 كم جنوب الهضبة الجنوبية لنهر الفرات 0

حيث بدأت أعمال المسح لهذا الموسم من خلال السير على الأقدام ضمن هذه المناطق , إذ يتم جمع والنقاط معظم الدلائل الأثرية المنتشرة على سطح الأرض , ومن ثم يتم دراستها وتوثيقها من أجل تأريخها وبناء على ذلك يتم الحصول على تأريخ دقيق للمواقع الأثرية المنتشرة ضمن منطقة المسح 0

وبأتباع هذا المنهج من البحث تم تحديد حوالي 85 موقع أثري , امتدت على طول الحافة الشمالية لجبل البشري المقابلة لتل غانم العلي باتجاه شرق غرب , معظم هذه المواقع كانت عبارة عن مدافن تُورخ إلى عصر البرونز القديم , كما عُثر على مجموعة من الأدوات الحجرية التي امتد تاريخها من عصر الباليوليت الأوسط إلى عصر البرونز 0

تل مقلة صغير : الذي يقع على الضفة اليمنى لنهر الفرات حوالي 5 كم إلى الشرق من موقع تل غانم العلي , حيث تبلغ مقاسات هذا التل 110×120 م باتجاه شمال جنوب وشرق غرب , ويبلغ ارتفاعه 6م , يغطي سطح هذا التل مجموعة من المقابر الحديثة , انتشرت بشكل كبير , تم جمع كمية كبيرة من الكسر الفخارية التي أكدت أن هذا التل كان مأهولاً خلال عصر البرونز القديم كما دلت مجموعة الأدوات الحجرية (رؤوس السهام) المنتشرة بجانب الموقع إلى وجود موقع يعود إلى عصر النيوليت بالقرب من تل مقلة صغير (فوق الهضبة الجنوبية المجاورة للتل) وكما لوحظ انتشار مجموعة من الأحجار الكلسية التي تبدو أجزاء من أساس بناء حجري 0

ومن الواضح أن تل مقلة صغير قد لعب دوراً هاماً في المنطقة خلال عصر البرونز القديم كما تل غانم العلي وتل حمادين , حيث امتدت هذه المواقع الثلاث على طول 5-6 كم بجوار مجرى النهر 0 وبناءً على ذلك فإنه من الممكن ان تكون هذه المواقع الثلاث كانت مأهولة بالسكان خلال عصر البرونز القديم 0



مجموعة من الكسر الفخارية من منتجات الفرات وجدت بجانب المدافن الحلقية (Tumuli) المنتشرة على الحافة الشمالية لجبل البشري



صورة من جهة الشمال لموقع تل مقلة صغير مغطى بالمقابر الإسلامية الحديثة

ثالثاً : مسح جيولوجي وجغرافي ضمن منطقة البحث :

(ميتسو هوشينو , جامعة ناغويا 0 تسويوشي تاناكا , جامعة ناغويا 0 تسوشي ناكامورا , جامعة ناغويا 0 تاكاشي سايبينو , جامعة ميجو 0 يوشيبوكي اوكي , جامعة ناغويا)

فقد تم التركيز في هذا الموسم جمع العينات الترابية من المربع 2 في تل غانم العلي بالإضافة إلى عينات أخرى من وادي الخرار وكذلك عينات تم جمعها من طبقة الإسفلت الموجودة في عمق جبل البشري بهدف تحليلها بواسطة استخدام الكربون 14 من أجل الحصول على تأريخ دقيق لهذه العينات 0

حيث تم جمع أكثر من ثلاثين عينة تألفت من مواد متفحمة بالإضافة إلى تربة محروقة من المربع 2 في تل غانم العلي امتدت من الطبقات العليا وحتى أعماق نقطة من هذا المربع 0

كما تم دراسة طبوغرافية المنطقة الممتدة حول المواقع العائدة إلى عصر الباليوليت في وادي الخرار ودراسة الطبقات الجيولوجية فيه 0 حيث أنه من الضروري فحص ودراسة المواقع العائدة إلى عصر الباليوليت وذلك من أجل تكوين فكرة عن إعادة تشكيل التاريخ وملاحظة التغيرات البيئية لهذه المنطقة 0 جميع الأدوات الصوانية التي تم جمعها في هذه المنطقة تؤرخ

إلى عصر الباليوليت الأدنى وحتى النصف الأول من عصر الإيباليوليت (حوالي 20.000 سنة قبل الحاضر) 0

وقد أظهرت الدراسة التي تمت ضمن مقطع جيولوجي متوضع جنوبي تل غانم العلي ضمن منطقة المصنع المحاذي للتل وجود طبقتين جيولوجيتين , حيث تألفت الطبقة العليا من ترسبات حديثة , فيما تشكلت الطبقة الأدنى من المقطع من ترسبات قديمة , وقد عُثر على أداة صوانية ضمن هذه الطبقة , وقد تم جمع تسعة عينات ترابية من هذا المقطع من أجل تحليلها 0



دراسة جيولوجية للمقطع الموجود ضمن المصنع المجاور لتل غانم العلي



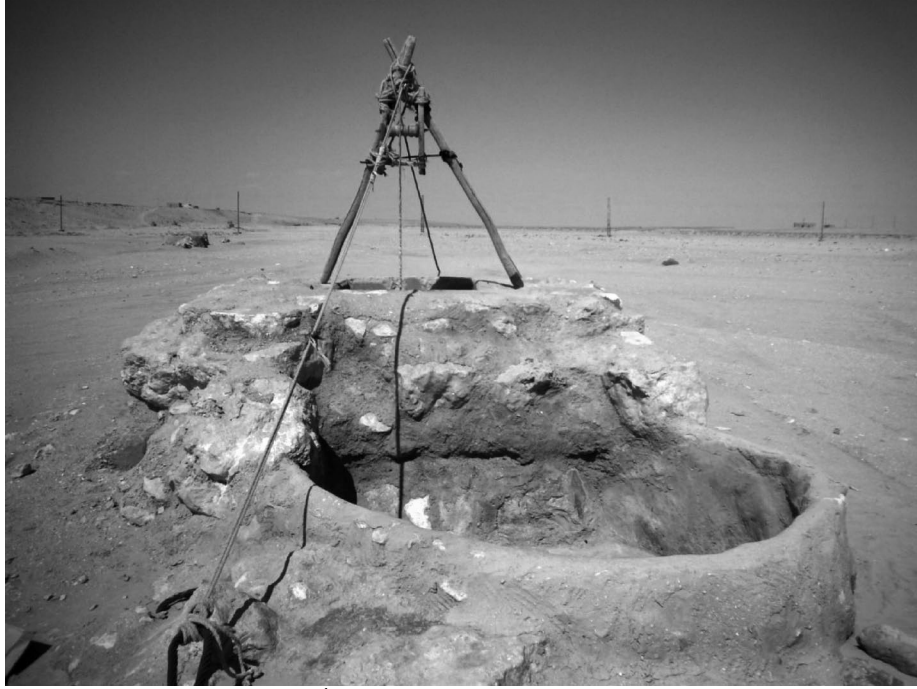
صورة تُظهر الترسبات الكلسية في المنطقة بالإضافة إلى الترسبات الرملية

كذلك تم جمع عينات إسفلتية من منطقتين ضمن منطقة البحث , المنطقة الأولى كانت من منجم الإسفلت الموجود ضمن جبل البشري الذي يمتد بعيداً عن نهر الفرات باتجاه الجنوب , فقد تم دراسة هذا المنجم الذي تبين أنه يتألف من ثلاث طبقات إسفلتية , الطبقة العليا والتي كانت بسماكة 1م تقريباً , أما الطبقة الوسطى فكانت بسماكة 3م , فيما كانت الطبقة الأخيرة سميكة جداً حيث لم يتم التوصل إلى نهاية هذه الطبقة , وقد غطى هذه الطبقات الثلاث الحجر الرملي 0

عينات إسفلتية أخرى كان قد تم جمعها من منطقة زور شمر والتي تبعد حوالي 5كم إلى الغرب من موقع تل غانم العلي حيث بلغت سماكة الترسبات الإسفلتية في هذه المنطقة حوالي 50سم وتتم دراسة هذه العينات وتحليلها في مخابر جامعة ناغويا في اليابان 0

رابعاً : دراسة إثنوغرافية لمنطقة غانم العلي ومنطقة وادي رحوم :

تقع منطقة وادي رحوم عند نهاية الطريق الإسفلتي جنوب بلدة المنصورة , في منطقة يبلغ عدد سكانها حوالي 300 نسمة . معظم هؤلاء السكان ينتمون إلى عائلة الطشوش , وهي جزء من عشيرة الفدعان التي تنتمي بدورها إلى قبيلة عزة التي تُعتبر واحدة من خمسة عشائر بدوية منتشرة في القسم الشرقي من الوطن العربي 0 وقد اعتمدت هذه القبيلة على حياة التنقل منذ القديم , وعلى ذلك فقد اعتمد أهالي هذه القرية حياة الترحل في القرية , ويعتمدون هؤلاء الأشخاص في حياتهم على الرعي فلديهم قطعان من الماعز والأغنام , البعض من هؤلاء (البدو) يعيشون في الخيم ويعتمدون التنقل والترحال بين خيمهم والقرى المجاورة



بئر ماء للاستخدام اليومي في منطقة وادي أو بئر رحوم

وقد سُميت القرية أو المنطقة بهذا الاسم نسبة إلى شخص يدعى رحوم قد جاء إلى المنطقة وقام بحفر مجموعة من الآبار فيها , هذه الآبار التي تُعتبر حاجة يومية لأهلي المنطقة أيضاً هناك علاقة اتصال بين هؤلاء الناس الرعويين وأهالي القرى المجاورة وذلك خلال فصل الصيف 0 إذاً يمكن القول بأن بئر رحوم هي قرية تقع في منطقة حدودية تشمل تجمعات سكانية رعوية متنقلة بالإضافة إلى تجمعات مستقرة بالمنطقة 0

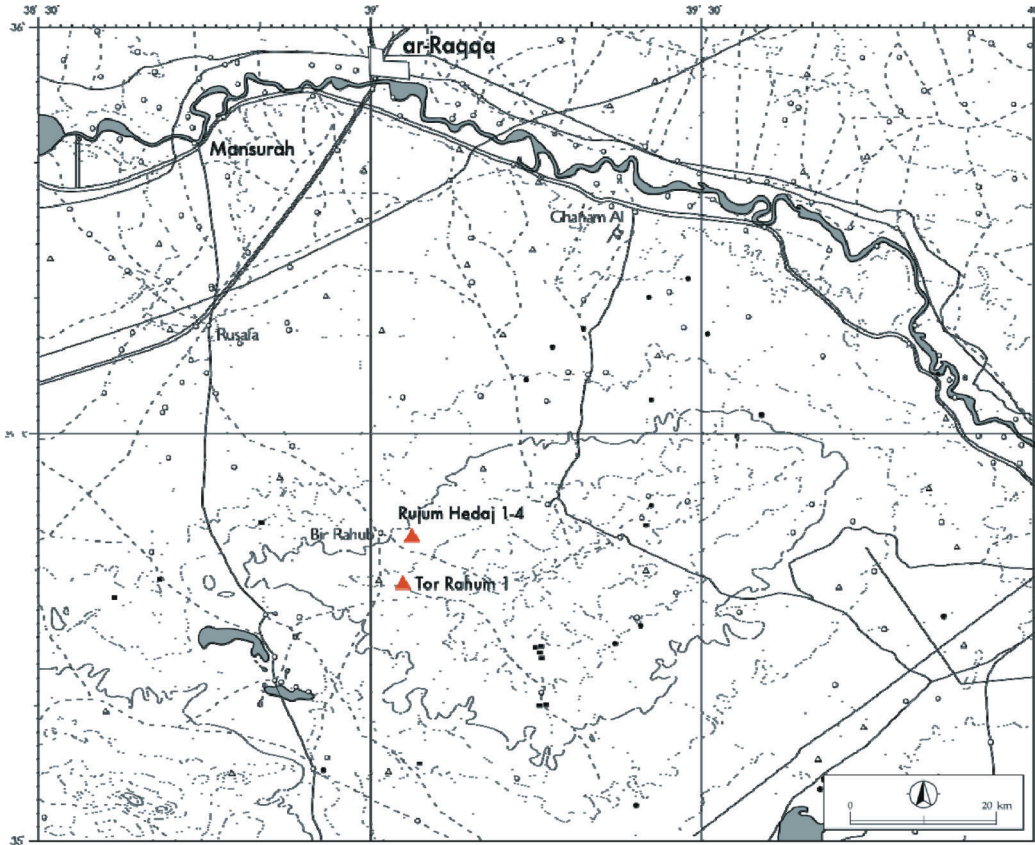
أما منطقة غانم العلي فهي اكبر من منطقة بئر رحوم أو وادي رحوم حيث يبلغ عدد السكان فيها أكثر من 3000 نسمة حيث تبين أن هذه التسمية تعود لاسم شخص قديم عاش في المنطقة وسميت القرية باسمه أما التسمية الحديثة لهذه القرية فهي غرناطة 0

ينتسب أهالي هذه القرية في منشأهم إلى أربعة أسماء تنسب لأشخاص , ثلاثة منهم يرجعون بنسبهم إلى غانم العلي وهم المحمد المردوف والحميدات , أما الرابع فيسمى السبيعات وهي تسمية لشخص هو شقيق غانم العلي 0

خامساً : مسح أثري للمدافن الحلقية(Tumuli) في منطقة طول رحوم

سوميو فوجي بروفييسور جامعة كانازاوا 0 تاكورو اداتشيس مركز دراسات الشرق الاوسط طوكيو 0 هيتوشي إندو جامعة كينكي 0 كازايوشي ناغايا جامعة واسيدة 0 كي سوزوكي جامعة كانازاوا (

تهدف أعمال هذا الفريق إلى تتبع آثار المجتمعات الرعوية المتنقلة في عصر البرونز الوسيط والتي تنقلت ضمن منطقة البشري (إلى الجنوب من حوض الفرات الأوسط) 0



خريطة جغرافية توضح منطقة البحث والدراسة لهذا الموسم

حيث تركزت أبحاث المواسم السابقة على دراسة المدافن الحلقية العائدة للمجتمعات المتنقلة الموجودة ضمن منطقة حداجة 0 أما في هذا الموسم فقد تحولت منطقة البحث إلى دراسة المدافن الحلقية الموجودة ضمن منطقة طول رحوم ، التي تقع عند الحدود الإدارية لمدينة حمص حوالي 8 كم عن منطقة بير رحوم ، حيث تتميز هذه المنطقة بمناخ جاف وتضم هذه المنطقة مجموعة من حوالي 80 مدفنًا حلقياً 0

فقد تم التركيز على إجراء السبر لمدافن القسم الغربي من المنطقة والتي احتوت على مدافن حلقية ذات قياسات كبيرة (كالمدفن BC-117 والمدفن BC-131) بالإضافة إلى ثلاثة مدافن أخرى مجاورة للمدافن المذكورين ومن ثم تمت دراسة حوالي 18 مدفن حلقى 0 حيث تم فتح اسبار لهذه المدافن بعرض تراوح بين 1-2 م باتجاه شمالي جنوبي 0

المدفن BC-116 : وهو مدفن ذو حجم صغير حيث بلغ قطره 4.5م وارتفاعه 30سم هو ذو شكل مستدير تقريباً ، مغطى بالبلاط الكلسي وقد وجد فيه بعض البقايا العظمية الإنسانية 0

المدفن BC-117 : وهو مدفن ذو حجم كبير ويبلغ ارتفاعه 110سم ، محاط بسور حجري يبلغ قطره حوالي 4م وسور خارجي يبلغ قطره 7م ، وجد بداخله عدد كبير من العظام الإنسانية 0

المدفن BC-118 : مدفن كبير أيضا يبلغ قطره حوالي 6.5م وارتفاعه 90سم , ذو شكل بيضوي ويتألف في تركيبه من ثلاثة عناصر وهو محاط بسور حجري ضخمة عثر بداخله على بعض الأدوات الصوانية بالإضافة إلى كمية من العظام الإنسانية 0

المدفن BC-119 : مدفن صغير بقطر 3م وارتفاع 10سم , وجد بداخله مجموعة من الخرز وبعض الأدوات الحجرية دون وجود عظام حيوانية بداخله 0

المدفن BC-120 : مدفن صغير قطره 3.5م وارتفاعه 10سم , لا وجود لأي عظام حيوانية بداخله 0

المدفن BC-121 : وهو ذو شكل بيضوي بقطر 5م وارتفاع 20سم , وجد هذا المدفن تحت هضبة صغيرة , وجد فيه مسمار برونزي 0

المدفن BC-122 : يبلغ قطر هذا المدفن 6م وارتفاعه 20سم 0

المدفن BC-123 : مدفن كبير يبلغ قطره 6م وارتفاعه 70سم , تم الكشف عن اثنين من الأسوار الحجرية المحيطة بهذا المدفن , تم الكشف عن مجموعة من الخرز بالإضافة إلى العظام الحيوانية 0

المدفن BC-124 : يتألف هذا المدفن من هضبة صغيرة بقطر 3.5م وارتفاع 10سم , يأخذ شكل شبه دائري 0

المدفن BC-125 : وهو مدفن صغير يبلغ عرضه 3.5م وارتفاعه 10سم وهو مشابه في هيكلته للمدفن السابق 0

المدفن BC-126 : يبلغ قطره 4.5م وارتفاعه 30سم , فقد تغطي سطح هذا المدفن بتسعة ألواح من الحجر الكلسي , وجد بداخل هذا المدفن مجموعة من العظام الإنسانية مع جمجمة بحالة جيدة 0

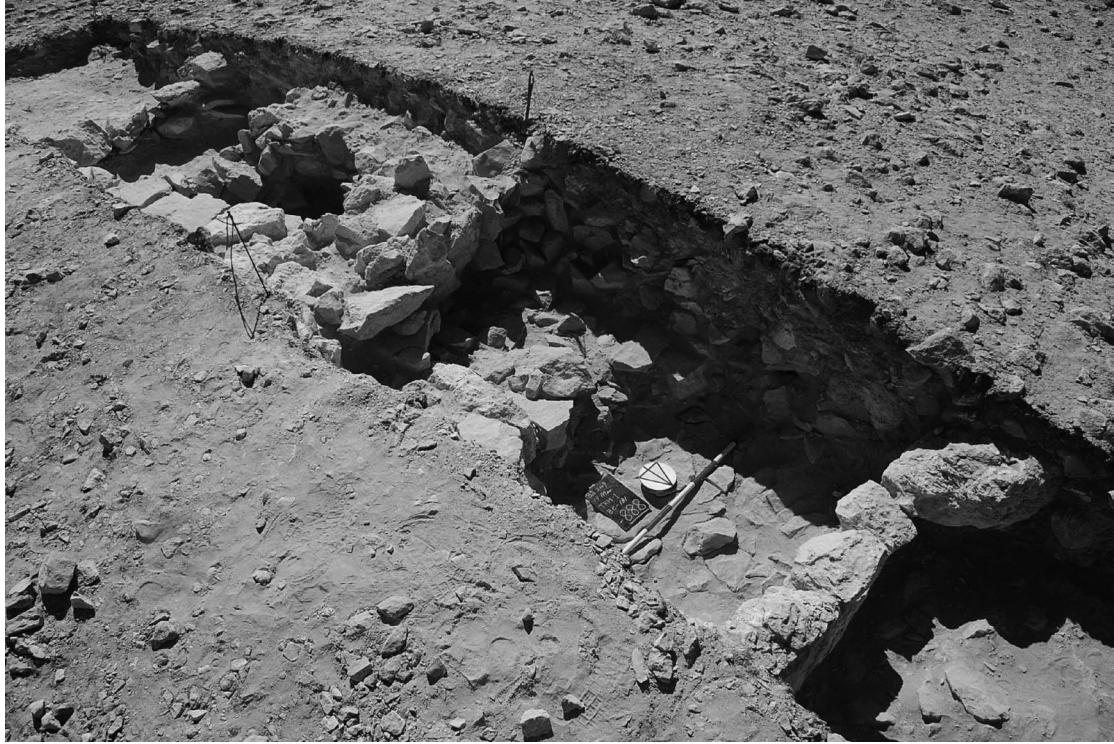
المدفن BC-127 : يبلغ قطر هذا المدفن 4.5م وارتفاعه 20سم , عثر بداخله على بعض العظام الإنسانية ومسمار من البرونز بالإضافة إلى بعض الخرز 0

المدفن BC-128 : مدفن صغير يبلغ ارتفاعه 20سم يغطي سطحه مجموعة من الحجارة الكلسية 0

المدفن BC-129 : مدفن صغير مشابه في تركيبه للمدفن BC-122 , يتألف من كتل كبيرة من الحجر الكلسي , لم يوجد بداخله عظم إنساني 0

المدفن BC-130 : يبلغ قطر هذا المدفن حوالي 6م , وارتفاعه 50سم , وجد بداخله مجموعة من الخرز , كما وجد أيضا مسمار برونزي بالإضافة إلى كمية كبيرة من العظام الإنسانية 0

المدفن BC-131 : وهو مدفن كبير الحجم شكله بيضوي , يتألف من ثلاث عناصر حجرة الدفن بالإضافة إلى سورين من الحجارة داخلي وخارجي , قطره 7م وارتفاعه 90سم , عثر فيه خنجر صغير وغمد من البرونز بالإضافة إلى العظام الإنسانية 0



صورة توضح أعمال السبر في المدفن الحلقي(Tumulus) رقم BC-131

المدفن BC-132 : مدفن صغير نسبياً , فقد بلغ قطره 5م وارتفاعه 30سم 0

المدفن BC-133 : يبلغ قطره 4م وارتفاعه 50سم , وجد فيه قطعتين من الخرز الأحمر بالإضافة إلى كمية من العظام الإنسانية 0

خلاصة : إن جميع الأبحاث والدراسات الأثرية التي نُفذت في منطقة طول رحوم قد أثبتت أن المدافن الحلقيّة الموجودة في هذه المنطقة هي مشابهة للمدافن الحلقيّة المنتشرة في منطقة حداجة فعلى سبيل المثال المدفن BC-117 يؤرخ إلى نفس الفترة الزمنية التي تنتمي إليها مدافن حداجة 1 , أيضا المدفن BC-118 مشابه لمدافن حداجة 2 , والمدافن BC-119 . BC-120. تؤرخ إلى نفس الفترة الزمنية لمدافن حداجة 3 0

يمكن أن نستنتج أن المدافن الحلقيّة في منطقة طول رحوم تؤرخ إلى الفترة الممتدة من نهاية عصر البرونز القديم وحتى بدايات عصر البرونز الوسيط 0

وكتنتيجة أخرى لأعمال هذا الموسم نلاحظ وجود اختلاف في مرفقات الدفن في هذه المنطقة مع مرفقات الدفن التي وجدت في حداجة التي قدمت المدافن فيها العديد من الكسر الفخارية وفي

طول رحوم تم العثور على كمية كبيرة من العظام الإنسانية بينما كانت كمية العظام الإنسانية في مدافن حداجة قليلة جداً 0

كذلك نلاحظ أن مكتشفات البرونز من خنجر صغر وغمد التي عثر عليها من المدفن BC-131 لم يُعثر عليها في داخل حجرة الدفن الرئيسية , وهنا عامل آخر يساهم في التوصل إلى تأريخ طبيعة هذه المدافن الحلقية المنتشرة ضمن منطقة البشري , بالإضافة إلى وجود ثلاث جماجم بشرية بحالة جيدة مما يفتح الطريق أمام الدراسات والأبحاث الأنثروبولوجية في التعرف بشكل أوسع على هذه المجموعات المتنقلة التي شكلت هذه المدافن الحلقية خلال عصر البرونز 0



مجموعة متنوعة من الخرز الذي عُثر عليه في المدفن BC-130

ARCHAEOLOGICAL RESEARCH IN THE BISHRI REGION
— REPORT OF THE NINTH WORKING SEASON —

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June 12, 2009

The 9th season's Syria-Japan Archaeological Joint Mission to the Bishri Region started on April 28 and ended on June 12, 2009.

Dr. Bassam Jamous, the Director General of the Syrian Directorate General of Antiquities and Museums, and Dr. Michel Al-Maqdissi, the Syrian Supervising Adviser for this joint mission and the Director of Archaeological Excavations and Research at the Syrian Directorate General of Antiquities and Museums, kindly helped us towards the realization of this ninth working season, and we would like to express our sincerest gratitude to both of them for their heart-warming cooperation.

The members of the joint mission for the 9th working season are as follows.

Syrian party: Mohamad Sarhan (Director), Ahmed Sultan, Mohamad Jajan, Aed Issa and Ibrahim Khalil.

Japanese party: Katsuhiko Ohnuma (Director), Hirotoshi Numoto, Shogo Kume, Yoshihiro Nishiaki, Masashi Abe, Akira Tsuneki, Atsunori Hasegawa, Chie Akashi, Kenichi Tanno, Sumio Fujii, Kae Suzuki and Kyohei Inoue.

In this working season, we undertook series of research of which outlines are described below.

1. Archaeological Survey around Tell Ghanem Al-'Ali (III)

Yoshihiro NISHIAKI (Professor, the University Museum, the University of Tokyo) and
 Masashi ABE (Visiting Researcher, National Research Institute
 for Cultural Properties, Tokyo)

Our archaeological survey has been currently conducted in the vicinity of the Bronze Age site of Tell Ghanem al-'Ali. As the site is situated on the right bank of the Euphrates, the survey area forms a semi-circular area with a radius of 10 km, encompassing two distinct geo-environmental units, or the Euphrates lowlands and the steppic Bishri plateau. The major objectives of the survey include: (1) to document the historical background of the Bronze Age communities in this region by means of uncovering a wide range of archaeological sites since the Paleolithic period, and (2) to examine land-use patterns during the Bronze Age. Indeed, the previous two seasons of our survey (March to April of 2008, and February to March of 2009) successfully located over a hundred of Palaeolithic to the Bronze Age sites in both the lowlands and the plateau, which have provided valuable information

directly relevant to these goals. In order to further develop our archaeological database we conducted an additional survey in May of 2009 with the same survey method as outlined in the previous report (al-Maqqdissi and Ohnuma 2009).

First, we surveyed the valley of Wadi Jazla West (Area 23), situated approximately 2 km from Tell Ghanem al-‘Ali. The previous seasons’ investigation revealed a Bronze Age sedentary settlement as well as its cemetery in the lower stream of this wadi. Its further upstream was surveyed in this season (Fig. 1), which enabled us to define the southern extension of the cemetery. Numerous, heavily plundered shaft tombs were located. One of such tombs contained three complete pottery vessels (Fig. 2), derived from Middle Bronze Age. The survey along this wadi also produced a series of Bronze Age flint scatters, reflecting intensive exploitation of this area in this period. In addition, a short-term Neolithic station was also identified. It was located at a confluence of two small tributaries of the wadi. The recovered artifacts, consisting of broken arrowheads and knives only, suggest a hunter’s stop for the function of this site.

Second, the valley of Wadi Beilune, located nearly at the eastern limit of the survey area, was also investigated. When we visited this wadi in the last season, we discovered a very impressive Bronze Age cairn field, consisting of more than one hundred cairns built with gypsum rocks and stone chambers (Figs. 3 and 4). The left bank of this wadi (Area 26), which had been less fully explored, was surveyed in this season again. A western limit of the cairn field was thus defined, along with the recovery of Bronze Age and earlier flint scatters that probably related to the short term activities (Fig. 5). Situated close to the northern fringe of the steppe plateau facing the lowlands, this grave complex stands out in our survey area in terms of the tomb type that is more comparable to that known in the Bishri mountains itself. Also unique to this complex is that it does not have a permanent settlement nearby, while all the large graveyards we have discovered so far are situated close to sedentary settlements (Tell Ghanem al-‘Ali, Tell Hamadin, and Jazla). These would highlight the significance of this cairn field for exploring the relationships between the lowlands and the steppe communities in the Bronze Age.

Third, we made a survey to identify local lithic raw material sources for the tell-based Bronze Age community. The excavations of Tell Ghanem al-‘Ali as well as our previous surveys indicate that the Bronze Age flint knappers made stone tools using water-rolled cobbles and pebbles. Appropriate flint pebbles and cobbles for tool production are hardly visible in the lowlands today due to the thick alluvial deposits. Accordingly, we investigated Quaternary fluvial deposits of the ancient Euphrates. As a matter of fact, we readily encountered rich gravel layers in a terrace extending from Tell Ghanem al-‘Ali to the west along the southern edge of the lowlands (Fig. 6). They contained pebbles and cobbles with a diameter of 10 to 20 cm, which are quite comparable to those used in the Bronze Age (Fig. 7). The nearest edge of the terrace is just a few hundred meters south from Tell Ghanem al-‘Ali. The terrace is generally known as Qf II, on which the modern villages of Tell Ghanem al-‘Ali and Tell Hamadin are situated. It is also known as containing rich Lower and Middle Palaeolithic artifacts. This local flint source would have been more frequently used than the massive fluvial deposits of Qf III, developed on the edge of the plateau from the area of Wadi Beilune to the east. We actually discovered Bronze Age cores and flakes at some of the gravel cuttings of this terrace (Fig. 8; Area 10). In addition, the excavated flint assemblages from Tell Ghanem al-‘Ali have yielded a small number of reused Lower and Middle Palaeolithic cores, which were most likely to have been brought in from the gravel layers to the settlement as raw materials.



Fig. 1 Surveying the left bank of Wadi Jazla West.



Fig. 2 Middle Bronze Age pottery collected at one of the plundered shaft tombs at Wadi Jazla West.



Fig. 3 Distant view of the large Bronze Age cairn field near Wadi Beilune.



Fig. 4 A Bronze Age cairn near Wadi Beilune.



Fig. 5 Bronze Age and earlier flint scatters along Wadi Beilune.



Fig. 6 A modern cutting of the Quaternary fluvial deposits near Tell Hamadin.



Fig. 7 A Bronze Age flint core discovered near the Quaternary fluvial deposits.



Fig. 8 Close view of gravel layers in the Quaternary fluvial deposits.

2. Collection of Botanical Remains from Tell Ghanem al-Ali and Tell Shobbout, and Vegetation Survey of the Bishri Hills

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1. Tell Ghanem al-Ali

One soil sample from Square 6 and 9 samples taken at the previous excavation season were carried out with water flotation. Their total amount was about 50 litres. Some samples were rich in charred remains, including large fragments of charcoal. At least barley seeds were seen in the remains but we need further observation using a microscope. The charred plant remains collected will give us more information about the subsistence of Early Bronze Age.

Table 1 Charred Remains from Tell Ghanem al-Ali 2009.

No.	Square	Locus
TGA1-27	1	—
TGA1-30	1	76
TGA2-3	2	18
TGA2-6	2	43
TGA2-24	2	107
TGA2-42	2	140
TGA2-43	2	152
TGA2-44	2	155
TGA3-1	3	3
TGA6-1	6	1
Charred wood	6	1

Table 2 Charred remains from WS1 2009.

WS1-1	1A-1	N-S Section
WS1-2	1A-1	N-S Section
WS1-3	1A-1	N-S Section
WS1-4	1A-1	N-S Section
WS1-5	1A-1	2
WS1-6	1A-1	3
WS1-7	1A-1	6
WS1-8	1A-1	18
WS1-9	1A-1	21
WS1-10	1A-1	25
WS1-11	1A-1	33
WS1-12	1A-1	34
WS1-14	1A-1	41
WS1-15	1A-1	43
WS1-16	1A-1	45

2. Tell Shobbout

We took 16 soil samples from the trench sections and fill of the chamber of the tomb. Two of them belong to Roman period and the others are from the lower layers. In total 134 litters of soil was processed with water flotation. A few charred remains were recovered. They also need to be identified by microscope in Japan.

3. Vegetation survey of the Bishri hills

Vegetation of the Bishri hills was investigated from north (village of Ghanem al-Ali) to south (the Bir Sbai, southern edge of the Bishri hilltops).

We had tried the similar research in 2007, but it was not successful due to a sudden sand storm. The tentative results are shown in Table 3.

Table 3 Vegetation of Bishri hills from Ghanem Ali village to Bir Sbai.

position	main plant
0 km	(Ghanem Ali village)
8 km	Chenopodiaceae(Noaea type):70%, Astragalus spinosus:20%, Chenopodiaceae cf.:5%
14 km	Leguminosae:90%
23 km	Peganum harmala:50%, Solanum sp.:15%, indet.cf.Compositae:10%, Anabasis sp.:5%, Capparis spinosus
39 km	(hilltop) indet.cf.Compositae:95%, Peganum harmala, Hordeum murinum
41 km	(a basin after the peak) Elyngium sp.:40%, Compositae cf.Achillea:40%, Peganum harmala:15%, Centaurea sp., Hordeum murinum, Elemopyrum sp., Malva sp., Astragalus sp., Polygonum sp., Heliotropium sp., Mathiola cf.
43 km	Chenopodiaceae(Noaea type):70%, Anabasis sp.:25%, Euphorbia sp.
Bir Sbai	Nigella arvensis, Anchusa, Hipecoum, Hordeum spontaneum, Heliotropium, Apiaceae, Astragalus, Compositae, Calendula, Malva, Anabasis, Chenopodiaceae (Noaea type), Salsola cf., Labiatae, Alocea, Papaver

3. Sondage in Square 6 of the Site of Tell Ghanem Al-Ali

Katsuhiko OHNUMA (Professor, the Institute for Cultural Studies
of Ancient Iraq, Kokushikan University, Tokyo)

Square 6 (3 m by 3 m) was established for sondage (trench excavation) in the northern part of the site of Tell Ghanem Al-Ali (Fig.1). This square establishment was aimed to obtain significant information concerning the duration of the site exploitation in the Bronze Age and the intra-site functional variability.

As the result of the sondage, a pit grave was unearthed with human bones and 7 pieces of pottery. The human bones were not complete, with most of the skull and one of the legs missing. Two of the 7 pieces of pottery were unbroken and complete, but the resting 5 were broken, though not to a very high degree (Figs. 2 and 3).

Layers under the pit grave were not excavated in this working season, so the stratigraphy of Square 6 briefly described below is limited within the surface soil down to the base of the pit grave.

Layer 1: Surface soil, sloping slightly downwards into north direction in the thickness of 10 to 15 cm.

Layer 2: Brownish-coloured hardened soil, 20 cm in accumulation at the thickest part, bearing sporadic and discontinuous lines of ash. Potsherds of the Early Bronze Age were unearthed from it.

Layer 3: Yellowish hardened soil. This layer had been cut down at the time of the making of the

pit grave. Potsherds of the Early Bronze Age were also unearthed from it. The cutting angle of the pit grave is not steep, suggesting that the pit had been dug shallow with simple and non-systematic cutting. It is highly likely, however, that the original pit had been deeper than is seen today, for the accumulation above the pit grave should have been weathered away to a very high degree.

Layer 4: Layer 4 is the construction level of the pit grave. The pit had been made by digging the surface soil down through Layer 3. The bottom of the pit was some 90 cm below the present surface of the tell at the deepest, but the northern-most part has been so much weathered as to be exposed as the tell surface. The outline of the pit was not of a circle shape but was a shape describable as meandering circle. This may suggest a simple and non-systematic construction of the pit grave. The human bones, though missing many parts, seem to have retained original posture of contracted burial, and the 7 pieces of pottery also seem to have retained original allocation.

Layers 1 and 2 overlying the pit grave contain Early Bronze Age potsherds, suggesting that in the area around Square 6, southern area in particular, there had stood some important building(s) of the Early Bronze Age. This suggestion is supported by the fact that fine quality objects, such as human and animal terracotta figurines and wheels of terracotta chariot, highly suggestive of important buildings such as residential center where these objects had been kept, have been found concentrated around Square 6 in the research so far undertaken.

The features of the pottery unearthed in our previous sondage in Square 2, which was established in order to confirm the stratigraphical sequence of the site of Tell Ghanem Al-Ali, demonstrate that the exploitation of the site started in the Early Bronze Age and ended within it.

Surface finds from the site, however, have so far suggested that this site was also exploited in the Middle Bronze Age, though seemingly on a far smaller scale than in the Early Bronze Age.

The pit grave in Square 6 overlies two Early Bronze Age structure complexes with different wall directions. This fact and the features of the pottery from the pit grave date it to the Middle Bronze Age.

It is highly probable that the site of Tell Ghanem Al-Ali was at its height in the Early Bronze Age and became diminished in later period in the Middle Bronze Age, with sporadic houses and simple pit graves on it.

If the assumption above is proven to be correct through future excavations, we can share the hypothesis advocated by many scholars that the Bishri region near Tell Ghanem Al-Ali fell into chaos immediately after the collapse of the Akkadian empire, with no political control. This hypothesis also advocates that many of the inhabitants in the region moved towards east and south, that is, Amorites' migration to Assyria and Babylonia.

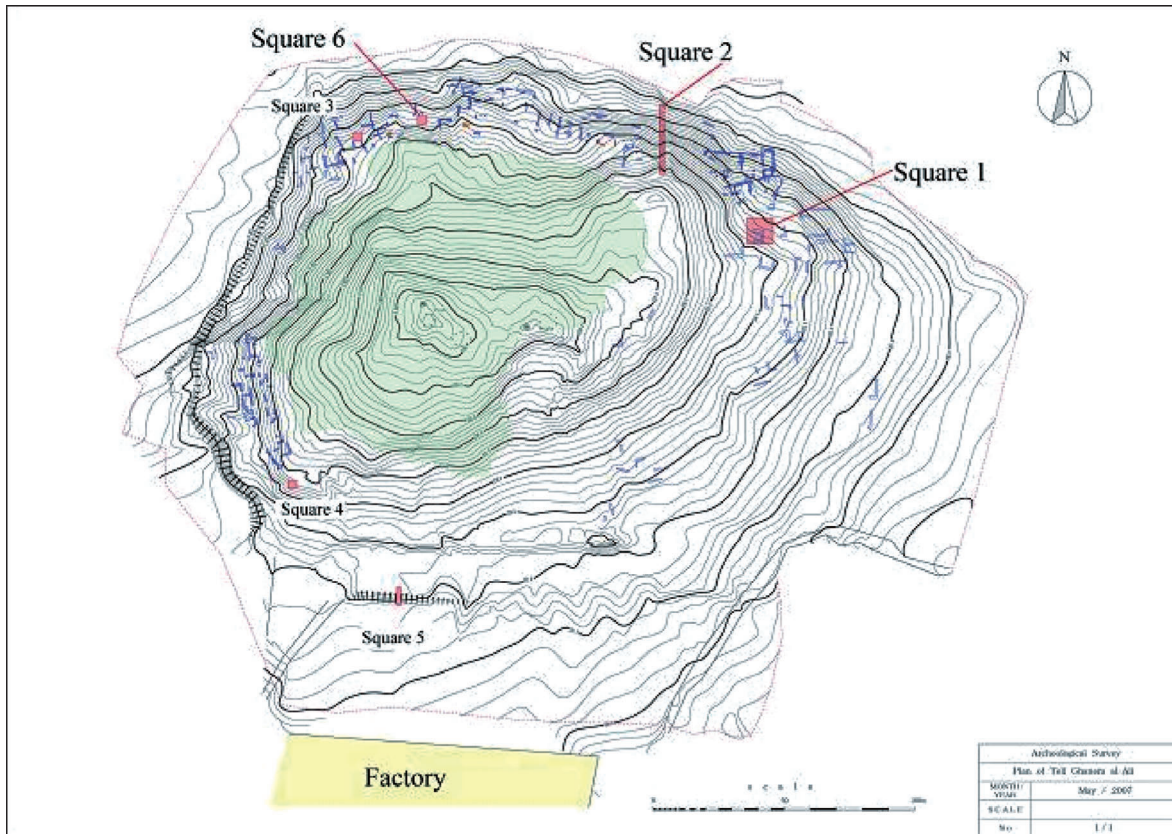


Fig. 1 Overall plan of Tell Ghanem Al-Ali showing Square 6 from which a pit grave was unearthed.



Fig. 2 Pit grave unearthed in Square 6.



Fig. 3 Unbroken complete pottery unearthed.

4. Soundings of hilltop burial mounds near Tell Ghanem Al-‘Ali

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1. Introduction and objectives

During the course of Syro-Japanese Archaeological mission to Jebel Bishri, investigations of Early Bronze Age burial grounds near Tell Ghanem al-‘Ali has been conducted since 2008. The locations of those cemeteries adjacent to the settlement and the contemporaneous period of the two sites suggest the graves were established by the EBA inhabitants of Tell Ghanem al-‘Ali. The last two seasons’ researches including cleaning and survey of the seriously plundered grave-clusters have demonstrated several significant results, such as considerable collections of artefacts for dating, inter-/intra site variations of the individual grave-clusters, and their unique relationships to the landscapes (Numoto and Kume 2009a, 2009b).

The third season of the investigation (28th April to 21st May, 2009) focused on soundings of two burial mounds called Tell Shabbout by locals situated on the northern edge of Bishri plateau, approximately 1 km south from Tell Ghanem al-‘Ali (Fig. 1). The aims included documentation of EBA burial structures and salvage of contemporary artefacts, since the surfaces of the mounds have clearly indicated several robbers’ pits, suggesting intensive plunderings in modern and antiquity have seriously disturbed their material traits. Because the visible hilltop location of the mounds, overlooking Tell Ghanem al-‘Ali, implies some monumental or elite nature of the tombs, the goals designed above possibly contribute to an assessment of characteristics of the burials as well.

2. Sounding at Tell Shabbout 1

This mound situated on high bluffs between Wadi Shabbout and a small unnamed wadi, some 279 m above sea level. The mound itself measures approximately 15 m in diameter and 3 m in height from the surface. As an excavation method, a 2 m-width trench was laid out to document the stratigraphy of the mound and excavated to the bedrock. The trench was also enlarged to unearth the main chamber or other archaeological features. The stratigraphy indicated the mound contained ca. 2 m high natural hillock including gypsum stone outcrop on the top, and comprised at least two main occupational phases, the earthen mound and the cairn.

Phase 1: cairn

A cairn was discovered beneath the Phase 1 earthen mound (see below). It seems that the cairn was seriously destroyed before construction of the earthen mound, disturbing reconstruction of entire structures of the cairn. However, the burial was apparently consist of three main elements; chambers, rings and mound (Figs. 2, 3).

1) Chambers

The main chamber was above-ground rectangular structure, measuring ca. 4.5×2.5 m in length and width (Fig. 4). The axis of the chamber approximately oriented to the geographical north towards Tell Ghanem al-‘Ali. The surviving walls were ca. 70 cm in height and constructed of gypsum stone slabs in at least six to seven layers, using different sizes of slabs. No floor pavements were recovered, but flat surface of the gypsum stone outcrop on the top of the natural mound was apparently employed as the purpose. A narrow rectangular annex -some 40 cm width- was attached to the north of the main chamber (Fig. 5). As a result, the chamber demonstrates some T-shaped structure. Although

roofed stones were not clearly confirmed, monolithic stones might have covered the narrow space of the annex.

2) Ring walls and mound

The inner ring surrounding the main chamber and the annex has a diameter of some 7 m, arranging in three to four layers of different size of stones (Fig. 4). The outer ring that indicates the edge of the mound was poorly preserved. The traits indicate approximately 9 m in diameter, enclosing the entire mound of the cairn. The some 70 cm fill of the mound consist of greyish brown soils with fine gravels containing at least two to three layers of gypsum stone slabs in the SW quadrant.

Phase 2: earthen mound

A earthen mound was covering the earlier cairn described above and the original natural hillock, spreading overall of Tell Shabbout 1 (Fig. 1). The deposits of the earthen mound mainly consist of greenish grey brown soil with fine gravels. Although the height of the mound fills depends on conditions of surviving deposits of the earlier cairn, the maximum thickness of the fills was some 1 m at the point of the main chamber of the cairn.

Finds and dating

Intensive plunderings in modern and antiquity and scattered nature of the collection from Tell Shabbout 1 has disturbed dating of the discovered cairn and earthen mound. Nevertheless, evidence suggests the cairn was established in the Early Bronze Age, while later Roman/Byzantine people re-used the place as burial mound. For example, collected samples are sparsely including typical Early Bronze Age sherds (Fig. 6). On the other hand, deposits of the earthen mound have produced many fragments of Roman/Byzantine terracotta coffins (Fig. 7), suggesting the mound was used as a burial place in the period. A few isolated metal samples also demonstrates the place was used as a burial site in both periods of Early Bronze Age and Roman/Byzantine. In addition, a series of unique Bronze Age knapped stones that recently defined at Tell Ghanem al-'Ali and other surveyed sites by the Syro-Japanese mission (Nishiaki pers. comm.) were abundantly collected from the site. A viewpoint of burial typology may support the dating. An Early Bronze massive cairn field contains similar cairns constructed of quarried gypsum stones has been discovered by the mission in the surveyed area, some 10 km southeast from Ghanem al-'Ali (Nishiaki et al. 2009). Roman/Byzantine earthen mounds have frequently been reported in the Tabqa reservoir area on the Syrian Euphrates.

Sounding at Tell Shabbout 2

The burial mound is situated some 20 m to the south of Tell Shabbout 1, measuring ca. 10 m in diameter and ca. 1 m in height. Sounding of the mound was conducted according to similar procedures as Tell Shabbout 1. Stratigraphic observations indicated the mound was artificially constructed on the low -approximately 40 cm- natural mound, containing two graves.

Grave 1

A pit grave was discovered beneath the artificial mound, cutting into the bedrock. The burial chamber measures ca. 2.8×1.2 m in length and width, and ca. 0.6 m in deep (Fig. 8). The orientation of the chamber was roughly NW-SE direction. The southeastern edge of the chamber has been cut, constructing a step-like structure. On the other hand, a 20 cm deep small pit was excavated on the bottom of the northwestern side. Function of the pit is still uncertain. The grave was surrounded by a ca. 80 cm high semi-circular stone wall built of undressed gypsum stones in different sizes. Because the wall is built on the bedrock, it is quite probable that those structures were constructed in contemporary time. However, purpose of the stone wall and relationship to the chamber remain

uncertain. Very few materials were collected from the chamber, including fragments of Roman/Byzantine terracotta coffin.

Grave 2

A terracotta coffin burial was discovered on the eastern surface of the mound, cutting the stone wall described above. The size of the coffin measures ca. 2.0 × 0.6 m in length and width and 0.3 m in deep. The orientation of the burial was roughly E-W direction. Undisturbed condition of the burial produced a complete human remain (Fig. 9), but no burial goods were recovered apart from some stones set on the surface of the burial, perhaps for the purpose of marking or the like. Analysis of the human remains is still in progress. Accordingly, no information of the bones has thus far been obtained.

Dating

Because of sparse samples recovered from the mound, dating of the structures remains difficult. However, collected materials predominantly consists of the Roman/Byzantine period, including the complete coffin unearthed from grave 2, suggest all structures could be tentatively dated to the Roman/Byzantine period.

Summary

The third season targeted on soundings at two burial mounds demonstrated a unique burial practice in the study area, implying continuous selections of the hilltop as a funerary space from the Early Bronze Age to the Roman/Byzantine periods. However, considering the overall goals of the Syro-Japanese joint project to Jebel Bishri, of particular note is discovery of the cairn at Tell Shabbout 1 in the surroundings of Tell Ghanem al-‘Ali. Cairns in the Near East suggests burial customs practiced by mobile people in general. For example, investigated several cairn fields as part of the project has been situated on the northern flank of the Bishri mountains, where mean annual rainfall is less than 200 mm, suggesting grazing area for mobile pastoralists (Fujii 2009, Fujii et al. 2009). If the hilltop location of the discovered cairn at Tell Shabbout 1, directly oriented to Tell Ghanem al-‘Ali, implied some monumental or elite nature of the tomb, the origin or ancestors of the inhabitants of the settlement might have more close connection with mobile ways of life than sedentary. This assumption remains to be tested, since obtained archaeological data from the site has been restricted to date. Further explorations in the field and laboratory have still been required.

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Fig. 1 Tell Shabbout 1 and 2 before soundings, overlooking Tell Ghanem al-‘Ali.



Fig. 2 Cairn discovered beneath earthen mound at Tell Shabbout 1, looking north.



Fig. 3 Discovered cairn at Tell Shabbout 1, looking south.



Fig. 4 Main burial chamber of the cairn. A seriously disturbed above-ground structure was preserved, looking north.



Fig. 5 Inner ring and northern wall of annex, looking east.

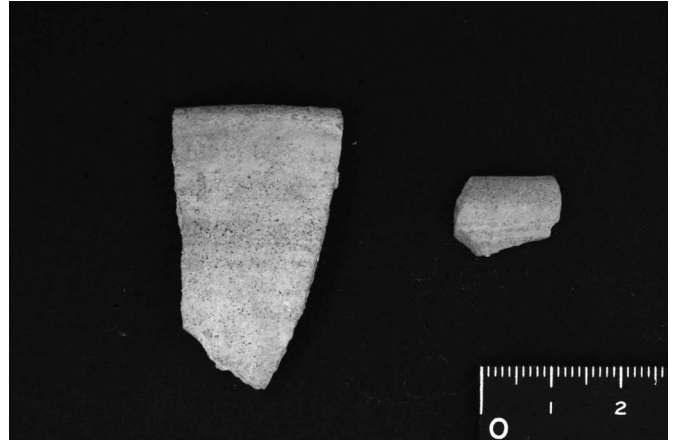


Fig. 6 Possible Early Bronze Age sherds from Tell Shabbout 1 (Left: hemispherical bowl; Right: Euphrates Fine Ware).



Fig. 7 Fragment of Roman/Byzantine terracotta coffin from Tell Shabbout 1.



Fig. 8 Pit grave and surrounding stone wall at Tell Shabbout 2, looking southwest.



Fig. 9 Undisturbed terracotta coffin burial and human remain.

5. A Short History of Ghanem al-Ali Village: An Ethnoarchaeological Study on the Modern Islamic Cemeteries

Akira TSUNEKI (Professor, University of Tsukuba)

Tell Ghanem al-Ali has been one of the focuses of Syro-Japanese archaeological project to Jabal Bishri since 2007. This Early Bronze Age settlement was located just northeast of a modern village of the same name. The top of the mound has been covered with modern Islamic graves of the villagers. They seem to be an obstacle for the archaeological excavations. However, it will give us a chance to study the formation of cemetery, one of the integral materials for the archaeological studies. In addition to the mound top cemetery, the Ghanem al-Ali villagers have other four cemeteries within the village itself. Therefore, I was interested in the relationship between the cemeteries and human groups. For understanding of this relationship, I started to gather the information from the villagers about the history of Ghanem al-Ali village in 2007 (Tsuneki, A. 2008 “A Short History of Ghanam al-Ali Village”, *Al-Rafidan* 29:184–190). Based on this information, a field survey of the modern cemeteries was carried out on May 23–25, 2009. This is a primary report of the results of this short ethnoarchaeological survey.

Ghanem al-Ali Villagers

The location and the basic data of Ghanem al-Ali village was reported in the former article (Tsuneki *ibid.*). Here, I only summarize the important data for studying the relationship between human groups and cemeteries.

The number of the present villagers counts around 10,000, and all of the villagers belong to Bu-Shaba’an *Qabila* and al-Subeat *Ashira*. Therefore, they belong to the same human groups in tribal level. However, *Ashira* can be divided into ten *Ailas* based on the lineages. Fig. 1 shows the lineages of the modern Ghanem al-Ali villagers.

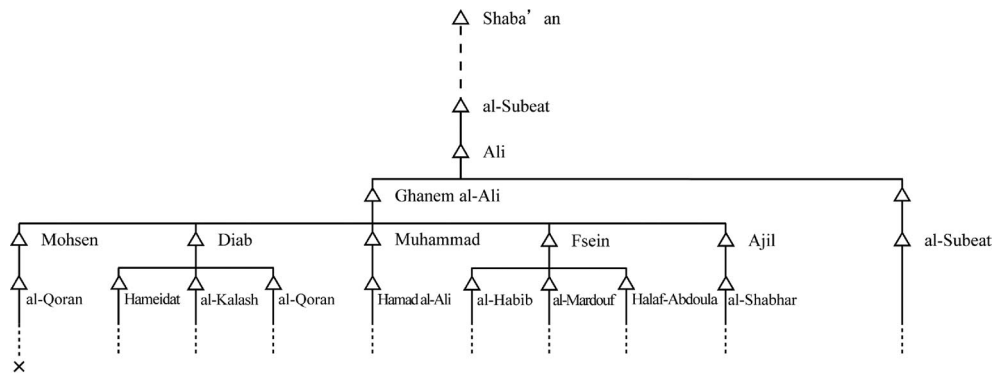


Fig. 1 Lineages of Ghanem al-Ali villagers.

Ghanem al-Ali, the original ancestor of the villagers, had five sons; Mohsen, Diab, Mohamad, Fsein, and Ajil. Each son had his own sons as follows.

- Mohsen; al-Qoran
- Diab; Hameidat, al-Kalash, al-Qoran
- Mohamad; Hamad al-Ali
- Fsein; al-Habib, al-Mardouf, Halaf-Abdoula
- Ajil; al-Shabhar

The descendants of eight sons, without those of al-Qoran of Mohsen, have continued to live together

and consist of the basic big families (*aila*), in former and present Ghanem al-Ali village. The former small village was located along the Euphrates River, about 2 km north of the modern village, and the villagers has used Tell Ghanem Ali as their graveyard since their former village period. This former riverside village was severely damaged by the flood in 1947, and the people decided to move to the present place near the cliff of the river terrace. Therefore, the modern Ghanem al-Ali village has been inhabited since 1947. The people of Al-Subeat, another big family, started to inhabit the village from that time. Before 1947, they had another small riverside village apart from the former Ghanem al-Ali village. They are not the direct descendants of Ghanem al-Ali, though their ancestor was the brother of Ghanem al-Ali.

Residential Areas

Therefore, we can recognize nine big families in the present Ghanem al-Ali village. The distinction of big families may affect the daily life of the villagers. Fig. 2 shows the residential area of each big family.

The population of al-Shabhar *aila* is quite limited (only a few households), and they were excluded in the study of residential and cemetery systems. Though the number is quite small, Al-Shabhar family have been respected by other villagers, because they has served as local judge, called *Mhtar*. The supra-*ailas* (Mohsen, Diab, Mohamad, Fsein Ajil) also affect the residential system. For example, the descendants of Fsein, i.e., al-Habib, al-Mardouf and Halaf-Abdoula, share the neighboring areas in the northwestern part of the village. The people of al-Subeat, a sole big family originated from non-direct brotherly descendants and joined Ghanem al-Ali later, share the western edge of the village near Wadi Harar. The division of residential area based on *aila* has been strictly kept since the beginning of the village, and each residential area has extended from the north-central part of the village. Some *ailas* like Hameidat and al-Qoran jumped into a detached block beyond their original residential areas.

Modern Cemeteries

The *aila* distinction affected not only the residential system, but also the cemetery system. Five cemeteries have been used by the Ghanem al-Ali villagers (Fig. 1). For analyzing the locations of each grave in the cemeteries, the author used Quick Bird space image which was photographed on April 28, 2009.

Cemetery 1: It is constructed on the surface of Tell Ghanem al-Ali, and it is the largest and oldest cemetery for the villagers. Over one thousand graves were visible on this cemetery. The number of graves is very difficult to count correctly, because old graves were weathered by exposure and their gravestones were fell down and destroyed.

The villagers believed that this cemetery was started by putting up the grave for a *sheikh*, named Mohammad al-Shoukh, on top of the mound. His grave was encircled by a stone wall with the grave of his son, Ahamad al-Shoukh. They belong to Hamad al-Ali *aila*. Seven such *sheikh's* encircled graves were visible on top of the mound (Fig. 3). Two in the east belong to Hamad al-Ali *aila*, and four in the west belong to Mardouf *aila*. These *sheikh's* graves were worshipped as the village's folk remedy. The villagers come to here to pray for curing their diseases.

The graveyard has been extended around these *sheikh's* graves. Therefore, the nearer to the center of the cemetery, the older graves we encounter. Unfortunately, the old graves lack an epitaph on a gravestone. Most of the gravestones were mere natural gypsum stone. Therefore, we cannot check up the name of the dead and his/her passing year. The graves in the periphery of the cemetery are newer, and most of them have a gravestone with epitaph. The oldest passing year of the epitaph is 1937, which was engraved on the re-built gravestone on the mid-slope of the mound in the northwestern

part of the cemetery (Hameidat block). It is clear that this cemetery has been used before the establishment of the modern Ghanem al-Ali village. It can date back to at least over one hundred years. Though we encounter a gravestone with 1949 passing year, most of the old gravestones with epitaph tell the passing year of 1960s. The number of graves in Cemetery 1 seems to decrease from 1970s, because the villagers began to construct their cemeteries inside the village. However, some families continue to use Cemetery 1 as their graveyards. They wanted to go to their final resting place with their grandfathers and fathers. So, we encounter the new graves, especially in the periphery of the cemetery. Based on the epitaphs of the gravestones and villagers' information, the big families (*ailas*) have shared the different areas of the Cemetery 1 (Fig. 4). The regulation of locality of graves for each big family has been kept since the beginning of cemetery.

Cemetery 2: This cemetery is located on the right bank of Wadi Harar, west of al-Subeat residential area (Figs.1 and 5). It was constructed for al-Subeat *aila* in the beginning of 1970s. There are about one hundred burials in this cemetery, and all of the graves belong to al-Subeat *aila*. This *aila* can be divided into four sub-*ailas*; Faraj, Hodr al-Subeat, Gorto and al-Fjeini. These sub-*aila* divisions are related to the locations of graves. The graves of Faraj sub-*aila* are located in the northwestern part of the cemetery, with the graves of Gorto sub-*aila*. Hodr al-Subeat sub-*aila* share the southwestern part, and al-Fjeni sub-*aila* share the northwestern part. There are small vacant lots between these three blocks (Fig. 6). As the marriages happen frequently between these sub-*ailas*, we can observe some brides' graves in each block.

Though the grave locality of each sub-*aila* has been kept severely, we cannot observe remarkable regularity among the gravestone types. Many types of gravestone were used in this cemetery. Though the older type was a simple gypsum stela, new types of gravestone have been made of concrete models (Fig. 7). Many new type gravestones were used for all sub-*ailas* in this cemetery. In other words, I cannot point out any regularity between gravestone types and sub-*ailas*. This is also the case in other cemeteries of Ghanem al-Ali. Nowadays, the people buy the gravestone from the gravestone factories, and each factory makes its own type of gravestone (*shahida*). The difference of gravestone types depends on the factory, and it is not related to *ailas*.

Cemetery 3: This cemetery is located in the western part of the village, at the junction of the residential blocks of al-Habib, Halaf-Abdoula, and Hameidat *ailas*. It was made on a small natural hill (Fig. 8), and this hill has been used as cemetery for the descendants of Fsein, i.e., al-Habib, Halaf-Abdoula and Mardouf *ailas*, since the middle of 1970s. The very close relationship between these three *ailas* can be seen not only in the residential localities, but also in the cemetery system. They always share the same locality in Cemetery 1 and Cemetery 3. Cemetery 3 consists of about 150 burials. Though the localities within the cemetery can be roughly divided, they are intermixed each other (Fig. 9). The first burial of Cemetery 3 is a grave of Halaf Mohamad Habib on the top of the hill. His passing year is 1976. Then, the cemetery extended from the hilltop toward the foot.

Cemetery 4: It is located below the cliff of the Euphrates river bank, at the southern junction of Hameidat and al-Qoran residential areas (Fig. 10). Cemetery 4 has been used by these two big families. Both of them are the descendants of Diab supra-*aila*. The first grave of the Hameidat is that of Fsein Ali Hameidat, who died in 1965. His grave is located at the center of the cemetery (Fig. 11). The first grave of the al-Qoran group is that of Halaf al-Salem, dug in 1973. Then until now, about 300 people were consigned in this cemetery. The graveyard locality of each *aila* is relatively well defined. The Hameidat graves share the southwestern part of the cemetery, and the al-Qoran graves were located in the rest parts. In other words, they have constructed their graves in nearer location from their residential blocks. Four square-shaped concrete-made graves were constructed in the al-Qoran

block (Fig. 12). They are the graves belonging to a same rich family.

Cemetery 5: It is also located below the cliff of the Euphrates river bank (Fig. 13). It has been constructed near Wadi Ges, at the junction of Hamad al-Ali and al-Kalash *ailas*' residential areas. This cemetery has been for these two *ailas*. However, these two big families do not belong to the same supra-*aila*. Hamad al-Ali was the son of Mohamad, and al-Kalash was the son of Diab. This division strictly reflects the cemetery structure. The small wadi divides this cemetery into two graveyard blocks (Fig. 14). The western bank has been used for the graveyard of Hamad al-Ali, and the eastern bank for that of al-Kalash. Curiously enough, these graveyard locations are reverse to the residential areas of two big families. Each *aila* makes its own cemetery beyond its residential area. Therefore, we must understand that there are two independent cemeteries in Cemetery 5.

Al-Kalash cemetery consists of about one hundred graves. The first grave of this cemetery is that of Ahamad Seid Hamadi, who died in 1973. It is located in the northeastern part of the block. The older graves are located in this part (Fig. 15). Therefore, al-Kalash cemetery started from the northeastern part, then, extended to southwest toward the wadi.

Hamad al-Ali cemetery consists of over two hundreds graves. The first grave was constructed for abdo al-Dahil in 1976. It is located in the northernmost area of their cemetery. Old graves are visible in this area (Fig 16). Then, the cemetery extended toward southwest, climbing up the slope.

Some Remarks

Ethnoarchaeological study on the modern cemeteries of Ghanem al-Ali village gives us a chance to consider the relationship between space locality and human groups. In general, we can evaluate that grave locality reflects the relationship of human groups relatively well. Let us review five cemeteries of Ghanem al-Ali. We can observe the strict space division system based on *ailas* in Cemetery 1. The system is very similar to that of residential areas. The peripheric character of the location of Cemetery 2 directly reflects the situation of al-Subeat *aila*, i.e. non direct descendants of Ghanem al-Ali. The intermixed character of Cemetery 3 reflects the close kinship and immediate relations between three *ailas*, which have the same supra-*aila*. The reason for such close relations is probably due to the size of the population of these *ailas*. The size of each *aila* is relatively small. Therefore, they have tried to contact closely through marriages within their supra-*aila* for keeping an appropriate population size. Cemetery 4 reflects the relatively large-sized *aila* groups. Two *ailas*, having the same supra-*aila*, in this cemetery can survive through marriages within its own *aila*. They construct the cemetery together, but the locations of each big family's graves have not been much intermixed. Cemetery 5 reflects two independent *ailas*. Their supra-*ailas* are different, and their graveyards have never been intermixed.

Therefore, the state of each cemetery reflects various relations of human groups. If we study the archaeological materials carefully based on such kind of viewpoints, we may have the chance to find something somewhere that would give us a clue to the ancient human relationship.



Fig. 2 Map showing the residential area for each big family at Ghanem Ali village. We must notice that each big family shares the different area within the village.



Fig. 3 One of the Sheikh's graves.

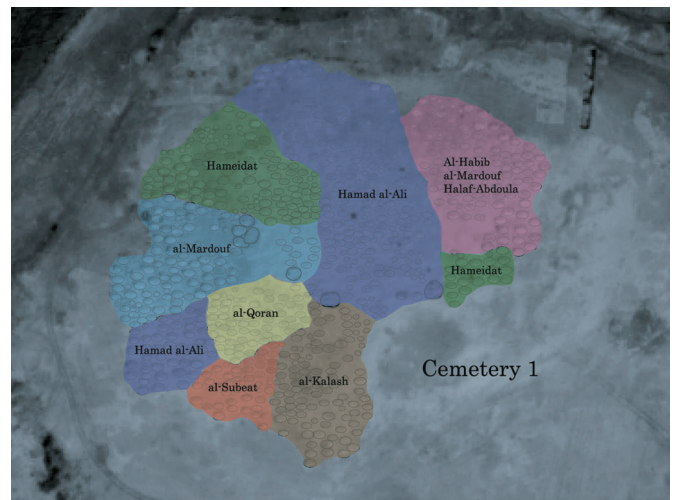


Fig. 4 Cemetery 1. The graveyard of each big family was shown in different color.



Fig. 5 General view of Cemetery 2.

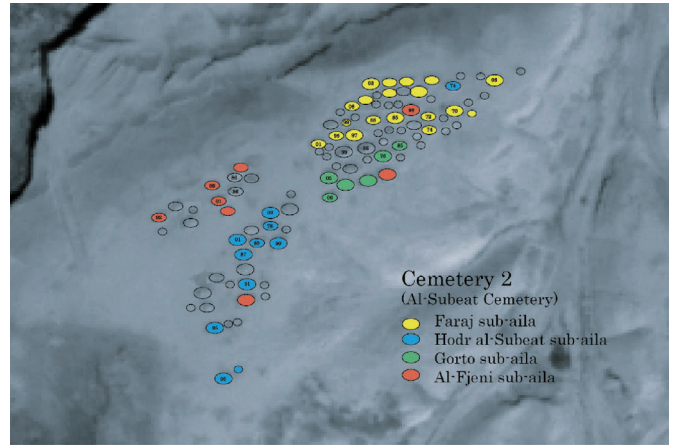


Fig. 6 Schematic plan of Cemetery 2.

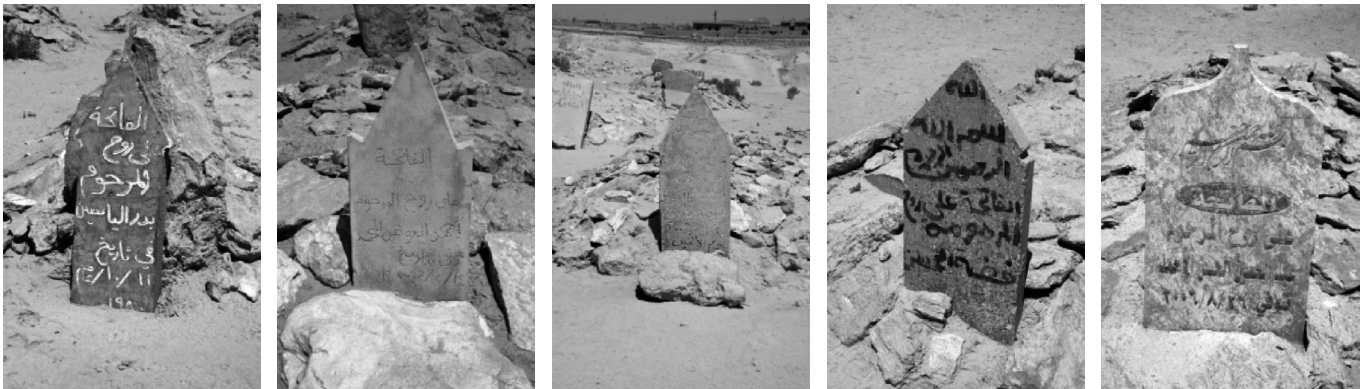


Fig. 7 Various models of new type gravestones made of concrete visible in Cemetery 2.



Fig. 8 Cemetery 3.

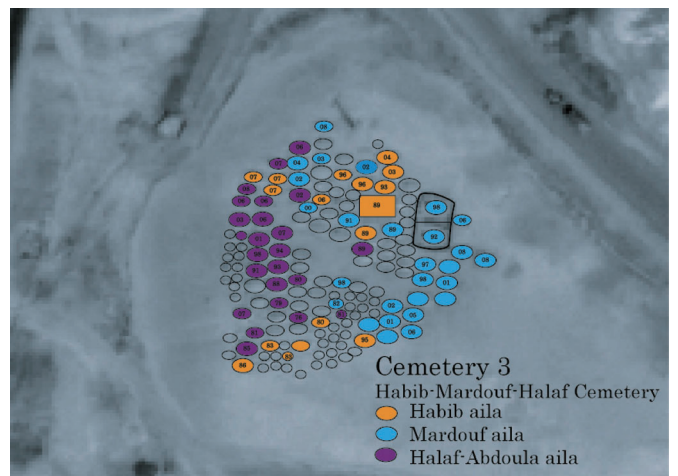


Fig. 9 Schematic plan of Cemetery 3.



Fig. 10 Cemetery 4.

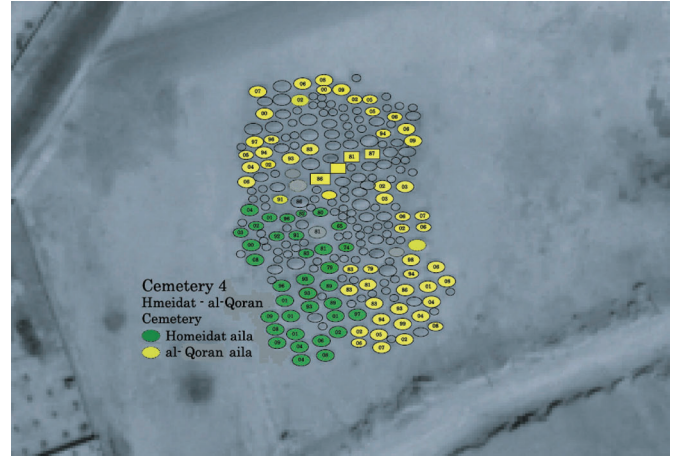


Fig. 11 Schematic plan of Cemetery 4.



Fig. 12 Northern part of Cemetery 4. Concrete-made graves were visible in the right.



Fig. 13 Cemetery 5.

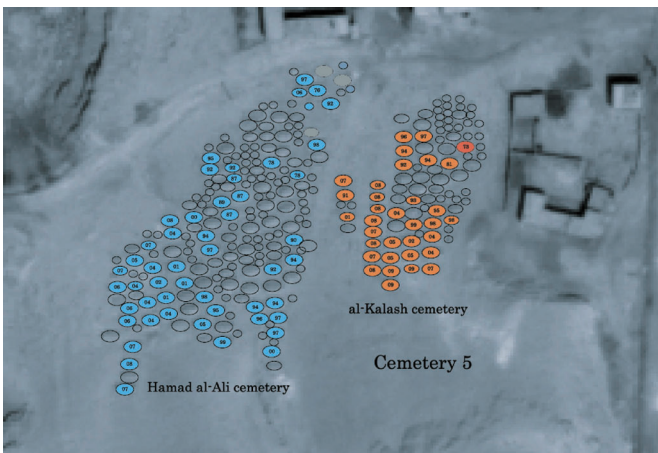


Fig. 14 Schematic plan of Cemetery 5.



Fig. 15 Old graves in al-Kalash cemetery.



Fig. 16 Old graves in Hamad al-Ali cemetery.

6. An Archaeological Survey of Bronze Age Cairns in the Northwestern Flank of Jabal Bishri (II)

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1. Research objective and history

Our research objective is to locate specific footprints of Bronze Age pastoral nomads in the Bishri mountains and, in so doing, shed new light on the traditional issue of *Mar-tu /Amurru*, a large foreign population that Sumerian and Akkadian cuneiform texts refer to in connection to the area. For this purpose, we conducted a series of archaeological investigations since the first field season in May of 2007 (Fig. 1). This season falls on the sixth campaign.

The first field season was devoted to a brief survey of the research area, which located four cairn fields in a limestone hilly terrain to the east of Bir Rahum (Fujii 2008). The second field season, conducted in March of 2008, embarked on a sounding of the Hedaja Cairn Field 1, one of the four sites located in the first season (Fujii 2009). BC-10 was tested and tentatively dated to the end of the Early Bronze Age or the beginning of the Middle Bronze Age. The third field season, undertaken in November of the same year, continued the intensive investigation of the Hedaja Cairn Field 1 and sounded a total of nine cairns (RHD-1/BC-09~01) (Fujii et al. 2009a). The fourth season also focused on the Hedaja area and examined a total of seven cairns at the three sites in the area (RDH-1/BC-11~14, RHD-3/BC01~02, and RHD-4/BC-01) (Fujii et al. 2008b). The series of investigations enabled us to establish a typological sequence of Bronze Age cairns in the Hedaja area. In order to test the sequence at other site, the fifth season in May of 2009 moved southward to the Tor Rahum Cairn Field 1 and conducted a limited sounding of a total of eighteen cairns (Fujii et al. 2009b). As a result, it turned out that the Hedaja sequence was applicable to the site too.

2. Survey results

The sixth field season, our main concern, returned to a general survey. This is because we felt the necessity for figuring out the distribution of the Bishri cairn fields on the basis of the previous investigation results. Due to time constraints, our survey focused on the southern half of the research area. The survey registered the following eleven cairn fields along Wadi Rahum, one of the major drainage systems in the area.

Wadi Rahum Cairn Field 1

This cairn field was located on an elongated table hill lying ca. 1 km north of the Tor Rahum Cairn Field 1. A total of thirty-five cairns were confirmed along its southern edge (Fig. 2). They included a few large examples with a diameter of more than 10 m. Among those was BC-129, which measured ca. 9-11 m in diameter and ca. 0.7 m in relative height (Fig. 3). It was accompanied with a cist wall, a peripheral wall, and a pair of tails more than 10 m long. There is little doubt that the cairn falls into the Phase 1 of the Hedaja sequence, although as was the case of other cairn fields, no datable surface finds were found on and around the mound.

Wadi Rahum Cairn Field 2

This cairn field was extended ca. 0.8 km on a table hill stretching to the east of the Wadi Ruhum Cairn Field 1 (Fig. 4). A total of thirteen cairns were recorded along its southern edge. The largest of them was BC-107, which measured ca. 7.5 m in diameter and ca. 0.4 in relative height (Fig. 5). Three masonry walls – a cist inner wall, a cist outer wall, and a peripheral wall – were identified on the mound, suggesting that it falls into the Hedaja Phase 1 type.

Wadi Rahum Cairn Field 3

Located further to the east of Wadi Rahum Cairn Field 2, this cairn field contained a total of eight cairns. Here again, they were dotted along the southern edge of a hilly terrain stretching east to west. BC-108 was the largest of them, measuring ca. 9 m in diameter and ca. 0.7 m in relative height (Fig. 6). It appears to belong to the Hedaja Phase 1 or 2 type.

Wadi Rahum Cairn Field 4

This cairn field occupied the southern edge of a chain of gentle hills lying ca. 1 km north of Wadi Rahum Cairn Field 2. It consisted of fifteen cairns and stretched ca. 2.4 km in total length. BC-114 and BC-115, both occupying the eastern edge of the site, were the largest in size, measuring ca. 9-10 m in diameter and ca. 0.9-1.0 m in relative height (Fig. 7). Both of these were accompanied with a peripheral wall, an indicator of the Hedaja Phase 1 type.

Wadi Rahum Cairn Field 5

This cairn field, ca. 0.8 km in total length, stretched to the east of Wadi Rahum Cairn Field 4 with a large wadi (Wadi Huenize) just in between. A total of five cairns were recorded, again, along the southern edge of an undulating limestone hill. BC-105 was the largest, having a diameter of ca. 8 m and a relative height of ca. 0.7 m. Its original cobble mound was topped with a newly-built twin cairns, which is called Rujm Huenize by local inhabitants (Fig. 8).

Wadi Rahum Cairn Field 6

This cairn field was extended ca. 0.9 km along the southern edge of an undulating hilly terrain overlooking the upper stream of Wadi Huenize. It contained a total of fourteen small to medium-sized cairns. BC-111 was the largest and measured ca. 6 m in diameter and ca. 0.2 m in relative height (Fig. 9). It appears to fall into the Hedaja Phase 2 type.

Wadi Rahum Cairn Field 7

This small cairn field occupied the top of an isolated hill ca. 1 km north of Wadi Rahum Cairn Field 6 and contained only three small to medium-sized cairns. Of interest was BC-102, which was accompanied with a boat-shaped stone concentration similar to Feature 01 of RHD-3/BC-02 (Fig. 10). In this light, it may be regarded as an example of the Hedaja Phase 2 type.

Wadi Rahum Cairn Field 8

This cairn field was extended along the southern edge of a gentle hill sandwiched between Wadi Rahum Cairn Field 7 to the west and the local asphalt road to the east. BC-101 was the largest of five registered cairns, measuring ca. 7-8 m in diameter and ca. 0.7 m in relative height (Fig. 11). It was encompassed with various small features, which included a ca. 15 m long freestanding wall and a few stone concentrations.

Wadi Rahum Cairn Field 9

Wadi Rahum Cairn Field 9 is a general term for five small to medium-scale cairns dotted on a hilly terrain ca. 1 km north of Wadi Rahum Cairn Field 5. There is nothing noteworthy, except that three large enclosures, possible evidence for domestic activities of cairn constructors, were found below BC-105.

Tor Rahum Cairn Field 2

This elongated cairn field is an eastern extension of Tor Rahum Cairn Field 1 that was comprehensively investigated in the last season. A total of sixteen cairns were located along the limestone escarpment ca. 3 km long that borders on the Homs prefecture (Fig. 12). BC-114 was accompanied with a large peripheral wall as well as several small features, suggesting a date equivalent to the Hedaja Phase I (Fig. 13).

Tor Rahum Cairn Field 3

This cairn field was extended on a foothill below the escarpment referred to above (Fig. 14). It contained a total of eight cairns including a few relatively well-preserved examples (Fig. 15).

Supplementary operation

In addition to the main operations described above, we conducted a mapping of the Rujum Hedaja Cairn Field 2 (RHD-2) that was located in the first field season and left intact thereafter. A total of sixteen cairns were recorded.

3. Summary

The survey newly located the eleven cairn fields in the southern half of our research area. Bronze Age cairns thus far registered in the area amount to 126 or 210 when 84 examples at the Tor Rahum Cairn Field 1 are also counted in. Furthermore, our preliminary inspections suggest that the northern half of the research area has an equal or even more number of contemporary cairns. It follows then that the research area, as a whole, contains several hundreds of Bronze Age cairns, a figure suggestive of a large unified population behind. There is little doubt that the northwestern flank of Mt. Bishri was a funerary center of Bronze Age pastoral nomads in northeastern Syria. A series of *in situ* finds from Hedaja Cairn Field 1 and Tor Rahum Cairn Field 1 suggests that the Bishri cairn fields lasted for a few centuries spanning from the end of the Early Bronze Age to the beginning of the Middle Bronze Age. It is perfectly possible, therefore, that they represent specific footprints of a branch or even the main body of *Mar-tu/Amurru*.

Nevertheless, three major issues still remain to be addressed. To begin with, the northern half of our research area is yet to be intensively surveyed. Second, comprehensively investigated sites have so far been limited to two: Hedaja Cairn Field 1 to the north and Tor Rahum Cairn Field 1 to the south. Third, even these two cairn fields are yet to be indisputably dated due to the scarcity of finds. Keeping these essential issues in mind, we would like to conduct further investigation.

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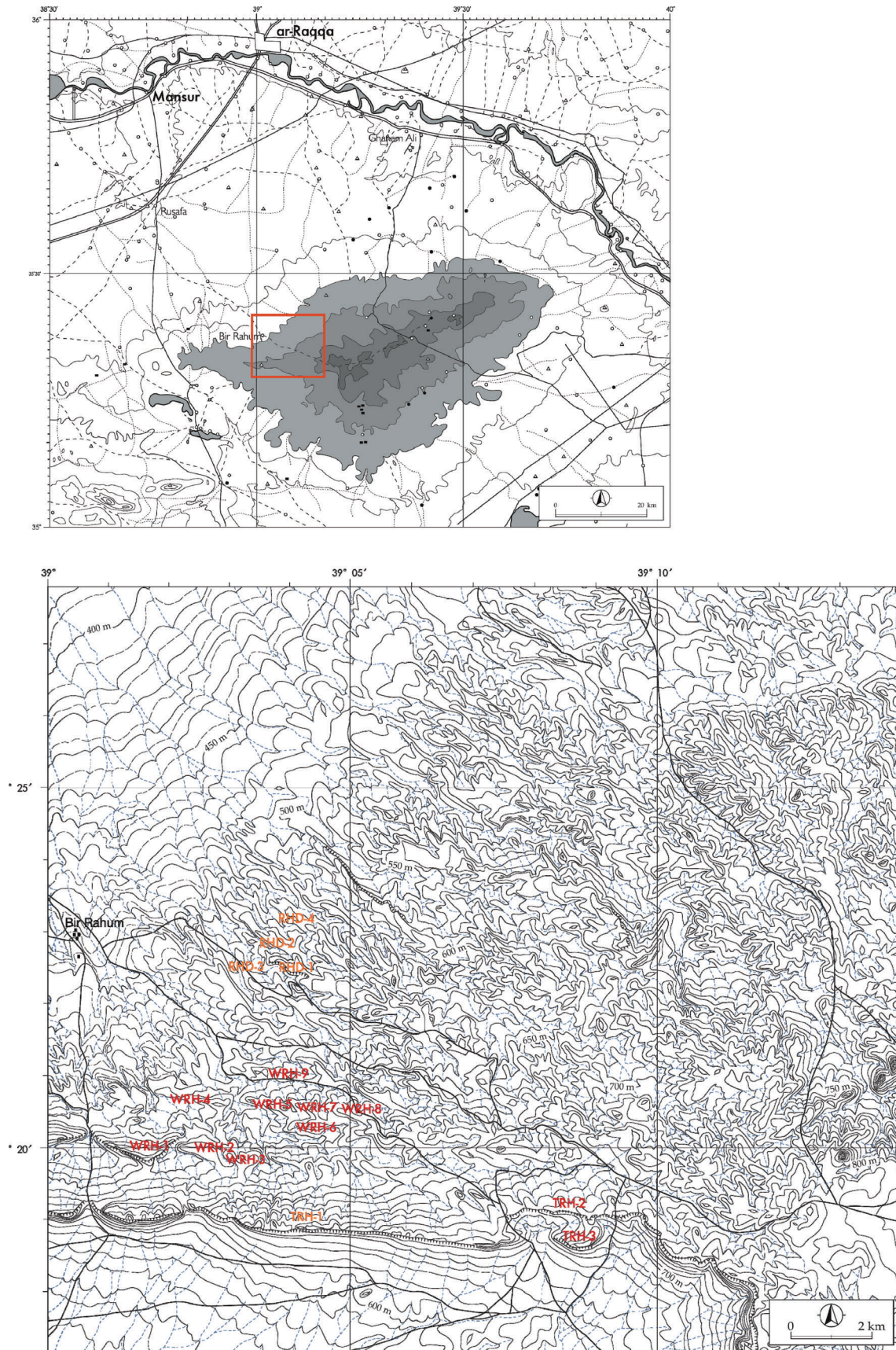


Fig. 1 Research area (above) and cairn fields thus far located (below).



Fig. 2 Wadi Rahum Cairn Field 1: general view (looking W).



Fig. 3 Wadi Rahum Cairn Field 1: BC-129 (looking E).



Fig. 4 Wadi Rahum Cairn Field 2: general view (looking NW).



Fig. 5 Wadi Rahum Cairn Field 2: BC-107 (looking S).



Fig. 6 Wadi Rahum Cairn Field 3: BC-108 (looking S).



Fig. 7 Wadi Rahum Cairn Field 4: BC-114 (looking S).



Fig. 8 Wadi Rahum Cairn Field 5: BC-105 (looking S).



Fig. 9 Wadi Rahum Cairn Field 6: BC-111 (looking E).



Fig. 10 Wadi Rahum Cairn Field 7: BC-102 (looking E).



Fig. 11 Wadi Rahum Cairn Field 8: BC-101 (looking S).



Fig. 12 Tor Rahum Cairn Field 2: general view (looking E).



Fig. 13 Tor Rahum Cairn Field 2: BC-114 (looking NW).



Fig. 14 Tor Rahum Cairn Field 3: general view (looking SE).



Fig. 15 Tor Rahum Cairn Field 3: BC-104 (looking S).

الموسم التاسع من أعمال البعثة الأثرية السورية اليابانية المشتركة العاملة في منطقة البشري

امتدت أعمال البعثة الأثرية اليابانية السورية المشتركة في منطقة البشري من تاريخ 28 نيسان ولغاية 21 أيار من عام 2009 م

مدير البعثة : من الجانب السوري احمد سلطان ومن الجانب الياباني كاتسوهيكو اونوما 0

بداية نود توجيه شكر خاص للدكتور بسام جاموس المدير العام للآثار والمتاحف في سورية والدكتور ميشيل مقدسي مدير التنقيب والدراسات الأثرية في المديرية العامة للآثار والمتاحف والمشرف المستشار لهذا البحث , لمساهماتهم في إنجاح أعمال هذا الموسم

ففي موسم العمل هذا تم تنفيذ مجموعة من الأبحاث الأثرية التي شملت منطقة البحث بشكل عام والتي سنقدم شرح مفصل عن هذه الأبحاث وفق ما هو آتي :

أولاً : مسح اثري للمنطقة المحيطة بتل غانم العلي

(يوشيهيرو نيشياكي , بروفييسور جامعة طوكيو 0 ساهي آبي , باحث معهد الشرق في طوكيو)

حيث تم مسح معظم المواقع الأثرية المجاورة لتل غانم العلي والممتدة على الضفة اليمنى لنهر الفرات والتي تؤرخ إلى عصر البرونز, إذ شغلت منطقة البحث مساحة 10 كم امتدت من ضفاف نهر الفرات شمالاً وحتى الحافة الشمالية لجبل البشري جنوباً , حيث تم تقسيم هذه الدراسة إلى مجموعتين متكاملتين الأولى شملت المنطقة الممتدة على ضفاف الفرات أما الثانية فقد شملت الهضبة الجنوبية لنهر الفرات 0

يهدف هذا المسح إلى دراسة وتوثيق الخلفية التاريخية لمجمعات عصر البرونز في هذه المنطقة الممتدة على طول نهر الفرات الأوسط , كذلك التعرف على طرق وأساليب استثمار الأراضي خلال عصر البرونز 0

فقد دلت المسوحات الأثرية التي جرت خلال المواسم الماضية إلى وجود أكثر من مائة موقع اثري في المنطقة المحيطة بتل غانم العلي شمالاً وجنوباً , والتي امتد تاريخها من عصر الباليوليت وحتى عصور البرونز , حيث قدمت هذه الدراسة وتقدم معطيات تاريخية مهمة متعلقة بالأهداف التي تم ذكرها

في المواسم الأولى من عمل هذا الفريق تم مسح منطقة وادي جزلة والذي يبعد حوالي 2 كم إلى الغرب من تل غانم العلي , وكننتيجة لهذا البحث فقد تم الكشف عن مستوطنة تعود إلى عصر البرونز , بالإضافة إلى وجود مدافن لهذه المستوطنة تم الكشف عنها عند المجرى المنخفض لهذا الوادي , ففي هذا الموسم تم إجراء المسوحات للمجرى العلوي من هذا الوادي (جزلة) والتي كشفت عن الامتداد الجنوبي لهذه المدافن ,

كما لوحظ امتداد واسع للمدافن العمودية (shaft graves) المنهوبة على امتداد هذا الوادي, فقد تم الكشف في داخل احد هذه المدافن على ثلاثة جرار فخارية بحالة جيدة تؤرخ إلى عصر



أعمال المسح في الجهة اليسرى من وادي جزلة

البرونز الوسيط , لقد قدمت أعمال المسح الأثري التي تمت في منطقة وادي جزلة كمية من الأدوات الصوانية البرونزية كراس سهم ومجموعة من السكاكين البرونزية و التي تعود إلى عصر البرونز, بالإضافة إلى مجموعة من الأدوات الحجرية التي تؤرخ إلى عصر النيوليت 0

كما تم أيضا مسح منطقة وادي بيلوني والذي يمتد إلى الشرق من منطقة المسح, وقد تم الكشف في هذه المنطقة عن نوع مميز من المدافن والتي تسمى بالمدافن الحلقية (Tumuli) إذ تبين وجود أكثر من مئة مدفن من هذا النوع والذي بني من الصخور الكلسية, ومن خلال دراسة تركيبية هذا النوع من المدافن تبين أنها مشابهة تماما من حيث الشكل والتركيب للمدافن الحلقية الموجودة في جبل البشري إلى الجنوب من هذه المنطقة, والجدير بالذكر انه لم يتم العثور على أية مستوطنات سكنية مجاورة لهذا النوع من الدافن, غير أنها قريبة من مستوطنات سكنية مستقرة على الضفة اليمنى لنهر الفرات مثل (تل غانم العلي, تل حمادين, تل جزلة) مما يساهم في إلقاء الضوء على أهمية هذا النوع من المدافن في المنطقة, وبنفس الوقت يساهم أيضا في شرح وتوضيح العلاقة القائمة بين المجتمعات المستقرة على حوض الفرات الوسط والمجتمعات المتنقلة في أعلى الهضبة الجنوبية المقابلة لنهر الفرات خلال عصر البرونز 0

كما تم دراسة الادوات التي اعتمدت عليها مجتمعات عصر البرونز والتي تم جمعها من حفريات موقع تل غانم العلي, أيضا تم القيام بدراسة المصاطب النهرية القديمة الأربع لنهر الفرات, إذ تبين وجود طبقات حصوية على طول المصطبة النهرية القديمة الممتدة من تل غانم العلي إلى الغرب وحتى الحافة الجنوبية للمنطقة المنخفضة 0

ثانيا دراسة البقايا النباتية من تل غانم العلي وتل شبوط بالإضافة إلى إجراء مسح للنباتات في منطقة البشري

(شي اكاشي :طالبة , جامعة واسيدة O كيتشي تاننو : بروفيسور, جامعة ياماغوشي)

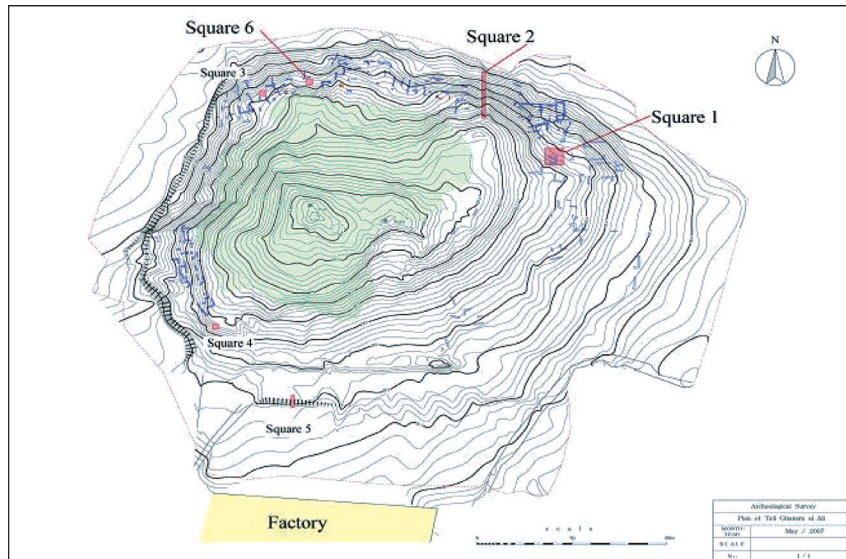
ففي تل غانم العلي تم دراسة مجموعة من العينات النباتية من الحفرية رقم 6 , بالإضافة إلى 9 عينات نباتية كانت قد جمعت من التل في مواسم سابقة , حيث تم تحليلها بواسطة استخدام طريقة التعويم المائي (الطوافة) , وكنتيجة لهذا التحليل تبين أن هذه العينات كانت غنية بالبقايا المتفحمة , حيث لوحظ وجود لبذرة الشعير ضمن هذه البقايا , إذ تحتاج هذه البقايا إلى تحليل أدق بواسطة تقنية الميكروسكوب O هذه الدراسة النباتية ستقدم معلومات اكبر واهم حول أنواع النباتات المستخدمة خلال عصر البرونز O

أما في تل شبوط فقد تم جمع 16 عينة نباتية من داخل الدافن الموجودة في المنطقة , اثنان من هذه العينات تم أخذها من مدفن يعود للعصر الروماني , أيضاً تم الكشف عن كمية قليلة من كما تم إجراء مسح في منطقة البحث للتعرف على النباتات الموجودة تركزت في المنطقة الممتدة من شمال قرية غانم العلي باتجاه الجنوب منطقة بئر سبيعي O

ثالثا : إجراء سبر اختباري في موقع تل غانم العلي :

(كاتسوهيكو اونوما , بروفيسور جامعة كوكوشيكان)

فقد تم إجراء سبر اختباري في الجزء الشمالي الغربي من تل غانم العلي , تم فتح مربع صغير بقياس 3×3 م , ويهدف هذا السبر إلى الحصول على معلومات اكبر تتعلق باستيطان الموقع خلال عصر البرونز , تم الحفر على عمق 40سم إذ تم الكشف من خلاله عن قبر يحتوي على عظام إنسانية يحيط فيها 7 أواني فخارية مختلفة الأشكال والأحجام , وكانت العظام الإنسانية غير كاملة مع فقدان أجزاء من الجمجمة أما بالنسبة للأواني الفخارية فقد كانت اثنتان منها بحالة جيدة وكاملة , فيما كانت الخمس أواني الأخرى غير كاملة وبحالة سيئة O



من خلال دراسة هذه الأواني الفخارية الموجودة ضمن حفرة الدفن يمكن تأريخ هذا القبر إلى بداية عصر البرونز الوسيط

لم يتم تنقيب السويات الأقدم من سوية القبر هذا الموسم , وعلى ذلك فإن التوضع الطبقي لهذا المربع من سطح التل وحتى سوية القبر الذي تم الكشف عنه قد اشتمل على :



هيكل عظمي محاط بمجموعة من الأواني الفخارية من الحفيرة رقم 6

السوية رقم (1) وكانت عبارة عن تربة سميكة 10سم وكانت هذه التربة منحدره قليلا باتجاه الشرق 0

السوية رقم (2) بسماكة 20سم واشتملت على تربة بنية صلبة يتخللها خطوط منقطة من الرماد السوية رقم (3) وهي تربة قاسية مائلة للخضار , وهي السوية التي قطعت فيها الحفرة المخصصة للقبر المذكور 0

السوية رقم (4) وهي السوية التي احتوت على القبر , أسفل هذه السوية بدأت تظهر تراكيب معمارية باتجاهات مختلفة تؤرخ إلى عصر البرونز القديم

أعمال المسح التي نفذت في مواسم سابقة لتل غانم العلي تظهر وجود مجموعة من الأبنية المهمة التي تؤرخ إلى عصر البرونز القديم , مما يؤكد ذلك هو العثور على مجموعة من التماثيل الطينية الإنسانية والحيوانية , بالإضافة إلى دواليب لعربة طينية , وكذلك من خلال دراسة العينات الفخارية التي تم العثور عليها من المربع رقم 2 في تل غانم العلي تبين أن فترة الاستيطان في تل غانم العلي قد امتدت خلال عصر البرونز القديم , كذلك أعمال المسح السابقة للموقع كشفت عن مجموعة من الأواني الفخارية التي تؤرخ إلى عصر البرونز الوسيط , مما يدل على أن تل غانم العلي كان مأهول أيضا خلال عصر البرونز الوسيط , ولكن بفترة أقصر من البرونز القديم 0 فمن الممكن أن تل غانم العلي كان على ارتفاع أكبر خلال عصر البرونز القديم , ومن ثم أصبح أقل ارتفاعا في مراحل لاحقة خلال عصر البرونز الوسيط , هذه النظرية

التي تم ذكرها سوف تكون مؤكدة بشكل صحيح خلال مواسم البحث اللاحقة من عمل هذه البعثة
0

مما يدفع إلى مشاركة عدد من الباحثين الأثريين في الفكرة التي تقول بان منطقة البشري المجاورة لتل غانم العلي كانت مأهولة بالسكان بعد انهيار السيطرة الأكادية مباشرة وهي الفترة التي فقدت فيها السيطرة السياسية على هذه المنطقة , هذه الفكرة تؤكد بان معظم سكان تل غانم العلي قد تحركوا مع نهاية عصر البرونز القديم باتجاه الشرق والجنوب , وهي الهجرة الأمورية المتنقلة عبر منطقة البشري إلى تشكيل الممالك الآشورية والبابلية 0

رابعا : سبر اختباري في المدافن المجاورة لتل غانم العلي جنوبا :

(هيروتوشي نوموتو, بروفييسور جامعة طوكيو 0 شوغو كومي طالب)

تتركز أعمال هذا الفريق من البعثة على دراسة وفهم طبيعة المدافن المتوضعة على قمة الجبل المجاور جنوبا لتل غانم العلي , إن قرب هذه المدافن من المواقع المتوضعة على حوض الفرات يدفع إلى محاولة ربط هذه المدافن بموقع تل غانم العلي والتلال المجاورة على طول نهر الفرات الأوسط بالإضافة إلى تأريخها لنفس الفترة الزمنية 0

فقد تركزت أعمال هذا الفريق في الموسمين الماضيين على القيام بمسح ودراسة المدافن المتعرضة للنهب من حيث التعرف على نمطها وأسلوب الدفن فيها , حيث قدمت هذه الدراسة مجموعة بالغة الأهمية من الحقائق والمعلومات التي ساهمت في تأريخ هذه المدافن 0

أما أعمال الموسم الثالث فقد هدفت إلى إجراء اسبار اختبارية لهذه المدافن التي تركزت في منطقة تل شبوط الواقعة على حافة الجبل المطل على تل غانم العلي (1 كم جنوب التل), إذ تبين من خلال دراسة هيكلية هذه المدافن أنها تؤرخ إلى عصر البرونز القديم 0

وقد قسمت هذه المدافن إلى قسمين من تل شبوط : تل شبوط 1 وتل شبوط 2 :

اسبار مدافن تل شبوط 1 : التي تتوضع على جرف عالي بين واديين بارتفاع حوالي 279م عن سطح البحر ويبلغ قطر هذا التل حوالي 15م وبارتفاع 3م عن سطح الأرض ,حيث تم فتح سبر بعرض 2م امتد من أعلى هذا التل بهدف الكشف عن التوضع الطبقي للتل

هذا التل قدم اكتشاف هام جدا بالنسبة لموضوع البحث, إذ تم الكشف ضمنه على نوع من المدافن الموجودة ضمن منطقة البشري وهو المدفن الحلقي (Tumulus) حيث تألف هذا المدفن من حجرة الدفن والأسوار الحجرية التي تتألف من الحجر الكلسي المختلف القياسات ,إذاً فإن الدلائل تشير إلى تاريخ هذه المدفن إلى عصر البرونز القديم , إن اكتشاف المدفن الحلقي في هذه المنطقة يدل على وجود العديد من هذه المدافن أيضا والتي تتألف من الأحجار الكلسية الضخمة

اسبار مدفن تل شبوط 2 : يتمركز هذا المدفن حوالي 20م جنوب تل شبوط 1 يبلغ قطره 20م وبارتفاع 1م فقد تم إجراء السبر لهذا التل بنفس أسلوب وطريقة السبر لتل شبوط 1 حيث تم

الكشف عن قبرين توضع أعلى هذا التل حيث ظهر القبر الأول مشتملاً على حجرة الدفن التي كانت بقياس 1.2×2.8 م وبعمق 60 سم وباتجاه شمال غربي جنوب شرقي ويحيط بهذا القبر جدار من الحجر الكلسي مختلف الأحجام والقياسات , دون وجود أي مكتشفات تذكر ضمن هذا القبر 0

أما القبر الثاني الذي تم الكشف عنه ضمن هذا التل فكان عبارة عن مدفن يعود إلى العصر الروماني والذي تألف من تابوت فخاري قاطعاً الجدار الحجري المحيط بالقبر الأول , وكان هذا التابوت باتجاه شرق غرب , وقد عثر ضمن هذا التابوت على هيكل عظمي لإنسان من العصر الروماني 0



تل شبوط 1 وتل شبوط 2 قبل أعمال السبر (مطأ على تل غانم العلي)

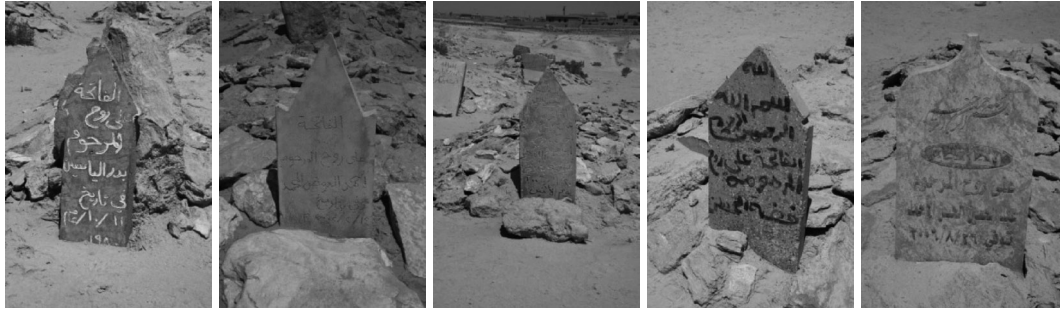
إذا كان من أهم نتائج أعمال هذا الموسم هو الكشف عن المدفن الحلقي (tumulus) الذي يتم الكشف عنه لأول مرة في هذه المنطقة , أيضاً يشير هذا النوع من المدافن الحلقيّة في منطقة الشرق الأدنى كما هو معروف إلى أنها تنسب لأشخاص متنقلين بشكل عام تنقلوا ضمن جبال البشري في منطقة معدل أمطارها لا تتجاوز 200 مم , مما يدل على أنها منطقة رعوية شغلها الرعويين المتنقلون في المنطقة .

هذا أيضاً يدعم فكرة أن الناس الذين استوطنوا في تل غانم العلي من الممكن أن يكون لهم صلة أو ارتباط بالناس المتنقلين ضمن منطقة جبل البشري 0

خامساً : دراسة إثنوغرافية للمقابر الإسلامية الحديثة المتوضعة فوق تل غانم العلي

(الكبرا تسونيكى , بروفييسور جامعة تسو كوبا)

يعتبر موقع تل غانم العلي أحد أهم الأبحاث الرئيسية ضمن أعمال البعثة اليابانية السورية المشتركة في منطقة البشري , يقع هذا التل الذي يحتوي على مستوطنات تعود إلى عصر البرونز إلى شمال شرق بلدة تل غانم العلي الحالية , يغطي سطح هذا التل مجموعة من المقابر الإسلامية الحديثة التي تعود لأهالي القرية المجاورة 0



مجموعة من المدافن الحديثة المتوضعة فوت تل غانم العلي

وتهدف هذه الدراسة إلى فهم طبيعة العلاقة بين هذه المقابر وبين أهالي القرية المجاورة, بداية تم جمع المعلومات من أهالي القرية حول تاريخ بلدة غانم العلي التي يبلغ عدد سكانها حوالي 10 آلاف نسمة , وجميعهم ينتمون إلى قبيلة واحدة (البوشعبان) التي يتفرع منها العديد من العشائر , هذه العشائر تتوزع إلى عدد من العائلات وعلى ذلك تم تأكيد فكرة انتمائهم إلى مجموعة بشرية واحدة , إذ تبين أن بداية استيطانهم الأول في هذه المنطقة كان في البلدة القديمة التي تبعد حوالي 2 كم إلى الشمال من البلدة الحالية وعلى ضفاف نهر الفرات , وفي عام 1947 ونتيجة تعرض البلدة للغمر بمياه الفرات مما اضطرهم بالتراجع جنوباً عن نهر الفرات حتى استقروا في البلدة الحالية وكان أهالي البلدة قد استخدموا تل غانم العلي كمقبرة لموتاهم منذ وجودهم في البلدة القديمة التي تعرضت للغمر

سادساً: مسح أثري للمدافن الحلقية (Tumuli) ضمن منطقة البشري

(سوميو فوجي , بروفيسور جامعة كانازاوا 0 كاي سوزوكي طالبة 0 كايوهي إنو طالب)

يعتبر هذا البحث كجزء من أعمال البعثة السورية اليابانية المشتركة في منطقة البشري , ويهدف إلى تتبع آثار القبائل البدوية المتنقلة (الأمورية) في جبل البشري مع إلقاء الضوء على طريقة ظهور هذه القبائل في المنطقة , حيث أشارت النصوص السومرية والأكادية إلى وجودهم في هذه المنطقة 0 وبناء على ذلك فقد تم تنفيذ مجموعة من الأبحاث الأثرية منذ الموسم الأول الذي بدأ في شهر أيار من عام 2007 0

ففي الموسم الأول تم إجراء مسح واسع للمنطقة التي تم تقسيمها إلى أربع مناطق احتوت على المدافن الحلقية 0

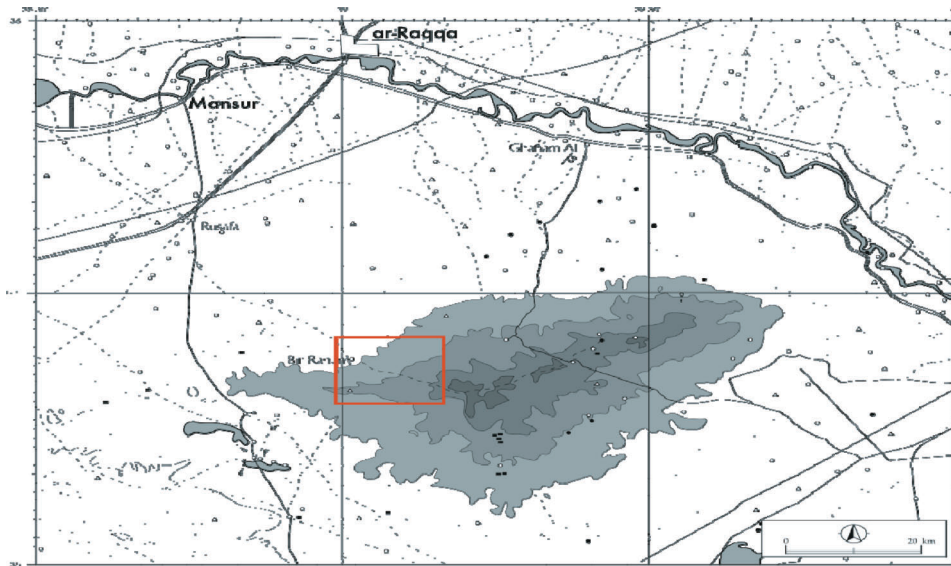
أما في الموسم الثاني فقد تم إجراء اسبار اختباريه لهذه المدافن الحلقية ضمن منطقة حداجة احد الناطق الأربعة الممسوحة في الموسم الأول , فمن خلال أعمال السبر تم تأريخ هذه المدافن إلى الفترة الممتدة من نهاية عصر البرونز القديم وبداية عصر البرونز الوسيط 0

واشتملت أعمال الموسم الثالث على الاستمرار في إجراء الأسبار الأختبارية لهذه المدافن في منطقة حداجة 1, إذ تم الكشف عن 9 من المدافن الحلقية في هذه المنطقة 0

استمرت أعمال السبر الاختباري لمنطقة حداجة في الموسم الرابع مع التركيز على دراسة 7 من المدافن الحلقية في تلك المنطقة 0 هذه الدراسات والأبحاث في المنطقة مكنت من إيضاح التسلسل الزمني للمدافن الحلقية العائدة إلى عصر البرونز 0

وفي الموسم الخامس تركز البحث في منطقة باتجاه الجنوب والمسماة بمنطقة طول رحوم حيث تم إجراء اسبار لثمانية عشر مدفناً حلقياً 0

وتركزت أعمال الموسم السادس على إجراء إعادة إجراء مسوحات عامة للمنطقة , وكان الهدف من ذلك تصنيف وتوزيع أماكن انتشار المدافن الحلقية في منطقة البشري , مع التركيز بشكل رئيسي على الجزء الجنوبي من منطقة البحث , وخلال أعمال المسح هذا تم تسجيل حوالي 11 منطقة اشتملت على المدافن الحلقية في المنطقة :



خريطة عامة توضح منطقة البحث لهذا الفريق

المدافن الحلقية في وادي رحوم 1 : تمتد هذه المنطقة على شكل هضبة مستطيلة الشكل حوالي 1 كم إلى الشمال من منطقة طول رحوم , حيث تم الكشف عن 35 مدفناً حلقياً انتشرت على طول الحافة الجنوبية لهذه المنطقة , اشتملت هذه المدافن على العديد من النماذج والأشكال والتي بلغ قطرها حوالي 10 م ومحاطة بأسوار متعددة من الأحجار الكلسية , وهي مشابهة للمدافن الحلقية الموجودة في منطقة حداجة 1 0

المدافن الحلقية في وادي رحوم 2 : امتدت هذه المنطقة حوالي 800 م إلى الشرق من مدافن وادي رحوم 1, في هذه المنطقة تم الكشف عن 13 مدفناً حلقياً مختلفة الأشكال والأحجام , وكان المدفن الأكبر في هذه المنطقة بقطر 8 م و ارتفاع بلغ 40 سم , حيث يحيط بهذا المدفن ثلاثة أسوار من الحجر الكلسي 0

المدافن الحلقية في وادي رحوم 3 : وتقع إلى الشرق من وادي رحوم 2 حيث ضمت هذه المنطقة ثمانية مدافن وكان أكبر هذه المدافن بقطر 9م وارتفاع 70سم 0

المدافن الحلقية في وادي رحوم 4 : وهي على بعد 1كم إلى الشمال من مدافن وادي رحوم 2 حيث تم الكشف عن 15 مدفن حلقي على امتداد 2كم بلغ قطر أكبر المدافن فيها 9م وارتفاعه 90سم , محاط بسور خارجي من الحجر الكلسي 0

المدافن الحلقية في وادي رحوم 5 : امتدت هذه المنطقة حوالي 800م إلى الشرق من مدافن وادي رحوم 4 , ضمن وادي كبير, حيث تضمن خمسة مدافن , كان أكبر هذه المدافن بقطر 8م وارتفاع بلغ 70سم 0



صورة تظهر احد المدافن الحلقية (Tumulus) في منطقة وادي رحوم 5

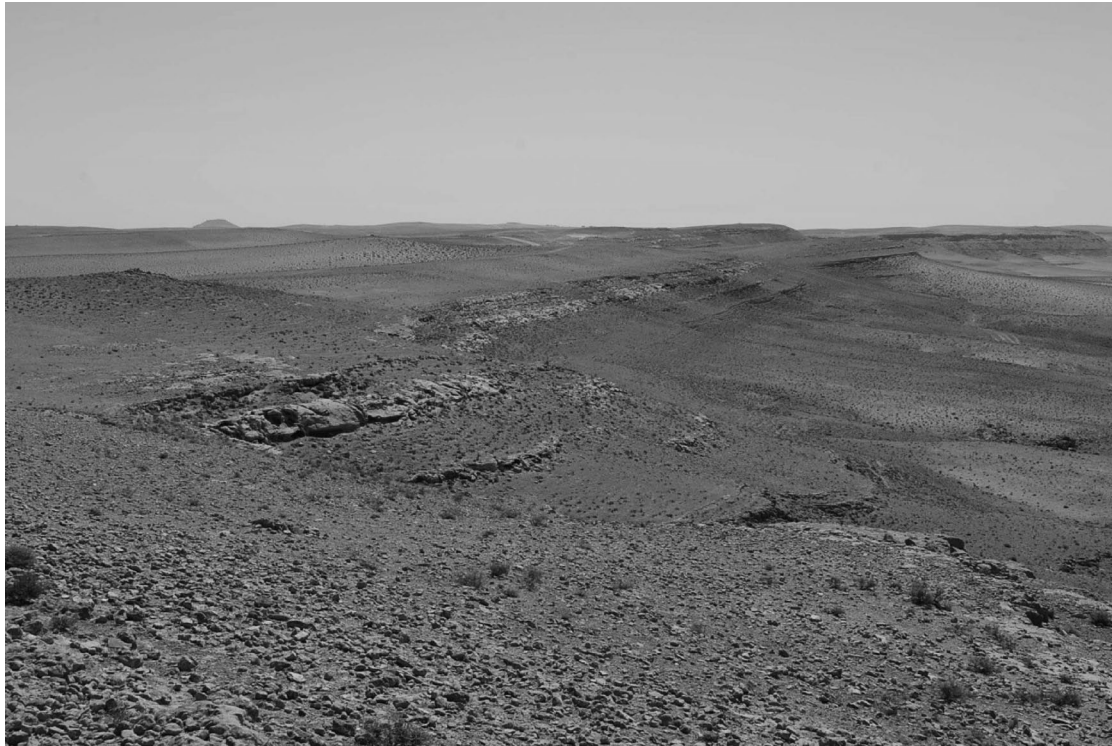
المدافن الحلقية في وادي رحوم 6 : امتدت هذه المدافن على طول 900م ضمن منطقة منحدرية حيث تم الكشف عن 14 مدفن حلقي متنوع الأحجام بين المتوسط والصغير , حيث كان أكبر هذه المدافن بقطر بلغ 6م وارتفاع 20سم , وهو مشابه لمدافن حداجة 1

المدافن الحلقية في وادي رحوم 7 : وهو عبارة عن مدافن حلقية صغيرة تتركز على قمة هضبة , تبعد حوالي 1كم إلى الشمال من مدافن وادي رحوم 6 , ضمت ثلاثة مدافن حلقية صغيرة الحجم 0

المدافن الحلقية في وادي رحوم 8 : امتدت على طول الحافة الشمالية من مدافن وادي رحوم 7 , المدفن الأكبر من بين الخمسة مدافن المكتشفة في هذه المنطقة كان بقياس بقطر 8م وارتفاع بلغ 70سم , هذه المدافن أيضا محاطة بأسوار حجرية متعددة 0

المدافن الحلقية في وادي رحوم 9 : تتوضع ضمن منطقة منحدرية , حوالي 1 كم شمال منطقة وادي رحوم 5 , تم الكشف فيها عن خمسة مدافن حلقية محاطة بثلاثة أسوار خارجية من الحجر الكلسي 0

المدافن الحلقية في منطقة طول رحوم 2 : تمتد هذه المدافن إلى الشرق من مدافن طول رحوم 1 حوالي 3 كم عن الحدود الإدارية من مدينة حمص , حيث تحتوي هذه المنطقة على 16 مدفن حلقي , وكانت هذه المدافن محاطة بسور واحد من الأحجار الكلسية , وهي مشابهة في نمطها مدافن حداجة 1 0



صورة عامة تبين امتداد المدافن الحلقية في منطقة طول رحوم 2

المدافن الحلقية في منطقة طول رحوم 3 : تركزت هذه المدافن فوق هضبة واسعة ضمت ثمانية مدافن حلقية , اشتملت على نماذج متعددة لهذه المدافن 0

وفي هذا الموسم أيضاً تم وضع خريطة شاملة لمنطقة رجوم حداجة التي احتوت على 16 مدفن حلقي (هذه المنطقة تمت دراستها خلال أعمال الموسم الأول) 0

خلاصة : إن أعمال المسح الأثري لهذه المناطق التي احتوت على المدافن الحلقية قد تركزت في الجهة الجنوبية من منطقة عمل هذه البعثة الأثرية المشتركة , وهذه المدافن تعود إلى عصر البرونز , حيث بلغ عدد المدافن الحلقية التي تمت دراستها في هذه المنطقة حوالي 210 مدفن ,

وقد أشارت الأبحاث والدراسات التمهيدية التي جرت في الجهة الشمالية من منطقة هذا البحث إلى وجود عدداً من المدافن الحلقية أيضاً والمعاصرة للمدافن الموجودة في هذه المنطقة , مما يدل على أن منطقة البحث بشكل عام قد احتوت على مئات من المدافن الحلقية التي تؤرخ إلى عصر البرونز , كل ذلك يشير إلى وجود مستوطنات لهؤلاء المجموعات البشرية التي تنقلت ضمن منطقة جبال البشري 0

وهناك العديد من الآراء التي تدعم وتؤيد فكرة أن القسم الشمالي الغربي من جبال البشري كان مركزاً لتجمع المجموعات الرعوية خلال عصر البرونز في شمال شرق سورية 0

أيضاً فقد قدمت مجموعة المكتشفات التي عثر عليها ضمن هذه المدافن الحلقية في منطقة حداجة 1 ومنطقة طول رحوم 2 العديد من الدلائل التي تؤرخ هذه المدافن ضمن منطقة جبال البشري إلى الفترة الممتدة من نهاية عصر البرونز القديم وحتى بداية عصر البرونز الوسيط

ARCHAEOLOGICAL RESEARCH IN THE BISHRI REGION
— REPORT OF THE TENTH WORKING SEASON —

Katsuhiko OHNUMA

Director of the Japanese Archaeological Mission to Bishri
 (Kokushikan University, Tokyo, JAPAN)

Mohamad SARHAN

Director of the Syrian Archaeological Mission to Bishri
 (Department of Antiquities and Museums, Raqqa, SYRIA)

September 10, 2009

The 10th season's Syria-Japan Archaeological Joint Mission to the Bishri Region started on August 1 and ended on September 9, 2009. Dr. Bassam Jamous, the Director General of the Syrian Directorate General of Antiquities and Museums, and Dr. Michel Al-Maqdissi, the Syrian Supervising Adviser for this joint mission and the Director of Archaeological Excavations and Research at the Syrian Directorate General of Antiquities and Museums, kindly helped us towards the realization of this tenth working season. We express our sincerest gratitude to them for their heart-warming cooperation.

The members of the joint mission of this season were as follows.

Japanese party: Katsuhiko Ohnuma (Director), Sumio Fujii, Kazuyoshi, Nagaya, Kae Suzuki, Kyohei Inoue, Mitsuo Hoshino, Takeshi Saito, Yusuke Katsurada, Yoshihiko Nakano, Hidemi Ishida and Kiyomi Mori.

Syrian party: Mohamad Sarhan (Director), Aed Issa, Ibrahim Khalil and Ahmed Sultan.

In this working season, we undertook series of research of which outlines are described below.

1. An Archaeological Survey and Sounding of Bronze Age Cairn Fields in the Northwestern Flank of Jabal Bishri

Sumio FUJII (Professor, Kanazawa University)

Takuro ADACHI (Research Fellow, The Middle Eastern Cultural Center in Japan)

Kazuyoshi NAGAYA (M.A. Student, Waseda University)

Kae SUZUKI (M.A. Student, Kanazawa University)

Kyohei INOUE (B.A. Student, Kanazawa University)

Research objective and process

Our research project aims to specify archaeological footprints of Bronze Age pastoral nomads in the Bishri region and, in so doing, shed new light on the traditional issue of *Mar-tu/Amurru*, a large pastoral population that Sumerian and Akkadian cuneiform texts refer to as being based on the region. For this purpose, we conducted a series of archaeological investigations since the first field season in May of 2007. This season falls on the seventh campaign for our team.

The first field season was devoted to a preliminary survey of the research area. We located four cairn fields in a limestone hilly terrain to the east of the village of Bir Rahum (Fujii 2008). The

second field season, conducted in March of 2008, embarked on a comprehensive sounding of Wadi Hedaja 1, one of the four sites located in the first season (Fujii 2009). BC-10 was tested and tentatively dated, on the basis of a few diagnostic finds, to a period spanning from the end of the Early Bronze Age to the beginning of the Middle Bronze Age. The third field season, undertaken in November of the same year, continued the intensive investigation of Wadi Hedaja 1 and tested a total of nine cairns aligning along the southern edge of the site (WHD-1/BC-09~01) (Fujii et al. 2009a). The fourth season also focused on the Hedaja area and examined seven cairns at the neighboring three sites (WHD-1/BC-11~14, WHD-3/BC01~02, and WHD-4/BC-01) (Fujii et al. 2008b). The series of investigations enabled us to establish a techno-typological sequence of Bronze Age burial cairns in the Hedaja area. In order to test the Hedaja sequence in a broader context, the fifth season in May of 2009 moved to the site of Tor Rahum 1 and tested a total of eighteen cairns (Fujii et al. 2009b). The soundings verified the validity of the Hedaja sequence, although a few minor revisions were added. The sixth field season returned to a general survey and newly located, on the basis of more precise information accumulated in the course of the soundings, eleven cairn fields or a total of 126 ancient burial cairns in the southern half of the research area (Fujii et al. 2009). The seventh field season, our main concern, took place from August 1 through September 9, focusing on the following complementary operations to conclude our research project.

Soundings at Wadi Hayuz 1 and 2

Wadi Hayuz 1 and 2 are small-scale cairn fields lying ca. 10 km SSE of Bir Rahum (Fig. 1). We tested a total of six burial cairns: five at Wadi Hayuz 1 and one at Wadi Hayuz 2. As a result, the two sites turned out to fall within the time range from Phase 1 to Phase 2 of the Hedaja sequence. Of interest is BC-05 at Wadi Hayuz 1, which was constructed over an edge of a large rectangular platform packed with limestone rubble (Fig. 2). Although every cairn was entirely looted, snail and carnelian beads, pottery sherds, flint artifacts, and a few bronze products were found mingled with disturbed soil (Fig. 3). Human skeletal remains also occurred in small quantities.

Soundings at Wadi Hedaja 2 and 4

Wadi Hedaja 2 and 4 are located ca. 5 km east of Bir Rahum. We tested a total of nine cairns: eight at Wadi Hedaja 2 and one at Wadi Hedaja 4. The soundings showed that both cairn fields cover the time range from Phase 1 to Phase 2 or 3. Again, all of the cairns were heavily disturbed, but larger cairns produced a small number of artifacts such as pottery sherds, snail and stone beads, and flint artifacts. Of particular interest are a straight-necked small pot and a bronze toggle pin both found at BC-09 of Wadi Hedaja 2 (Fig. 4, 5). The co-occurrence of these diagnostic finds corroborated anew our perspective that the Bishri cairn fields belong to the Middle Bronze Age.

Additional Soundings at Wadi Jal al-Tyur 2

In order to collect further information on the Bishri cairn fields, we conducted an additional sounding of two large burial cairns at Wadi Jal al-Tur 2 lying ca. 8 km ENE of Bir Rahum. BC-01 consisted of a corridor-type cist and a double peripheral wall encompassing it, a combination characteristic of Phase 1 (Fig. 6). Though entirely looted, the burial chamber yielded four bronze rings, a few cowrie and carnelian beads, and a certain amount of human skeletal remains (Fig. 7). BC-02, on the other hand, was constructed over the southern edge of an oval platform compacted with limestone rubble (Fig. 8). This type of burial cairn is common in Phase 2. Finds were limited to a single bead made of an unidentified black stone and a few dozens human bone fragments.

Surveys in the Northern Half of the Research Area

The last two weeks of the research period were devoted to a general survey in the northern half

of the research area. Although its eastern part was left less scrutinized due to the difficulty in access and time constraints, the survey newly registered 17 cairn fields or a total of 131 ancient burial cairns (Fig. 9). It follows that the research area, as a whole, contains several hundreds burial cairns. The concentration of homogeneous burial cairns in the limited area is suggestive of the involvement of a large population who shared the same ethno-cultural identity.

Summary

Our research project in the Bishri Mountains temporarily ended with the seventh field season. The series of investigations since May of 2007 has enabled us to specify the archaeological footprints of ancient pastoral nomads hitherto poorly known in the region. It is now evident that the northwestern flank of Mt. Bishri was a funerary center of a large group of MB pastoral nomads. A series of diagnostic finds such as snail and carnelian beads, bronze products, and plain potteries is suggestive of their contact with the Sumerian and Akkadian cultural sphere in southern Mesopotamia, on one hand, and the urbano-rural communities in the Middle Euphrates River Basin, on the other hand. A large group of MB pastoral nomads who was based in the Bishri region and closely tied with the civilized societies to the north and the south – it seems that circumstantial evidence fulfill basal conditions to define them as a group of *Mar-tu/Amurru*. Nevertheless, our far-reaching research project has just started. Further investigation is needed to validate our challenging new perspective.

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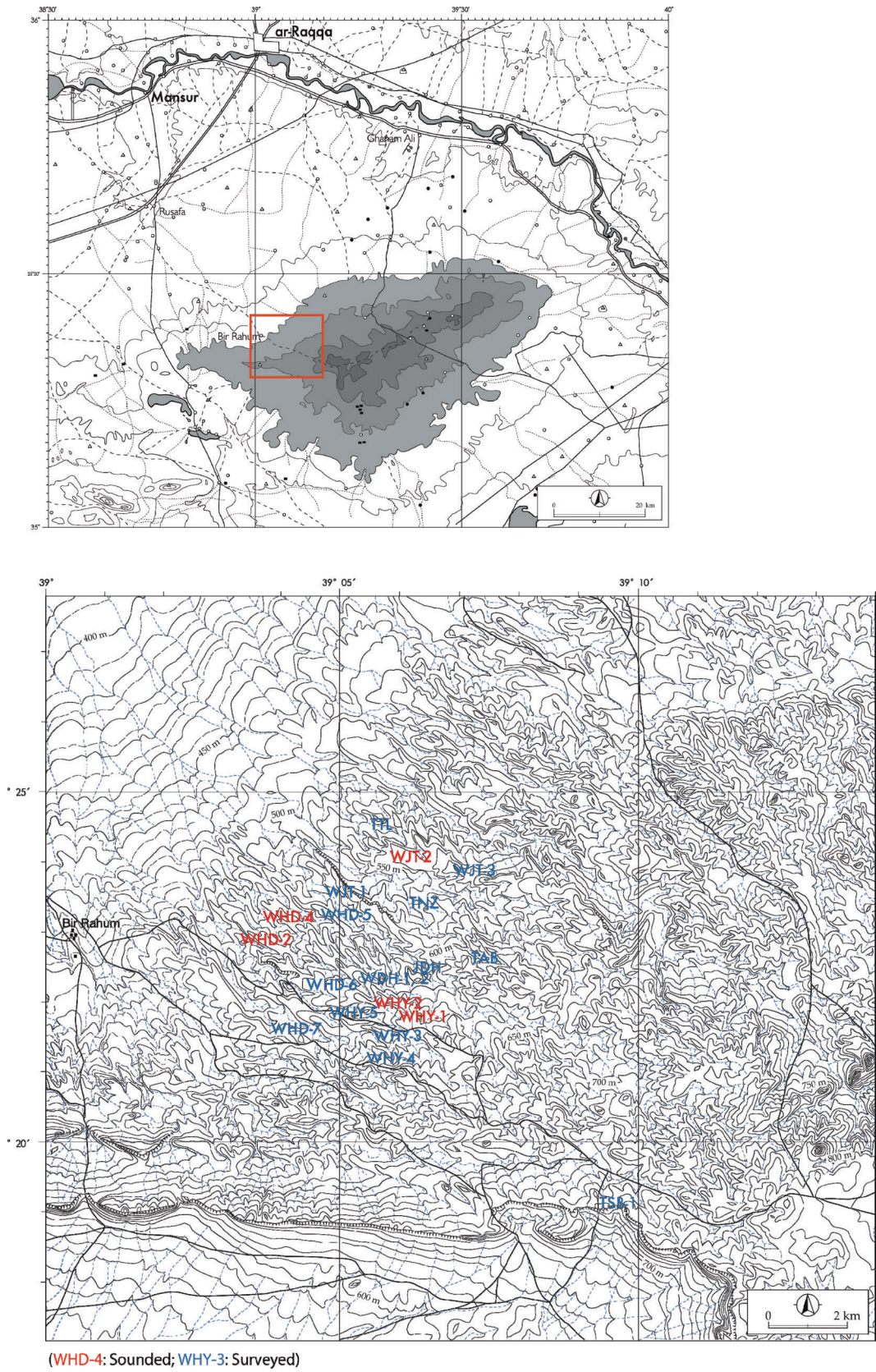


Fig. 1 Research area (above) and cairn fields investigated in this season (below).



Fig. 2 Wadi Hayuz 1: General view of BC-05 (looking SE).



Fig. 3 Wadi Hayuz 1: Small finds from BC-01.



Fig. 4 Wadi Hedaja 2: General view of BC-09 (looking NE).

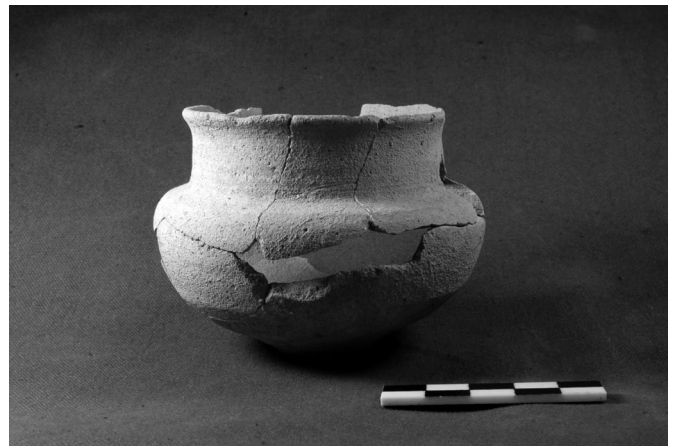


Fig. 5 Wadi Hedaja 2: Pottery from BC-09.



Fig. 6 Wadi Jal al-Tyur 2: BC-01 (looking NE).



Fig. 7 Wadi Jal al-Tyur 2: Small finds from BC-01.



Fig. 8 Wadi Jal al-Tyur 2: General view of BC-02 (looking NW).



Fig. 9 Wadi Jal al-Tyur 2: General view of BC-17~19 (looking N).

2. All-Core Boring Survey in the River-Terrace Deposit

Mitsuo HOSHINO (Professor Emeritus, Nagoya University)

Takeshi SAITO (Associate Professor, Meijo University)

Yusuke KATSURADA (Research Fellow, Nagoya University)

An assemblage of pollen fossils found in certain sediment layer is archaeologically very important to know the vegetation prevailed at the time. Our geological team hitherto collected a lot of sediment samples from various horizons of natural and artificial cross-sections of river terrace deposits along the middle Euphrates. Unfortunately, the collected samples included the pollen fossil only scarcely. This may be due to the dry condition under which the samples have been exposed for a long time.

Description of the boring sites

In this working season, we performed all-core boring in order to get the sediment samples suitable for pollen analyses. We selected two localities for boring site, both of which are wetland (old oxbow lake) at the north of Zor Shammar as shown in Fig. 1. Oxbow lakes were ever part of mainstream of Euphrates. Such lake sediments are basically sand and/or gravel at the bottom and mud in large part of upper horizon. Sand and gravel were fluvial deposits at the mainstream stage and the mud, on the other hand, was deposited at the isolated lake stage under relatively static sedimentary conditions. If the vegetation was plenty there some time ago, many kinds of pollen have dropped into the lake and have precipitated with muddy particles. We expect that many kinds of pollen could be preserved in the muddy sediments collected in this time.

Methodology of all-core boring

All-core boring is a technique to get non-disturbed sediments for scientific purposes such as microfossil studies and observation of sedimentary structures. Only limited numbers of boring company have this technique. Fortunately Ms. Yamazaki living in Aleppo recommended "Aleppo Geotechnical Center" to us, which is one of excellent boring companies in northern Syria.

According to the document of the company, the methodology of all-core boring is as follows;

1. Minimum amount of fresh water circulation will be used during boring process.
2. Continuous cores of all kinds of strata will be recovered and special drilling pits, short drilling runs with reasonable diameter of samplers (127 mm to 76 mm) will be used to ensure high recovery

(not less than 95 %). This will depend upon the quality of the encountered soil/rock formation, the existence of cavities, caverns or very weakly cemented rock formations ...

3. Casing will be installed inside the bore hole especially at the upper layers (if necessary) to prevent the collapse of its sides.
4. Single, double, Shelby and/or wire line core barrels will be used during drilling according to the site conditions.
5. All extruded samples will be placed in sequence within standard wood boxes.

Locality RQ-1

Drilling started at 6:40 a.m. 6th August, 2009. A boring scene is shown in Fig. 2. From the ground surface to -7.7 m, brownish coloured mud predominates (Fig. 3). In some places white spots of gypsum are crystallized. At the depth of -7.7 m, the mud changed its colour to greyish which indicates reduced environmental condition. At -10.4 m, the boring tip reached gravel bed which indicates the bottom fluvial sediments. The water table level was found to be between -1 m to -1.5 m. Cores were carefully wrapped with kitchen cellophane as shown in Fig. 4.

Locality RQ-2

From the ground surface to -3.0 m, brownish coloured mud predominates and at -3.0 m the colour changed to greyish. At -4.0 m the tip reached fluvial sand and at -5.9 m to the gravel. The water table level was between -1 m to -1.5 m.



Fig. 1 Two localities of boring site, RQ-1 and RQ-2 are shown in the Google Map.



Fig. 2 The boring machine (centre) and the water tank (left) at the locality RQ-1.



Fig. 3 Extruded boring cores, 1 metre in length and 127 mm in diameter, were placed into the wooden container.



Fig. 4 Each core was carefully wrapped to prevent from drying and contamination.



Fig. 5 The core was cut in half, and then offered to make description and analyses.

3. A Morphological Study of the Human Remains from Bishri Mountains

Yoshihiko NAKANO (Associate Professor, Osaka University)

I had the morphological study of the human remains from Bishri area succeed to 2008. In this season, the archeological survey of the site TRH-1, WS-1 and TGA yielded many human skeletal specimens. They included some human skulls that were not complete. The specimens were composed of human remains and animal bones including small rodents, hares, bards and some cattle. There were fragmental jaws, isolated teeth, limb bones, phalanges and skull fragments in the human remains. Almost of the bones were fragments, and the bones from one burial cairn were not always belong to one individuals. Therefore, the one purpose of the study was identification of the bones with the observation and measurements. The other purpose was to decide specimens for carbon 14 dating

method. The selected specimens were sent to Japan for the analysis with the permission.

Descriptions

The skeletal specimens were collected by the excavated points in each cairns in TRH-1. The useful human bones for the morphological studies were found in Burial Cairn No. 117, 118, 123, 126, 127, 130, 131 and 133.

1. Burial Cairn No. 117 (TRH-1/BC-117)

Many bones were excavated from BC-117 including lower jaw (Fig. 1) and sacrum (Fig. 2). Some bones had the feature of young individuals as the separated epiphysis while other bones showed the aged one. The sacrum curved over normal one. It should be the deformation by aging.

2. Burial Cairn No. 118 (TRH-1/BC-118)

The specimens composed of some skull fragments and many postcranial bones. The skull fragments had less information. Postcranial bones were including limb bones, vertebrates, and hip bones. There were two left proximal femur and one was from young individual and another from old. Other bones are divided two types, young and old. However there was the possibility that the bones were from more than three individuals.

3. Burial Cairn No. 123 (TRH-1/BC-123)

The skeletal specimens were not so many from BC-123. However they included the bones from two or more individuals. There were two lower jaws (Fig. 3, 4). One had the two teeth. The wear of the enamel showed the individual was young adult. Another jaw had no teeth.

4. Burial Cairn No. 126 (TRH-1/BC-126)

Many postcranial bones and some fragmental skull were found. Almost of the limb bones had not the epiphysis. The specimens were from teenager.

5. Burial Cairn No. 127 (TRH-1/BC-127)

One skull without face was excavated. The specimen was collected with matrix and it was so fragile. Therefore, it was so difficult to have the observation for the details. There was no enough time to clean the specimen and analysis. The suture line was not fused. He might be teenager.

6. Burial Cairn No. 130 (TRH-1/BC-130)

There two skulls were found from BC-130. One skull had the almost complete braincase without face. The inside of the brain case was filled with matrix (Fig. 5). The frontal and parietal bones remained. The lower parts of the temporal and occipital bones were lacked. The foramen magnum was missing. The suture line was clear and the closure was not strong. It showed the young age. The bulge of the frontal bone was not so large. The feature might show that it was young female.

Another skull had only skull cap (Fig. 6). The suture line was disappeared in the dorsal part and the individual were not so young.

Many postcranial bones were also excavated. The total number of the fragments was more than 100. They composed of at least three individuals because same part of the bone was found as left proximal femur.

7. Burial Cairn No. 131 (TRH-1/BC-131)

Almost of the remains were animal bones. They were only two human bones, left metatarsal (II) and right metacarpal. There were no outstanding features and hyper ossification in the bones.

8. Burial Cairn No. 133 (TRH-1/BC-133)

Many human bones were excavated. The parts of the skeleton were skull and jaw fragments (Fig. 7), and postcranials including axis. Two teeth (upper C and Upper I2 were also found, but it was difficult to know the details for the lack of the enamel. These bones might belong to one individual. The development of the each tuberosity of the bone was not remarkable. The morphological condition showed that the body was not so old.

9. WS-1

The large size limb bones were excavated from WS-1 site. All of the bone should be from one individual. The condition of the preservation was not suitable in the soil. Many bones were fragile. I selected some tough fragments for dating sample. The individual might be tall and strong male.

10. TGA

There were two groups of specimens from TGA site. One group was the bones of baby. All of the specimens were fragments. It was difficult to gain the more information. Another group was found from sq.6 including limb bones. The bones had no epiphysis. Therefore, the specimens were from young people and the sex was unknown.

Discussions and conclusions

In this season, the field survey had the fruitful result for the human remains by the archeological research. Some cairns saved the many bones more from several individuals. They were including the bones from the young, middle age and aged person. They may also include both sexes.

In the results from the analysis in 2008, there was the tendency that the development of muscles was quite different between the upper limbs and lower limbs, namely, the muscles in the lower limbs were well-developed but the one in the upper limbs showed normal without grip muscles. This feature was confirmed in the bones of TRH-1. They showed that the walking occupied the high percentage of the life.

It was a pity that there was not enough time for the analysis. The results were preliminary. I expect for the next opportunity for the study in future.

The collecting of the samples for carbon 14 dating method was performed.

The number of samples became large because there were few complete bone and several individuals might be collected from same cairn. I could send the samples to Japan for the dating with the kind help of Syrian government and the staff.

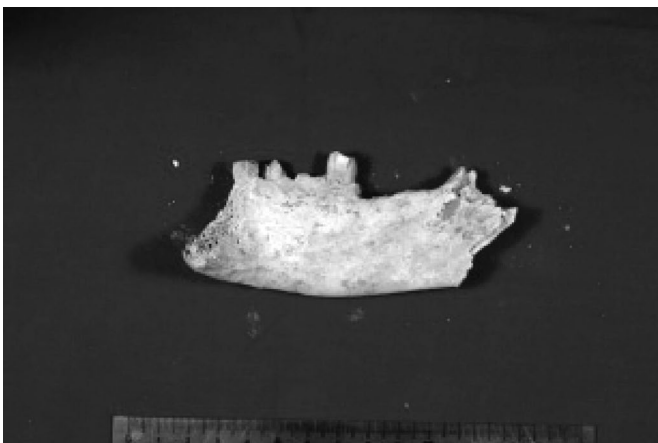


Fig. 1 Right lower jaw from TRH-1/BC-117.



Fig. 2 Sacrum from TRH-1/BC-117.

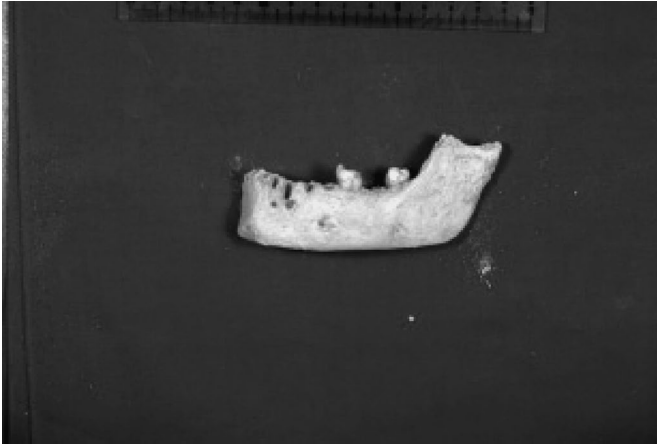


Fig. 3 Left lower jaw from TRH-1/BC-123.

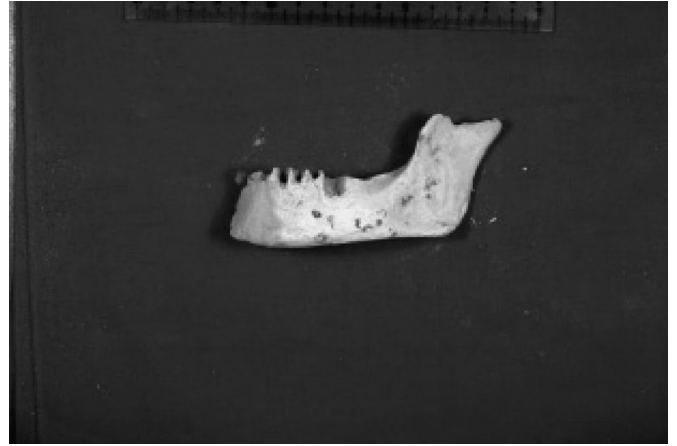


Fig. 4 Left lower jaw from TRH-1/BC-123.

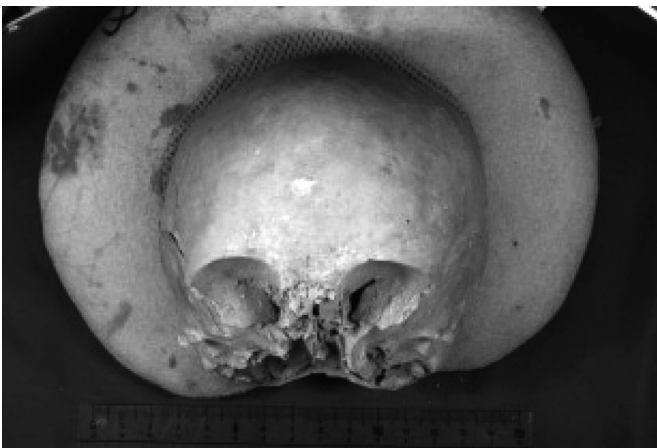


Fig. 5 Skull from TRH-1/BC-130.

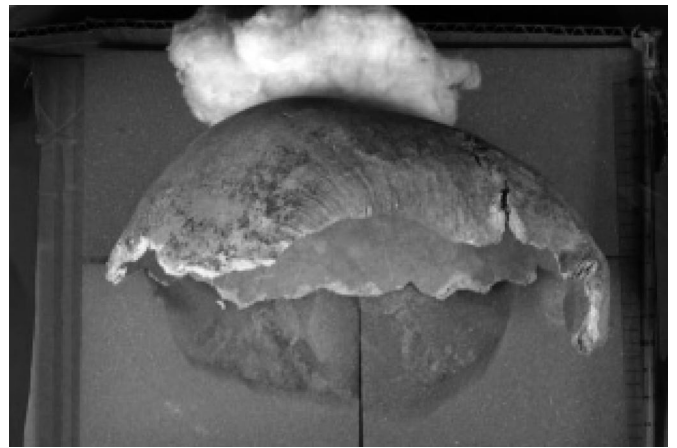


Fig. 6 Skull cap from TRH-1/BC-117.



Fig. 7 Left upper jaw from TRH-1/BC-133.

4. Sondage in Square 6 of the Site of Tell Ghanem Al-Ali

Katsuhiko OHNUMA (Professor, Kokushikan University)

In this working season, sondage was carried out in Square 6 of Tell Ghanem Al-Ali (Fig. 1). In the 9th working season in May this year, we started sondage in this square to obtain information concerning the duration of the site exploitation in the Bronze Age and its intra-site functional variability. As the result of this sondage, a pit grave was unearthed with human bones and 7 pieces of pottery, which are dated to the Middle Bronze Age on the basis of pottery typology (Fig. 2).

Layers under the pit grave were not excavated in the 9th working season, and the archaeological sequence of this square was confirmed only within the limit from the surface soil down to the base of the pit grave as below.

Layer 1: Surface soil, sloping downwards into north direction in the thickness of 10 to 15 cm.

Layer 2: Pit grave which was made by the Middle Bronze Age people with cutting downwards into Layers 3. This pit was not shaped circle in outline but was shaped irregular meandering circle, suggesting that it had not been made systematically.

Layer 3: Brownish or yellowish hardened soil, 20 cm in accumulation at the thickest part, which was partly cut down at the time of the pit grave making. This layer bore sporadic and discontinuous lines of ash and potsherds of the Early Bronze Age Phase IVa.

In the view that further knowledge of the archaeological sequence below the pit grave in Square 6 is indispensable to understand details of the site exploitation at Tell Ghanem Al-Ali in the Bronze Age and to tell its intra-site functional variability, we carried out continued sondage in this square in this working season.

As the result, we revealed the archaeological sequence beneath the pit grave as follows, though far from having reached the “virgin soil”.

Thin layers of hardened soil of various colours (Layer 3): Horizontal thin layers, some 20 cm in thickness in total, altogether forming Layer 3. These thin layers were neither very hardened nor bearing continuous ash.

Floor with *gyus* plaster: The bottom of Layer 3, some 10 cm down from the bottom of the pit grave, was a floor with *gyus* plaster and rather continuous ash (Fig. 3). This floor had been made by the inhabitant at the site of the Early Bronze Age Phase IVa, with cutting and leveling of a mud brick wall supposedly having more or less existed at the time of the floor making. The floor is very hardened, and the lines of the mud brick wall run in northwest to southeast and eastnorth to westsouth directions.

Building Level 1: Under the floor with *gyus* plaster and ash described above, a layer with potsherds and flakes/chips of lithic artifacts also of Early Bronze Age Phase IVa was unearthed in the thickness of some 10 cm. This layer can be defined as Building Level 1 in Square 6, for it is associated with the mud brick wall described above and a floor. This floor had been made with cutting and leveling of a lower wall and is very hardened. It bears *gyus* plaster and rather continuous ash (Fig. 4). The wall of Building Level 1 and the lower wall are different in their directions, that is, northwest to southeast and eastnorth to westsouth directions for the former, and north to south and east to west directions for the latter.

The sondage works carried out so far in Squares 1 to 6 at Tell Ghanem Al-Ali and surveys on the tell surface have demonstrated that the Early Bronze Age building complexes at Tell Ghanem Al-Ali may have been associated with walls of at least two different directions, that is, north to south and east to west directions on the one hand, and northwest to southeast and eastnorth to westsouth

directions on the other.

As already described, two walls unearthed in Square 6 in this working season run in two different directions. The upper wall associated with Building Level 1 runs in northwest to southeast and eastnorth to westsouth directions, while the lower wall runs in north to south and east to west directions.

This is to provide a good material, after detailed study of the directions of walls at Tell Ghanem Al-Ali on the whole, to correlate Building Level 1 of Square 6 with levels of other squares at Tell Ghanem Al-Ali.

Through series of integrated research we have undertaken in the past three years in the region covering Tell Ghanem Al-Ali, Wadi Shabout and Bishri Desert plateau, we are now reaching a supposition that the site of Tell Ghanem Al-Ali was at its height in the Early Bronze Age and became diminished in later period in the Middle Bronze Age, with sporadic small-scaled houses and simple pit graves alone on it.

This supposition seems to be supported by the archaeological sequence in Square 6 at Tell Ghanem Al-Ali, in which we may see how Middle Bronze Age people made simple pit graves there, digging down into the ruins of Early Bronze Age buildings (Fig. 5).

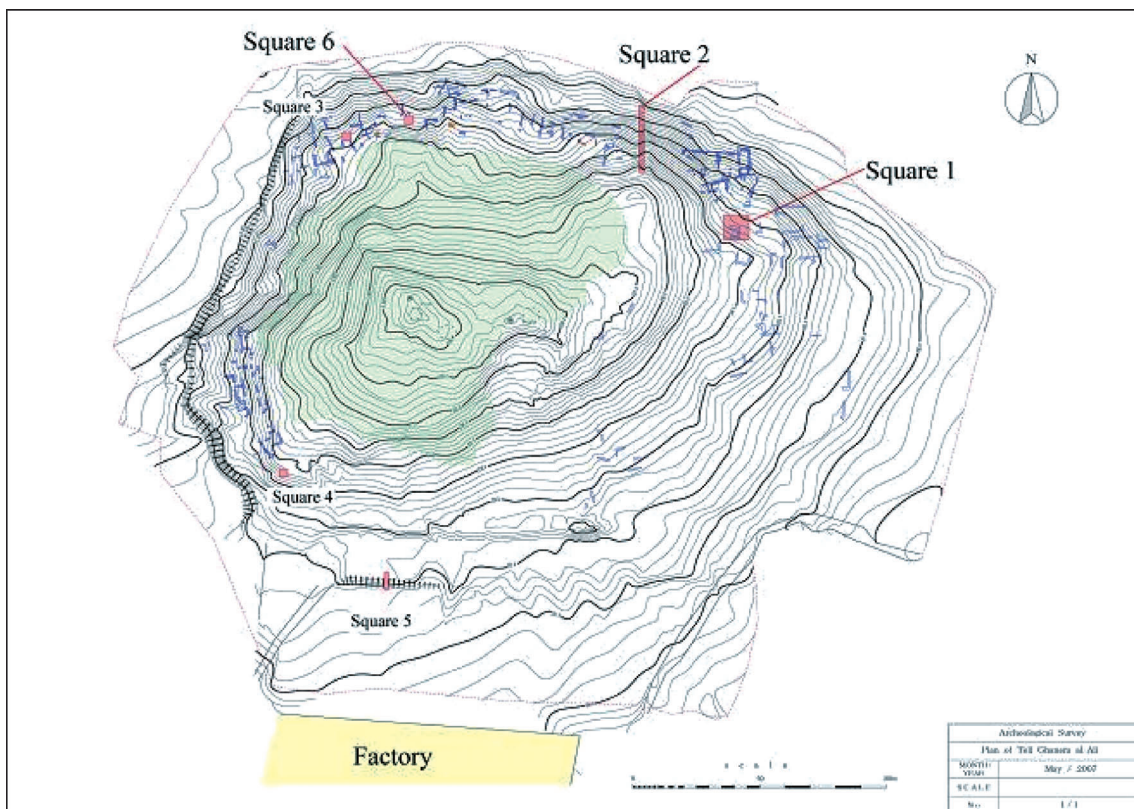


Fig. 1 Overall plan of Tell Ghanem Al-Ali showing the location of Square 6.



Fig. 2 Pit-grave unearthed from Square 6 in the 9th working season, seen from north.



Fig. 3 Floor with *gyus* plaster and lines of the mud brick wall levelled for the floor making, seen from north.



Fig. 4 Wall and floor of Building Level 1 seen from north. Note the lines of the lower wall running in different directions from the lines of the wall of Building Level 1.

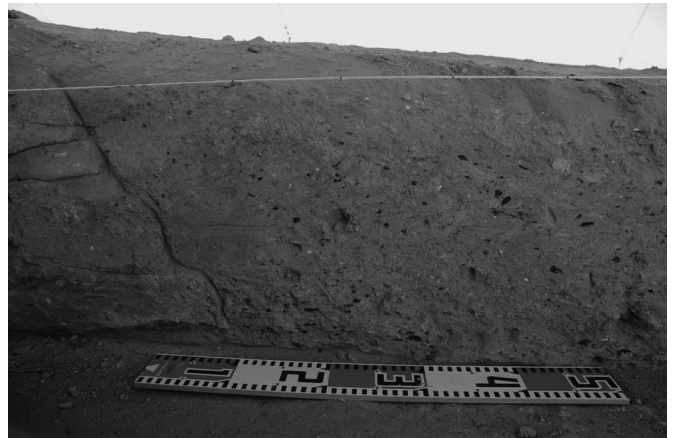


Fig. 5 Pit seen at the northwest corner of Square 6. This pit was most probably associated with another Middle Bronze Age pit-grave.

5. Sondage in Square 101 of the Site of Tell Ghanem Al-Ali

Ibrahim KHALIL (Department of Antiquities and Museums, Raqqa)
Ahmed SULTAN (Department of Antiquities and Museums, Raqqa)

Sondage was conducted from 8 to 20 of August at the south-eastern spot of Tell Ghanem Al-Ali. We named this spot Square 101 (Fig. 1). In the 9th working season, we considered this spot to be unique with concentrated cobbles of gypsum rock (Fig. 2), considering it to have been a probable grave.

As the result of the sondage in this working season, we unearthed a complete miniature pottery, an almost complete pottery (Fig. 3), a spindle wheel, and rather many flakes and chips of the Bronze Age lithic artifacts from the accrmulation under the pavement-like cobbles allocation. The function of this unique cobbles allocation within the site of Tell Ghanem Al-Ali is now under study.



Fig. 1 South-eastern spot of Tell Ghanem Al-Ali with cobbles allocation.



Fig. 2 Square 101 with cobbles allocation.



Fig. 3 Pottery unearthed from accumulation under cobbles allocation.

الموسم العاشر من أعمال البعثة الأثرية السورية اليابانية المشتركة في منطقة البشري

بدأت أعمال هذا الموسم في الأول من آب وانتهت في التاسع من أيلول لعام 2009م 0

يدير البعثة من الجانب السوري أحمد سلطان ومن الجانب الياباني كاتسوهيكو اونوما

شكر خاص للدكتور بسام جاموس المدير العام للآثار والمتاحف في سورية والدكتور ميشيل مقدسي مدير التنقيب والبحث الأثري في المديرية العامة للآثار والمتاحف والمشرف المستشار

لهذا البحث الأثري , لما قدموه من دعم ومساندة في سبيل إنجاز هذا الموسم من البحث 0

فقد تم تنفيذ سلسلة من الأبحاث الأثرية والجيولوجية المتنوعة في هذا الموسم والتي سنقدم شرح عن هذه الأعمال وفق ما يلي :

أولاً : استكمال أعمال السبر الاختباري في المربع رقم 6 في تل غانم العلي :

(كاتسوهيكو اونوما , بروفييسور جامعة كوكوشيكان)

يقع هذا المربع عند الزاوية الشمالية الغربية من تل غانم العلي , والذي تم فتح السبر فيه الموسم الماضي وتهدف أعمال السبر في هذه المنطقة من التل إلى التعرف على فترة الاستيطان لعصر البرونز في التل 0

وكنتيجة لأعمال الموسم الماضي فقد تم الكشف عن حفرة لقبر داخل المربع تحتوي على العظام الإنسانية بالإضافة إلى سبعة أواني فخارية والتي تم تأريخها إلى عصر البرونز الوسيط 0 وقد توقف التنقيب في هذا المربع عند سووية القبر , دون البحث في سوويات أقدم 0 حيث اشتملت السويات الأولى من الحفيرة على :

السوية الأولى : والتي احتوت تربة سطح التل وكانت هذه السوية منحدره باتجاه الشمال بسماكة تراوحت بين 10-15سم

السوية الثانية : احتوت هذه السوية على حفرة القبر التي تم حفرها خلال عصر البرونز الوسيط وقد امتدت هذه الحفرة حتى السوية الثالثة شكل هذه الحفرة لم يكن منتظم ويبدو أنه مبني بطريقة عشوائية 0

السوية الثالثة : والتي احتوت على تربة بنية مائلة إلى الصفار بسماكة 20سم , تخللها خطوط متقطعة من الرماد مع بعض الكسر الفخارية التي تعود إلى عصر البرونز القديم 0

إن دراسة الطبقات الأثرية الموجودة أسفل حفرة الدفن تساعد على فهم فترة استيطان تل غانم العلي خلال عصر البرونز , ففي هذا الموسم تم استكمال أعمال السبر في أسفل هذه الحفرة

حيث تم الكشف عن السوية الأثرية الأقدم تحت حفرة القبر بهدف الوصول إلى تربة التل الأصلية هذه الطبقة التي تحتوي على تربة قاسية متعددة الألوان 0

تم الكشف عن طبقة سميكة من التربة الصلبة مختلفة الألوان بسماكة 20سم يتخللها خطوط من الرماد , كشف أسفل هذه الطبقة عن أرضية من الجص بسماكة 10سم مشكلة بواسطة سكان عصر البرونز القديم في التل , يتخللها جدار من اللبن باتجاه جنوب شرق و شرق شمال نحو جنوب غرب 0 أسفل هذه الأرضية وجد طبقة تحتوي على كسر فخارية تعود إلى عصر البرونز القديم بسماكة 10سم 0 حيث أظهرت هذه السوية ملامح أول الأبنية في هذا المربع من التل , تم الكشف عن جدار آخر من اللبن متوضع أسفل الجدار الأول ولكن باتجاهات مختلفة حيث يكون باتجاه شرقي جنوبي وشمالي شرقي نحو جنوب غرب 0



لقد دلت المسوحات الأثرية المنفذة على سطح تل غانم العلي و أعمال السبر الاختباري المنفذة في المربع 1 والمربع 2 والمربع 6 , على وجود ترابط بين تركيب الأبنية العائدة لعصر البرونز القديم وهذه الجدران التي لها اتجاهات مختلفة

وكما ذكر سابقاً , فقد تم الكشف عن جدارين من اللبن متوضعين فوق بعض ولكن باتجاهات مختلفة , حيث ينتمي الجدار العلوي الذي كان باتجاه شمالي غربي نحو الجنوب الشرقي وشرق شمال نحو الغرب الجنوب إلى مباني السوية الأولى من تل غانم العلي , بينما يمتد الجدار الأدنى باتجاه شمالي جنوبي وشرقي غربي 0

وبذلك تكون هذه الجدران قد قدمت تفاصيل جديدة في دراسة سويات الأبنية ضمن المربع 6 في تل غانم العلي ومقارنتها وربطها بسويات المربعات الأخرى في التل 0

فمن خلال البحث والدراسة التي نفذت في هذه منطقة البحث التي امتدت من تل غانم العلي والمنطقة المجاورة له باتجاه الجنوب نحو منطقة جبال البشري والتي بدأت منذ ثلاث سنوات يمكن الافتراض بأن تل غانم العلي كان خلال عصر البرونز القديم على ارتفاع اكبر ومن ثم انخفض ارتفاعه في عصور لاحقة خلال عصر البرونز الوسيط الذي يظهر سكن متقطع خلال هذه الفترة في تل غانم العلي 0

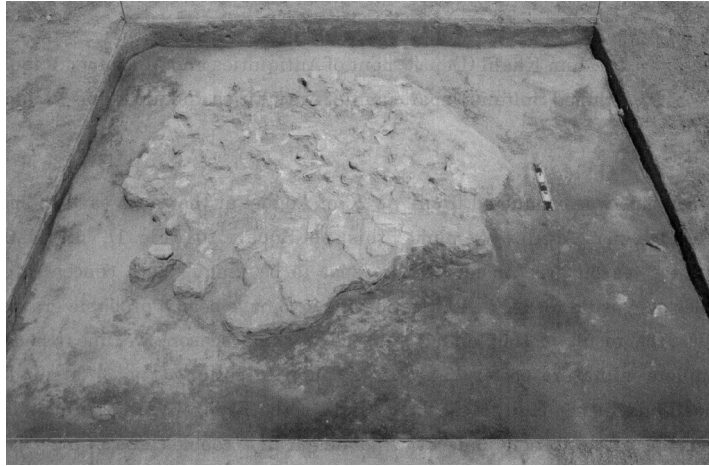
ويمكن دعم هذه الفرضية من خلال السويات الأثرية الموجودة في المربع 6 من تل غانم العلي , والتي تبين كيف ساهم مجتمعات عصر البرونز القديم في تشكيل مقابر لهم من خلال حفر صغيرة فوق بقايا الأبنية العائدة لعصر البرونز القديم 0

ثانياً : إجراء سبر اختباري في المربع 101 في تل غانم العلي :

(احمد سلطان , المديرية العامة للآثار والمتاحف 0 إبراهيم الخليل, المديرية العامة للآثار والمتاحف)

يقع هذا المربع عند المنحدر الجنوبي الشرقي من تل غانم العلي , فخلال أعمال المسح الأثري لتل غانم العلي في الموسم السابق لوحظ وجود مجموعة متراكمة من الحجر الكلسي على شكل دائري محيط قطرها حوالي 2م , حيث كان من المعتقد تشكل قبر تحتها 0

تم الحفر إلى عمق وصل إلى 40سم تقريبا لم يتم الكشف فيها عن أية سوية معمارية , إذ تم الكشف ضمن هذه الحفرية عن جرة فخارية بحالة جيدة تعود إلى عصر البرونز القديم, بالإضافة إلى دولا ب لنموذج عجلة فخارية , أيضاً كمية كبيرة من الكسر الفخارية التي ما تزال قيد الدراسة والتوثيق 0



ثالثاً : مسح أثري للمدافن الحلقية (Tumuli) ضمن جبل البشري :

(سوميو فوجي , بروفيسور جامعة واسيدة 0 تاكورا ادانشي ,مركز الشرق الأوسط طوكيو 0 كازويوشي ناغايا طالب جامعة واسيدة 0 كي سوزوكي طالبة جامعة واسيدة كيوشي إنو طالب)

كما ذكرنا في المواسم السابقة حيث يعتبر هذا البحث كجزء من أعمال البعثة السورية اليابانية المشتركة في منطقة البشري , الذي يهدف إلى الكشف عن السويات الأثرية للمدافن الحلقية العائدة للقبائل البدوية المتنقلة (الأمورية) في جبل البشري مع إلقاء الضوء على طريقة ظهور هذه القبائل في المنطقة التي أشارت النصوص السومرية والأكادية إلى وجودهم في هذه المنطقة 0 وبناء على ذلك فقد تم تنفيذ مجموعة من الأبحاث الأثرية منذ الموسم الأول الذي بدأ في شهر أيار من عام 2007 0

فبعد إجراء مجموعة من المسوحات الأثرية للمنطقة بشكل عام مع التركيز على أعمال السبر الاختباري لبعض المدافن الحلقية المنتشرة في المنطقة بشكل عام ومنطقة حداجة وطول رحوم بشكل خاص , هذا الموسم استمرت أعمال السبر لهذه المدافن الحلقية ولكن في منطقة وادي حيوز 1و2 , ووادي حداجة 2و4 , ووادي جل الطيور 2 , بالإضافة إلى إجراء مسح أثري للجزء الشمالي من منطقة البحث 0

اسبار في مدافن وادي حيوز 1و2 : تنتشر مجموعة من المدافن الحلقية الصغيرة الحجم في منطقة حيوز التي تبعد 10 كم جنوب وجنوب غربي منطقة بير رحوم , حيث تم دراسة خمسة مدافن حلقية في وادي حيوز 1 ومدفن واحد في منطقة وادي حيوز 2 , ومن خلال دراسة طبيعة هذه المدافن تبين أنها تتبع لنفس السويات الأثرية في مدافن الحلقية في منطقة حداجة 1و2 0



ففي المدفن BC-05 في منطقة حيوز 1 الذي كان مشيد فوق هضبة مستديرة يحيط فيه مجموعة من الأحجار الكلسية . معظم هذه المدافن كانت متعرضة للنهب والسرقة , تم العثور بداخلها على الخرز والكسر الفخارية وبعض الكسر البرونزية الصغيرة بالإضافة إلى كسر من العظام الإنسانية 0

اسبار في مدافن وادي حداجة 2 و 4 : تبعد مدافن وادي حداجة حوالي 5 كم شرق منطقة بير رحوم , حيث تم إجراء الأسبار لتسعة مدافن حلقيه في هذه المنطقة , ثمانية منها في وادي حداجة 2 , ومدفن واحد في وادي حداجة 4 , فقد تم العثور في أكبر هذه المدافن على عدد من الكسر الفخارية والخرز المتعدد الأشكال بالإضافة إلى مسمار برونزي , وقد أثبتت هذه المكتشفات بأن المدافن الحلقيه في منطقة جبل البشري تنتمي إلى عصر البروز الوسيط 0

اسبار في مدافن وادي جل الطيور 2 : وبهدف الكشف عن معلومات أوسع عن المدافن الحلقيه في منطقة البشري بشكل عام فقد تم توسيع البحث باتجاه منطقة جل الطيور 2 التي تبعد حوالي 8 كم شرقي وشمالي شرقي منطقة بير رحوم , حيث تم سبر مجموعة من الدافن الحلقيه المنتشرة , ففي المدفن BC-01 الذي تألف من سورين خارجيين من الحجاره الكلسية تم الكشف ضمن حجرة الدفن على أربعة حلقات برونزية والخرز وعدد من بقايا العظمية أيضاً .

وفي المدفن BC-02 الذي كان مشيد فوق هضبة مرتفعة تحيط فيه مجموعة من الحجاره الكلسية أيضاً تم الكشف ضمنه على خرزة مصنوعة من الحجر الأسود بالإضافة إلى عدد كبير من الكسر العظمية الإنسانية 0



صورة شاملة لمنطقة البحث

مسح أثري للجزء الشمالي من منطقة البحث : فقد تركز عمل الفريق خلال الأسبوعين الأخيرين من هذا الموسم على مسح الجزء الشمالي من منطقة البحث , إذ تم تسجيل حوالي 17 منطقة تحتوي على المدافن الحلقية , حيث بلغ عدد المدافن المنتشرة في هذه المناطق حوالي 131 مدفن حلقي , وكلها تندرج تحت نطاق منطقة البحث

خلاصة : مع نهاية أعمال هذه الموسم يكون عدد المناطق التي احتوت المدافن الحلقية سبعة مناطق حيث تم تسجيلها ودراستها وإجراء الاسبار فيها , وقد ساهمت في تقديم معلومات واسعة عن المجتمعات الرعوية المتنقلة ضمن هذه المنطقة خلال عصر البروز , حيث أنه وحتى الآن لا يوجد دليل واضح وقطعي بأن الجهة الشمالية الشرقية من جبل البشري كانت مركز انطلاق المجتمعات الرعوية المتنقلة خلال عصر البرونز الوسيط 0 فخلال أعمال السبر تم الكشف على مجموعة من المنتجات البرونزية والخرز المتعدد الأنواع بالإضافة إلى الكثير من العينات الفخارية والتي دلت على وجود صلة لهذه المجتمعات بالثقافة السومرية والأكادية في شمال بلاد الرافدين من جهة , ومع المجتمعات الريفية المستقرة على حوض الفرات الأوسط من جهة أخرى .

إذاً هناك ارتباط لمجتمعات البرونز الوسيط المتنقلة في منطقة البشري مع المجتمعات المتحضرة التي استقرت إلى الشمال والجنوب منها 0 ومما لا شك بأن الدليل المباشر للتأكد من أن هذه المجتمعات هي جزء من القبائل الأمورية يحتاج إلى التوسع اكبر في عملية البحث ضمن هذه المنطقة بشكل عام 0

رابعا : استخراج عينات ترابية من المصاطب القديمة لنهر الفرات :

(ميتسو هوشينو , جامعة ناغويا 0 تاكيشي سايبوتو جامعة ميغو 0 يوشي كاتسورادا جامعة ناغويا)

قام الفريق الجيولوجي بجمع الكثير من العينات الترابية للطبقات الموجودة ضمن المصاطب القديمة لحوض الفرات الأوسط وذلك بهدف التعرف على طبيعة التكوين الجيولوجي لهذه المنطقة منذ زمن قديم 0

ففي هذا الموسم تم اختيار منطقتين بجانب سرير النهر لاستخراج عينات ترابية منها بواسطة استخدام جهاز سبر (boring machine) , حيث يقوم هذا الجهاز باستخراج عينات ترابية على عمق أكثر من 10 م تقريبا 0

ففي المنطقة الأولى تم استخراج عينات طينية من عمق وصل إلى 7.7 م , حيث كان لون الطين بنياً عند سطح الأرض , بينما تغير لون الطين إلى الخضار عند أعماق نقطة . كما لوحظ وجود بعض الترسبات الكلسية على أعماق مختلفة , أيضا لوحظت سوية مياه النهر ممتدة على عمق بين 1 - 1.5 م 0

أما في المنطقة الثانية وعلى عمق 30 سم من سطح الأرض فقد كان الطين ذو لون بني , بعدها تغير اللون إلى الخضار , وعلى عمق 40 سم عثر على رمل نهري , وعلى عمق 5.9 م عثر على رواسب حصوية , سوية سرير النهر كانت على عمق 1-1.5 م -

هذه العينات المستخرجة تتم حالياً تحليلها ودراستها في مخابر خاصة بجامعة ناغويا بهدف التوصل إلى معلومات أكبر عن طبيعة تكوين تربة حوض الفرات الأوسط 0

خامسا : دراسة مورفولوجية للعظام الإنسانية ضمن منطقة البشري :

شملت هذه الدراسة مجموعة الهياكل العظمية المستخرجة من المدافن الحلقية المنتشرة في منطقة طول رحوم , حيث وُجدت أهم الهياكل العظمية المساعدة لهذه الدراسة في المدافن 117 – 118 – 123 – 126 – 127 – 130 – 131 – 133 – 0

حيث قدمت هذه الدراسة مجموعة من النتائج الهامة التي ساعدت في الدراسات والأبحاث الأثرية في هذه المنطقة 0 فقد احتفظت هذه المدافن الحلقية بالعديد من العظام التي تعود لأشخاص ذو عمر متوسط وأيضاً أشخاص كبار السن من الجنسين الذكر والأنثى.

فمن خلال نتائج تحليل العينات العظمية في موسم 2008 تبين أن نمو العضلة مختلف تماماً بين المفاصل العليا وبين المفاصل السفلى التي كان نمو العضلة فيها بشكل أفضل من العليا مما يدل على مشي متواصل لهذه المجموعات البشرية في حياتهم 0

كذلك تتم دراسة وتأريخ بعض من العينات العظيمة بواسطة الكربون 14 المستخدم ضمن مخابر في طوكيو 0 والتي ستقدم تأريخ دقيق ومعلومات أكبر عن حياه هؤلاء الأشخاص 0

ARCHAEOLOGICAL RESEARCH IN THE BISHRI REGION
— REPORT OF THE ELEVENTH WORKING SEASON —

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October 25, 2009

The 11th working season of the Syria-Japan Archaeological Joint Mission to the Bishri Region was undertaken from October 11 to October 25, 2009. The members of the joint mission from the Syrian and Japanese parties are as follows.

Syrian party: Mohamad Sarhan (Director) and ‘Aid ‘Aisa.

Japanese party: Shogo Kume.

Before describing our activities, we would like to express our sincerest thanks to Dr. Bassam Jamous, the Director General of the Syrian Directorate General of Antiquities and Museums, and Dr. Michel Al-Maqdissi, the Syrian Supervising Adviser for this joint mission and the Director of Archaeological Excavations and Research at the Syrian Directorate General of Antiquities and Museums, who made available their generous help and heart-warming cooperation. Our sincerest thanks also go to local staff at Raqqa Museum. Especially, generous supports from Mr. Jajan and Mr. Sale were very helpful for us.

In this working season, we undertook cleaning and survey of an Early Bronze Age cemetery located at the Wadi Daba area near the site of Tell Ghanem al-‘Ali. The following is the results of the season.

Cleaning and survey of Early Bronze Age shaft graves at Wadi Daba cemetery near Tell Ghanem al-‘Ali

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Introduction

The fourth season of the field researches focused on Early Bronze Age (EBA) cemeteries near Tell Ghanem al-‘Ali was conducted from 11th to 18th October 2009. Previous seasons including survey, cleaning and sounding of the cemeteries in the area defined four unique associations of types of graves, which contain distinctive land use patterns across the landscape, i.e. 1) hilltop burial cairn, 2) hilltop cist/stone-chamber graves, 3) inland cist/stone-chamber graves with shaft graves, and 4) lowland shaft graves (Numoto and Kume 2009a, 2009b, n.d.).

Amongst them, this season targeted on the lowland shaft graves named Wadi Daba cemetery located at the modern village of Ghanem al-‘Ali in the Euphrates Valley, approximately 650 m southwest from Tell Ghanem al-‘Ali (Fig. 1). Our primary goal was to develop funerary dataset in the area

towards an attempt to explain relationships between the cemeteries, which should allow us to understand the nature of burial practices of the EBA communities in the middle Euphrates Valley.

Survey of Wadi Daba cemetery

Wadi Daba, a tributary wadi of the Euphrates, flows into a dwelling area of the modern village of Ghanem al-'Ali. In the area, fluvial processes have formed steep slopes on the both sides of the wadi course, eroding a terrace of the Euphrates (Fig. 1). The 2007 pilot survey documented two clusters of seriously plundered EBA shaft graves, excavated into the western slope of the course (Tsuneki 2008). Apparently, many shaft graves were also found just northwest of the cemetery, where a slope of the Euphrates terrace was formed, but recent house constructions seriously destroyed the archaeological loci.

In this season, one-day quick survey targeted on the slopes of the wadi bank and the river terrace was conducted to document spread of plundered graves. In particular, the slope of the river terrace was carefully examined, since preserved slopes in the area potentially imply EBA burial places. Most parts of the slopes have severely been destroyed by modern activities of house, road and canal constructions, etc (Fig. 1). However, well-preserved part of the slopes was located between a modern road and a small wadi, where several depressions excavated by robbers were identified. Combined the burials with the results of previous research, three units of grave-clusters were thus far defined in the Wadi Daba cemetery area (Fig. 1):

Unit A (Fig. 2) is located at the western slope of Wadi Daba, stretching c. 55×11 m. Some 20 entrances of plundered shaft graves and many depressions dug by robbers were identified. At the present, part of the slope has been cut, probably for borrowing soils. In addition, these seriously plundered graves have often been used as garbage pits by locals.

Unit B (Fig. 3) is also located at the western slope of Wadi Daba, covering an area of c. 20×30 m. Approximately 15 plundered shaft graves were identified. Southern edge of the area has been cut by modern road, suggesting these graves were principally part of Unit A. However, the cluster has currently been defined as an independent Unit for the reason of convenience of the investigations. The pits have also been used for garbage purpose.

Unit C (Figs. 4a and 4b) is located at the slope of the terrace of the Euphrates, some 150 m northwest of Unit B. This unit contains six to seven depressions excavated by grave robbers, covering an area of 15×20 m. Although a modern house and courtyard has occupied on the terrace immediately above the slope, the plundered area itself has retained original surface of the slope.

Cleaning of a plundered shaft grave at Unit C of Wadi Daba cemetery

Following the survey, we selected Unit C as an area for cleaning because of the well-preserved condition of the slope and robbers' pits. As a research procedure, a 4×4 m square was laid out, enclosing a large robbers' pit, to uncover plundered graves. At the same instance, a 1×11 m narrow square attached to the main square was also opened to attest spread of graves. Because several grave/robbers' pits were successfully identified in the narrow square, the main square was enlarged to the west. Consequently, the research area was composed of the main 4×10 m square and 1×5 m sub-square (Fig. 5). Amongst the identified grave/robbers' pits, cleaning was concentrated on a shaft grave because of one-week limited time of the field season.

The rectangular entrance of the grave measures c. 1.2×0.8 m in length and width. The orientation of the grave indicates the NE-SW direction. The 2.5 m deep shaft was excavated with a slope toward the SW, then a pair of stairs were set, leading to the burial chamber. The height of the stairs measures some 0.8 m. The bottom of the stairs was constructed using two mud bricks. Three undressed gypsum stones were additionally laid on the bricks. Two monolithic gypsum stones were also used to seal the entrance of the chamber (Fig. 6 and 7). Very few artefacts were recovered from the shaft, but

collected an *Al Hamra* cigarette package suggest the grave was plundered within some twenty years.

The oval burial chamber measures c. 2.2×2.8 m in length and width, and c. 1.0 m in height. The chamber produced a massive pile of sherds at the SE quadrant (Fig. 8). They are including 14 complete vessels (Fig. 9) and many semi-complete sherds. Although intensive refitting has not yet been carried out, more than 30 individuals might have been placed there, suggesting multiple inhumations were performed. The sherds include both of fine and plain wares. In particular, a recovered vessel of so-called Black Euphrates Ware with spiral burnishing (Fig. 10) indicates that the burial is dated to Phase 4 (c. 2450-2300 BC) defined by A. Porter (Porter 2007).

Immediately beneath the pile, fragmented elements of human remains were attested. Damaged condition of the remains only allowed us to document a concentration of fragmented cranial bones at the eastern edge of the chamber. So far, no information of the bones has been obtained, since analysis of the human remains is still in progress.

The artefacts recovered from the pile also included a zoomorphic (probably sheep/goat) pendant (Fig. 11), fragments of bronze pin with mushroom-shaped head (Fig. 12) as well as various beads made of bone, shell and stone (Fig. 13).

Although there were no built-in features in the chamber, four postholes dug into the bottom were unearthed at the eastern edge. The interval of each hole measures c. 0.9×0.5 in major and minor axes. The location of the postholes, situated just beneath of the pile of sherds and human remains, may suggest a wooden coffin or a table for grave goods, or the like was laid out (Fig. 14).

Some remarks

The fourth season produced relatively rich funerary dataset of “lowland shaft graves”, which would allow us to assess backgrounds of this type of cemetery and relationships with other categories. Of particular note is obtained concrete evidence of pottery sherds, dated the grave to c. 2450-2300 BC, since dating of graves was often disturbed by the scattered nature of the salvaged collections in our past researches. Intensive future work is still required at the cemetery, which possibly contains several well-preserved graves.

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Fig. 1: Research area and distribution of plundered graves (Satellite image after *Google Earth*, partly supplemented by *Quickbird*).



Fig. 2: Plundered graves at Unit A, looking west.



Fig. 3: Plundered graves at Unit B, looking northwest. Graves are used as garbage pits.



Fig. 4a: Traces of depressions dug into the slope by grave robbers at Unit C, looking west.



Fig. 4b: Distant view of Unit C, looking south. Eastern edge of the slope of the Euphrates terrace is cut by modern road.

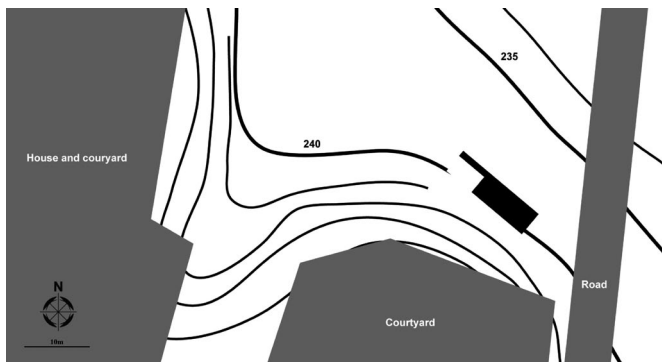


Fig. 5: Location of square laid out at Unit C. 1 m interval contour lines were reproduced from a 1/5000 topographic map published in Syria.

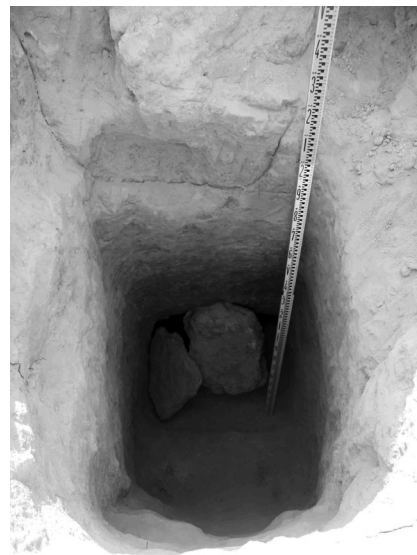


Fig. 6: Shaft of the grave. Two monolithic stones seal the entrance of the chamber.



Fig. 7: A pair of stairs, leading to the chamber. The bottom of the stairs is constructed using two mud bricks.



Fig. 8: A pile of pottery in the burial chamber.



Fig. 9: Complete vessels recovered from the chamber.



Fig. 10: So-called Black Euphrates Ware. Spiral burnishing is clearly observed.



Fig. 11: Zoomorphic (probably sheep/goat) pendant.



Fig. 12: Bronze pin with mushroom-shaped head.



Fig. 13: Examples of recovered beads.



Fig. 14: Postholes unearthed from the bottom of the chamber.

الموسم الحادي عشر من أعمال البعثة الأثرية السورية اليابانية المشتركة في منطقة البشري

بدأت أعمال البعثة السورية اليابانية المشتركة في منطقة جبال البشري بتاريخ 11 تشرين الأول
وانتهت بتاريخ 25 تشرين الأول من عام 2009 0

احمد سلطان مدير الجانب السوري

كاتسو هيكو اونوما مدير الجانب الياباني

بداية نتقدم بخالص الامتنان والشكر الجزيل للدكتور بسام جاموس المدير العام للآثار والمتاحف
في سورية والدكتور ميشيل مقدسي مدير التنقيب والدراسات الأثرية في سورية والمشرف
المستشار لهذا البحث الأثري , لما قدموه من دعم ومساعدة لإنجاح في إنجاح هذا الموسم 0

تركزت أعمال هذا الموسم على بحث ودراسة منطقة واحدة من مناطق البحث والتي اشتملت
على تنظيف وتسجيل ودراسة المدافن العميقة (shaft graves) المنتشرة على طول حافة
وادي الضبع المجاور لموقع تل غانم العلي 0

مسح المدافن الممتدة على حافة وادي الضبع

(هيروتوشي نوموتو, بروفييسور جامعة طوكيو 0 شوغو كومي , طالب , جامعة طوكيو)

حيث يعتبر هذا هو الموسم الرابع من عمل هذا الفريق ضمن بحث هذه البعثة المشتركة . حيث
تتركز أبحاث هذا الفريق على دراسة مدافن عصر البرونز القديم المجاورة لتل غانم العلي
(حوالي 1 كم جنوب التل)

فقد اشتملت أعمال هذا الفريق في المواسم السابقة على مسح ودراسة المدافن المنتشرة في هذه
المنطقة وقد كشفت هذه الدراسة عن أربعة نماذج من المدافن التي توزعت على الحافة الجبلية
المقابلة لتل غانم العلي 1- المدافن الحلقية (Tumuli) 2 المدافن الحجرية (stone
chamber) توضع هذه المدافن فوق الحافة الجبلية 3- المدافن الحجرية (stone
chamber) والمدافن العميقة أيضاً 4- المدافن العميقة (shaft) توضع هذه المدافن
في المنطقة المنخفضة أسفل الحافة الجبلية 0

تركز البحث لهذا الموسم على دراسة المدافن العميقة (shaft graves) الواقعة في المنطقة
المنخفضة على حافة وادي الضبع المجاور لبلدة غانم العلي على الفرات الأوسط , حوالي 650
م جنوب غربي تل غانم العلي , حيث تهدف هذه الدراسة إلى محاولة فهم طبيعة وأسلوب الدفن
لمجتمعات عصر البرونز القديم على حوض الفرات الأوسط 0

فخلال مسح المنطقة الممتدة على طول الوادي تبين وجود مجموعة من المدافن العميقة (shaft
graves) المنهوبة التي تعود إلى عصر البرونز القديم منتشرة على حافة الوادي الذي يمر
ضمن القرية , حيث تم تقسيم هذه المدافن إلى ثلاثة قطاعات 0 A . B . C

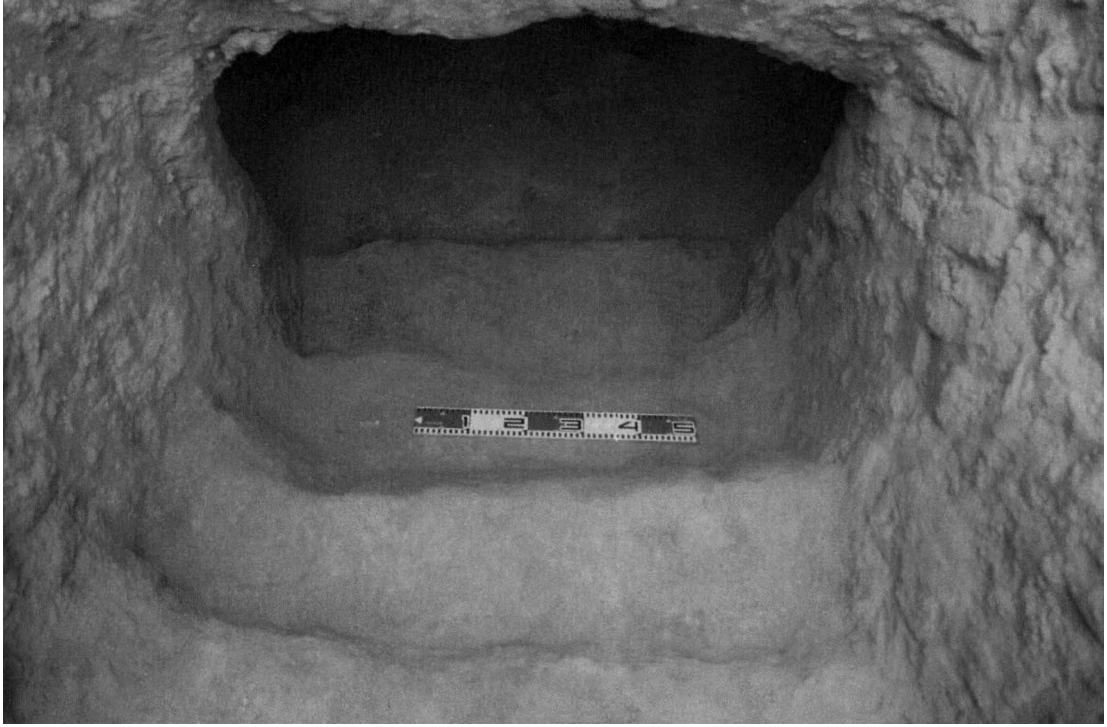
فقد تم إجراء السبر الاختباري للقطاع C الذي يبعد حوالي 150 شمال غرب القطاع B , ويغطي مساحة 20×15 م , حيث تم تحديد مربع بقياس 4×4 م , تضمن مدفن منهوب كما تم تحديد حفرة بقياس 1×1 م ملاصق للمربع السابق بهدف التحقق من امتداد هذه المدافن المنهوبة في القطاع , والتي امتدت باتجاه الغرب 0 وبناء على ذلك فقد تشكلت منطقة البحث من مربعين بقياس 10×4 م و 5×1 م , حيث تركز البحث على تنظيف وتوثيق المدافن العميقة (shaft graves) فقد تبين أن مدخل هذا المدفن كان بقياس 0.8×1.2 م , وباتجاه شمال شرق وجنوب غرب , هذا النوع من المدافن كان بعمق 2.5 م منحدرًا باتجاه الجنوب الغربي حيث توضع درجتين من الحجر الكلسي مواجهة لحجرة الدفن , وقد بلغ ارتفاع الدرجتين حوالي 80 سم وعند أسفل الدرجتين وجد تشييداً لقطعيتين من اللين , أيضا وجد بداخل الحجرة قطعيتين من الحجر الكلسي الضخم والذي كان مستخدم لإغلاق مدخل حجرة الدفن وخلال تنظيف حجرة الدفن وجد مجموعة من الأوساخ المتناثرة ضمن الحجرة كعلبة دخان وغيرها مما يدل على أن هذا المدفن تعرض للنهب من قبل لصوص الآثار 0

حجرة الدفن كانت ذات شكل بيضاوي بقياس 2.8×2.2 م وارتفاع 1 م , وفي الزاوية الجنوبية الغربية داخل حجرة الدفن تجمع ركام ضخم أحتوى على مجموعة من 14 أنية فخارية بحالة جيدة بالإضافة إلى الكثير من الكسر الفخارية التي تنوعت بين منتجات ذات الجودة العالية ومنتجات بسيطة وعادية , إحدى الأواني الفخارية كانت من منتجات فخار الفرات الغامق (Black Euphrates ware) مما ساعد على تأريخ هذا المدفن الذي يعود إلى عصر البرونز القديم (حوالي 2300 - 2450 قبل الميلاد) ومن الممكن أن يكون قد دفن حوالي 30 شخص بداخل هذا المدفن مما يشير إلى وجود دفن جماعي ضمن هذه النوع من المدافن 0 كما وجد أيضاً بقايا لعظام إنسانية اشتملت على بقايا جمجمة , هذه البقايا لا تزال تحت الدراسة والتحليل 0 بالإضافة إلى كسر لمسمار برونزي وعدد كبير من الخرز العظمي 0

أيضاً تم الكشف عن أربعة حفر عند أسفل الحافة الشرقية من حجرة الدفن بلغ أبعاد كل حفرة 50×90 سم , مما يدل على وجود تابوت خشبي أو مكان مصطبة لمرفقات الدفن 0

لقد قدمت أبحاث هذا الموسم نتائج همة ساهمت في تقديم معلومات أوسع عن طقوس الدفن للمدافن العميقة (shaft graves) في الجزء المنخفض لمنطقة البحث , كما تسمح في تحديد علاقة هذا النوع من المدافن بالمدافن الأخرى 0

حيث قدمت هذه الدراسة دليل واضح وأكيد في تأريخ هذه المدافن إلى عصر البرونز القديم 4 (2300 - 2450 ق.م) 0



صورة لمدخل المدفن مع حجرة الدفن

ARCHAEOLOGICAL RESEARCH IN THE BISHRI REGION — REPORT OF THE TWELFTH WORKING SEASON —

November 21, 2009

Geological and Geographical Field Survey in the Twelfth Working Season

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Introduction

The geological and geographical field survey in this working season was carried out in the period from the 17th to the 21st of November 2009 focusing on petrological description of the stone tools gathered at Tell Ghanem al-Ali excavation site, and collection of pebble samples at the 5 locations near the tell for further analysis in Nagoya University. Plenty of stone tools and fragments were found at Tell Ghanem al-Ali. The most of them seem that they were made of pebbles since their natural surfaces are recognised. The purpose of the study in this working season is to find a clue about the source of these stone tools from geological points of view.

Drs. Bassam Jamous and Michel Al-Maqdissi of the Syrian Directorate General of Antiquities and Museums kindly allowed us to carry out our study in Ar-Raqqa Prefecture. Mr. Ibrahim Khalil of Raqqa Museum helpfully assisted us to carry out the field survey. To whom we would like to express our gratitude.

Geological backgrounds

The rocks around Ghanem al-Ali consist of Neogene sedimentary rocks and Quaternary sediments of various origins. The Neogene sedimentary rocks, the basement of the area, consist of gypsum with fine-grained acidic tuff intercalations.

The Quaternary sediments are mainly made up of well-stratified silts, sands and pebbles overlies the Neogene sedimentary rocks abutting with unconformity. The sediments forming several terraces along the River Euphrates can be divided into the following two types; TD1 composed largely of alternating beds of grey fine to coarse sands and granule to boulder layers, TD2 composed mainly of milky- to yellowish- white silts and sands with minor intercalations of granule to pebble layers. TD1 is generally exposed in lower than TD2.

Table 1: Pebbles of Tell Ghanem al-Ali (from the 5th working season).

diameter	C	P	R	G	FSR	B	MR	Ss	M	Ms	Total	%
> 5 cm	1	2	1		2		1				7	2.2%
3–5 cm	1										1	0.3%
2–3 cm		1	4								5	1.6%
< 2 cm	100	72	37	44	20	6	9	7	2	3	300	95.9%
Total	102	75	42	44	22	6	10	7	2	3	313	100.0%
%	32.6%	24.0%	13.4%	14.1%	7.0%	1.9%	3.2%	2.2%	0.6%	1.0%	100.0%	

Keys: C:chert; P: pegmatite; R: rhyolite; G: granites; FSR: fine silicious rock; B: basalt; MR: metamorphic rocks; Ss: Sandstones; M: marl; Ms: Mudstone. n=313.

Table 2: Pebbles of Zor Shammar (from the 5th working season).

diameter	C	P	R	G	FSR	B	MR	Ss	M	Ms	Total	%
> 5 cm	1	1			2						4	0.6%
3–5 cm	6	10	3	2	12		1		1		35	4.9%
2–3 cm	12	12	16	2	5		4		2		53	7.4%
< 2 cm	123	144	114	76	95	43	13	3	11	3	625	87.2%
Total	142	167	133	80	114	43	18	3	14	3	717	100.0%
%	19.8%	23.3%	18.6%	11.2%	15.9%	6.0%	2.5%	0.4%	2.0%	0.4%	100.0%	

Keys: C:chert; P: pegmatite; R: rhyolite; G: granites; FSR: fine silicious rock; B: basalt; MR: metamorphic rocks; Ss: Sandstones; M: marl; Ms: Mudstone. n=717.

The granules, pebbles and boulders, clast-supported, well sorted, generally include well-rounded flatten clasts of red chert, granites, rhyolite, basalt and fine (microcryptic) siliceous rocks in a matrix of middle grained sands. The deposits are generally well stratified with various kinds of sedimentary structures such as grading, cross-bedding and clast imbrications. East-going paleo-current is supposed by the sedimentary structures.

Quaternary sediments sampled at the Fifth working season were analysed and the results are shown in Tables 1 and 2.

Petrological description of the stone tools

444 samples for petrological description were selected from the stone tools, that are already collected at the excavation site of Tell Ghanem al-Ali in the past working seasons (Figs. 2–4). In addition, 361 stone tools and/or fragments were newly collected at the Tell Ghanem al-Ali setting the sampling locality shown in Figure 5. 121 stone tools/fragments were also collected all around the tell. All of the samples were petrologically described during the period of this working season.

As for the lithic materials from the excavation sites, there are plenty of stone tools which have natural surfaces of pebbles as shown in Figure 2. They consist of various rocks such as fine silicious rock, coarse rhyolite (Fig. 3), quartzite, basalt, sandstone, chert, etc. Most of them are fine silicious rocks (known as the archeological term “flint”) and some of them contain fossils (Fig. 4). Most of the stone tools from the excavation sites are larger than 30 mm in diameter. The results of the petrological description are summarised in Table 3, 4 and 5. FSR Index is calculated by the equation of “FSR index = non-FSR / FSR” where FSR: the number of fine silicious rocks, non-FSR: the number

Table 3: Rock differences of the stone tools at Tell Ghanem al-Ali excavation site.

diameter	FSR NS	FSR NNS	FSR NS, f	FSR NNS, f	CR NS	Q NS	C NS	B NS	Ss NS	Total	%
> 5 cm	197	4	4	0	3	1	0	4	0	213	48.0%
3–5 cm	158	7	3	0	2	1	2	0	1	174	39.2%
2–3 cm	30	5	1	1	0	0	0	0	0	37	8.3%
< 2 cm	16	4	0	0	0	0	0	0	0	20	4.5%
Total	401	20	8	1	5	2	2	4	1	444	100.0%
%	90.3%	4.5%	1.8%	0.2%	1.1%	0.5%	0.5%	0.9%	0.2%	100.0%	

Keys: FSR: fine silicious rock ; CR: coarse rhyolite; Q: quartzite; C: chert; B: basalt; Ss: Sandstones; NS: natural surface; NNS: no natural surface; f: fossil. n=444. FSR index (non-FSR/FSR) = 0.0326.

Table 4: Rock differences of the stone tools at the sampling locality in Tell Ghanem al-Ali.

diameter	FSR <i>NS</i>	FSR <i>NNS</i>	FSR <i>NS, f</i>	CR <i>NS</i>	CR <i>NNS</i>	Q <i>NS</i>	C <i>NS</i>	B <i>NS</i>	Ss <i>NS</i>	Ms <i>NS</i>	Ms <i>NNS</i>	Total	%
> 5 cm	25	0	2	0	0	1	0	0	0			28	7.8%
3–5 cm	145	21	17	10	2	2	3	1	3	1		205	56.8%
2–3 cm	57	42	1	2	1	0	1	0	0			104	28.8%
< 2 cm	6	13	2	2	0	0	0	0	0		1	24	6.7%
Total	233	76	22	14	3	3	4	1	3	1	1	361	100.0%
%	64.5%	21.1%	6.1%	3.9%	0.8%	0.8%	1.1%	0.3%	0.8%	0.3%	0.3%	100.0%	

Keys: FSR: fine silicious rock ; CR: coarse rhyolite; Q: quartzite; C: chert; B: basalt; Ss: Sandstones; Ms: Mudstones; NS: natural surface; NNS: no natural surface; f: fossil. n=361. FSR index (non-FSR/FSR) = 0.0464.

Table 5: Rock differences of the stone tools at the surface of Tell Ghanem al-Ali.

diameter	FSR <i>NS</i>	FSR <i>NNS</i>	FSR <i>NS, f</i>	FSR <i>NNS, f</i>	CR <i>NS</i>	Q <i>NS</i>	C <i>NS</i>	B <i>NS</i>	Ss <i>NS</i>	Total	%
> 5 cm	41	0	0	0	1	1	0	0	0	43	35.5%
3–5 cm	38	8	1	1	1	1	0	1	0	51	42.2%
2–3 cm	11	10	2	1	0	1	1	0	0	26	21.5%
< 2 cm	0	0	0	0	0	0	0	0	1	1	0.8%
Total	90	18	3	2	2	3	1	1	1	121	100.0%
%	74.4%	14.9%	2.5%	1.7%	1.7%	2.5%	0.8%	0.8%	0.8%	100.0%	

Keys: FSR: fine silicious rock ; CR: coarse rhyolite; Q: quartzite; C: chert; B: basalt; Ss: Sandstones; NS: natural surface; NNS: no natural surface; f: fossil. n=121. FSR index (non-FSR/FSR) = 0.0708.

of the other rocks than fine silicious rocks of all the stone tool/fragment samples obtained. Smaller value of FSR index implies the inclination to FSR selection. Although the diameter ranges are quite different, the low percentage of fine silicious rocks in the gravel beds shown in Tables 1 and 2 implies the selectivity of fine silicious rocks for stone tools. Petrological composition of the pebbles in stone-tool-size range is then preferable.

Pebble sampling

Large pebbles, that are well rounded and sized roughly over 30 mm, were sampled at 5 locations as shown in Figure 9. Samples collected at the sites A–D are the pebbles of Quaternary sediments and the samples at the site E are the floodplain deposits of the River Euphrates. Photographs taken at these sampling locations are shown in Figures 10–14. Further studies such as petrological description for sampled pebbles are prepared.

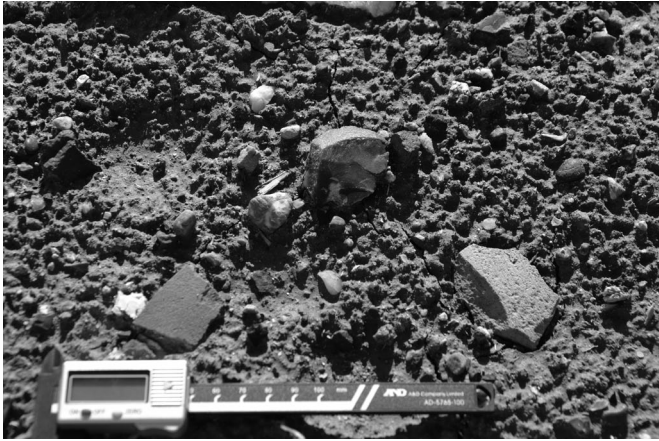


Fig. 1: Picture of stone tools/fragments found at Tell Ghanem al-Ali.



Fig. 2: Stone tools collected at the Tell Ghanem al-Ali excavation sites. They have natural surfaces of pebbles.

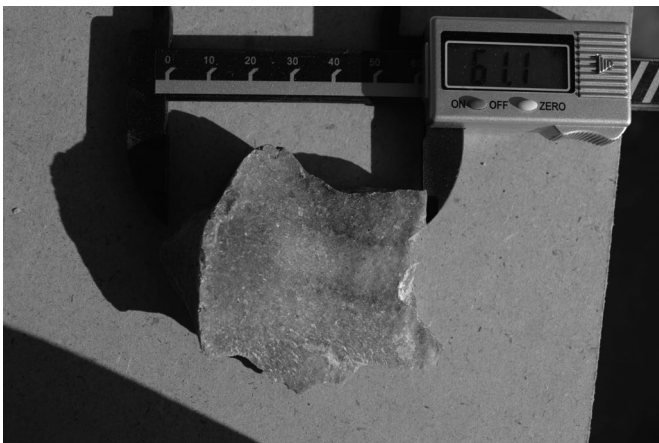


Fig. 3: Course rhyolite stone tool collected at the Tell Ghanem al-Ali excavation site.

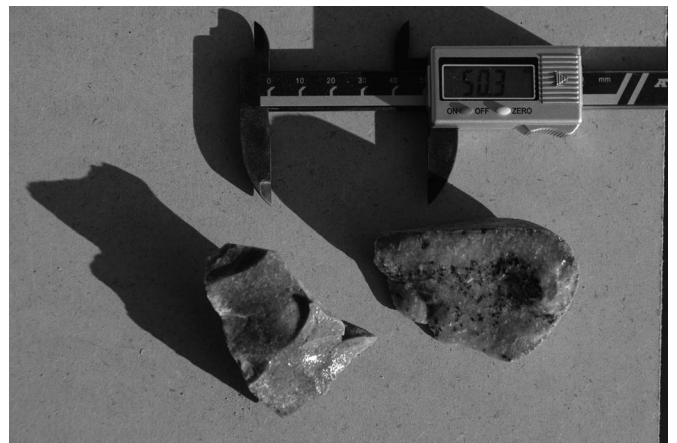


Fig. 4: Fine silicious rocks ("flint") stone tool collected at the Tell Ghanem al-Ali excavation sites. These rocks contain fossils.

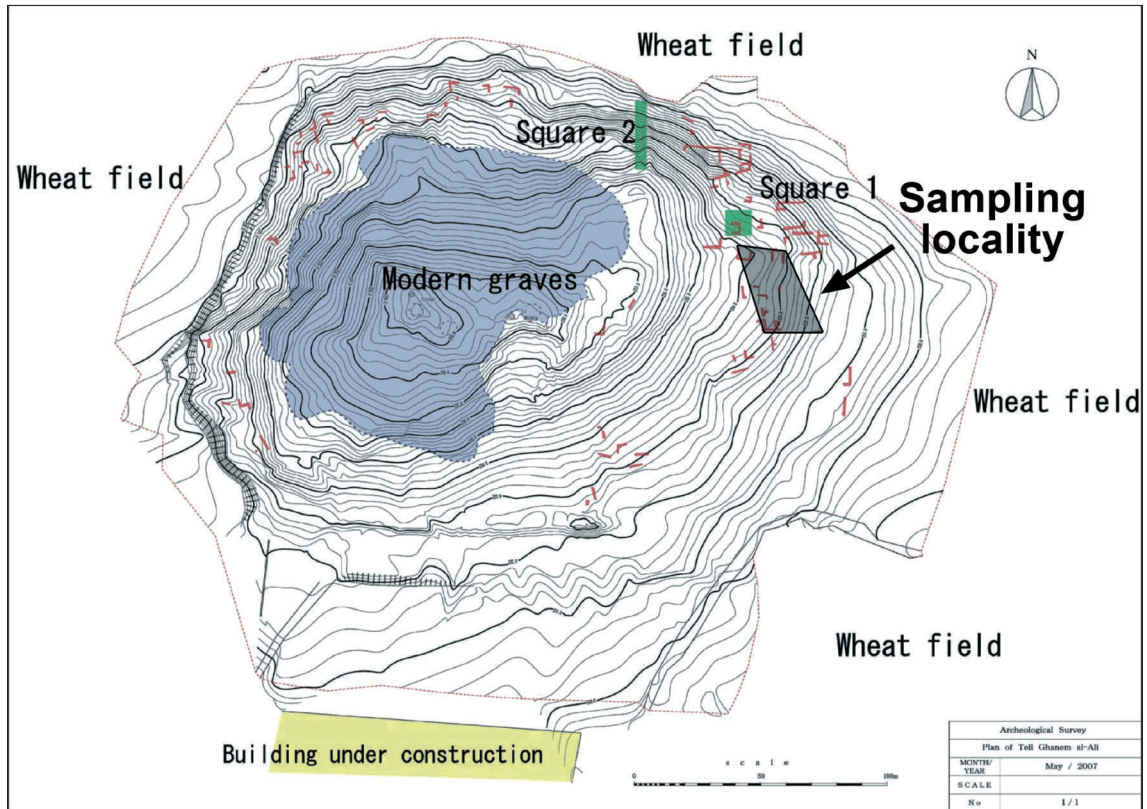


Fig. 5: Map showing the sampling locality at the Tell Ghanem al-Ali.

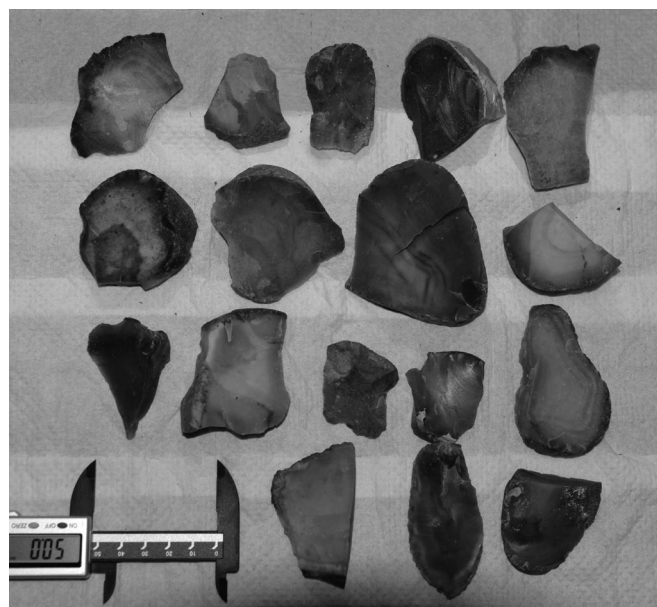


Fig. 6: Variation of fine silicious rocks used for stone tools. Stone tools were collected at the Tell Ghanem al-Ali.



Fig. 7: Chert stone tool collected at the Tell Ghanem al-Ali sampling localities.



Fig. 8: Fine silicious rock stone tool collected at the Tell Ghanem al-Ali sampling localities. Fossils of bivalve shells can be seen.

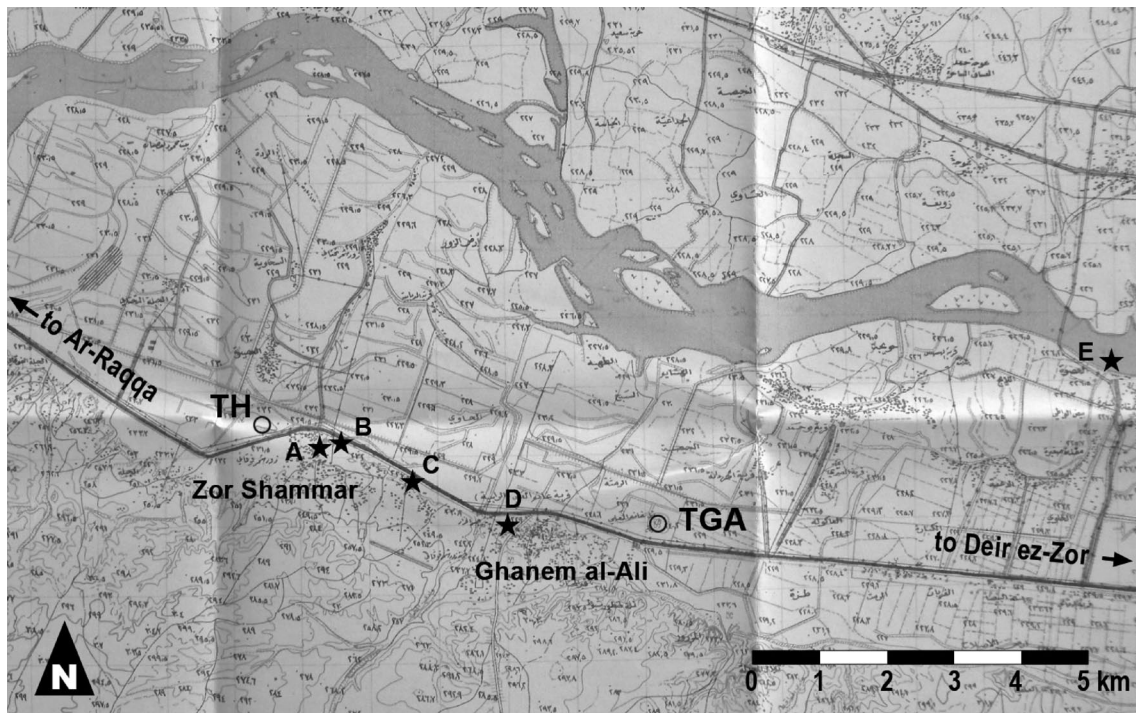


Fig. 9: Map showing the 5 locations of pebble sampling. TH: Tell Hamadeen; TGA: Tell Ghanem al-Ali.

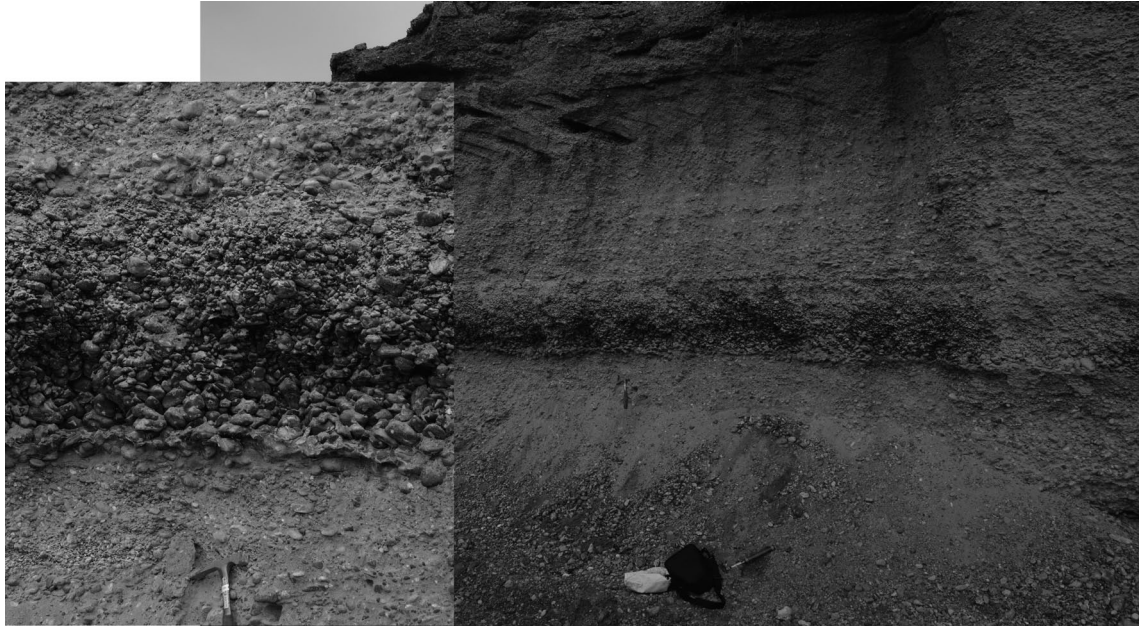


Fig. 10: Photograph of Site A. Left is the close up of the gravel bed.



Fig. 11: Photograph of Site B.



Fig. 12: Photograph of Site C.

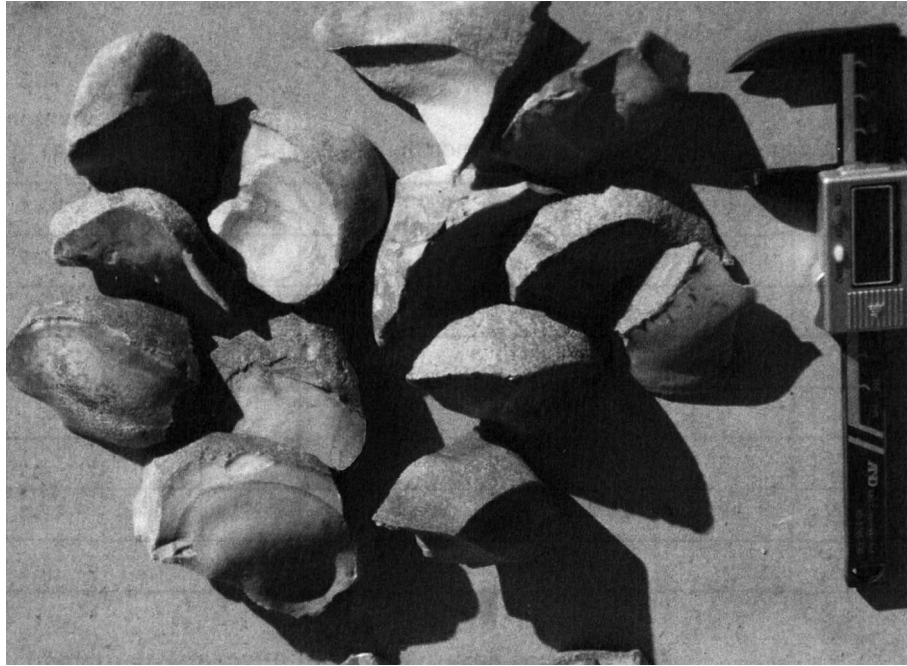
الموسم الثاني عشر من أعمال البعثة الأثرية السورية اليابانية المشتركة في منطقة البشري

أربعة أيام فقط لإعمال الموسم الثاني عشر للبعثة الأثرية السورية اليابانية والتي امتدت في الفترة الواقعة من 17 ولغاية 21 تشرين الثاني من عام 2009 حيث اقتصرت أعمال هذه البعثة لهذا الموسم على فريق جيولوجي واحد تركز عمله في المنطقة المجاورة لتل غانم العلي 0

مسح جيولوجي وجغرافي للمنطقة المحيطة بتل غانم العلي :

(كازوهيرو تسو كادا , جامعة ناغويا 0يوسوكي كاتسورادا , جامعة ناغويا)

وتهدف أعمال هذا الموسم إلى دراسة ووصف الأدوات الحجرية التي تم جمعها من تل غانم العلي , وأيضاً جمع عينات حصوية من المنطقة رقم 5 المجاورة لتل غانم العلي , من أجل تحليلها ودراستها في جامعة ناغويا , وتهدف هذه الدراسة بشكل عام إلى الكشف والتعرف على مصدر هذه الأدوات الحجرية من وجهة نظر جيولوجية 0



و تتألف الأحجار الصخرية حول تل غانم العلي من صخور رسوبية وترسبات رباعية من مصادر متنوعة , إذ تتألف الطبقات السفلية في هذه المنطقة من تكوينات من الجبس والحمض 0 تتكون هذه الترسبات الرباعية من طبقات طينية تحتوي على الرمل والحصى , حيث دلت هذه الترسبات على وجود مصاطب عديدة لنهر الفرات يمكن تقسيمها إلى قسمين مختلفين 0

فقد تم اختيار 444 عينة من الأدوات الحجرية من حفريات موقع تل غانم العلي بهدف دراستها ووصفها , بالإضافة إلى 361 عينة من الأدوات الحجرية كان قد تم جمعهم من مواسم سابقة من تل غانم العلي 0

تم أخذ نماذج من هذه العينات الحجرية إلى اليابان بهدف تحليلها ضمن مخابر جامعة ناغويا , حيث لا تزال حالياً قيد الدراسة 0

إذا اقتصر أعمال هذا الموسم على دراسة الأدوات الحجرية من تل غانم العلي والمنطقة المحيطة فيه من وجهة نظر جيولوجية بهدف التعرف على طبيعة تكوين هذه الأحجار ومصدرها ومنشأها 0

ARCHAEOLOGICAL RESEARCH IN THE BISHRI REGION
— REPORT OF THE THIRTEENTH WORKING SEASON —

Katsuhiko OHNUMA

Director of the Japanese Archaeological Mission to Bishri
 (Kokushikan University, Tokyo, JAPAN)

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Director of the Syrian Archaeological Mission to Bishri
 (Department of Antiquities and Museums, Raqqa, SYRIA)

December 27, 2009

The 13th working season of the Syria-Japan Archaeological Joint Mission to the Bishri Region is now in progress under the plan of survey with a duration from December 24 to December 30, 2009. The members of the joint mission from the Syrian and Japanese parties are as follows.

Syrian party: Mohamad Sarhan (Director).

Japanese party: Yasuyoshi Okada (Director), Saeko Miyashita, Naoko Fukami, Ryuichi Yoshitake and Sumiyo Tsujimura.

Before describing our activities, we would like to express our sincerest thanks to Dr. Bassam Jamous, the Director General of the Syrian Directorate General of Antiquities and Museums, and Dr. Michel Al-Maqdissi, the Syrian Supervising Adviser for this joint mission and the Director of Archaeological Excavations and Research at the Syrian Directorate General of Antiquities and Museums, who made available their generous help and heart-warming cooperation. Our sincerest thanks also go to local staff at Raqqa Museum.

In this working season, the plan of our survey includes firstly the monitoring of the current condition of the site of Tell Ghanem al-‘Ali, and then the architectural investigations into the surrounding area. Particularly our major concern is about the construction of the ruins of Heraqlah, located in the western outskirt area of Raqqa, from the viewpoint of architectural comparison to our Bishri region.

Monitoring survey of the site of Tell Ghanem al-‘Ali and the architectural investigations into the surrounding area

Yasuyoshi OKADA (Professor, Kokushikan University, Tokyo)

Outline of the season’s work

The itinerary of the mission started at Damascus on December 24. On the way to Raqqa, we paid a visit first to the region of Palmyra, including an ancient dam site at Harbaqa and early Islamic fortifications of Qasr al-Heir al-Sharqi, both of which must be a proud of this country as great testimonies of ancient construction technology though not in the Bronze age. On December 26, we entered the Bishri mountain area, and then reached the site of Tell Ghanem al-‘Ali.

On December 27, according to our itinerary plan, we will undertake a preliminary architectural investigation at the site of Helaqra, of which the design and construction with mortared rubble is of our great interest not only in the excellent technology but in its mysterious character. On the same day, we are to move to the region of Aleppo and Hama. Further on December 29, we hope

to learn mud-brick masonry technique thoroughly at the site of Mishrifeh, ancient Qatna, representing the Early Bronze Age culture of Syria, parallel in the age with Tell Ghanem al-‘Ali..

Monitoring the current condition Tell Ghanem al-‘Ali

On December 26, following a visit to Qasr al-Heir al-Sharqi, we could reach Tell Ghanem al-‘Ali in the early afternoon and immediately undertook the detailed observation of excavated trenches and surrounding surface conditions. What should be noted are as follows:

- 1) Structural remains excavated in Trenches 1 and 2 so far seem to be gradually damaged under the open air condition (Fig. 1). The deep-sounding spot at the northern end of Trench 2 is well preserved, but is seemingly of danger for temporary visitors (Fig. 2).
- 2) The trench of the latest excavation on the northern slope is totally covered with a fabric sheet, and therefore appear to be preserved very well (Fig. 3).
- 3) On the surface of the tell, particularly eastern and western slopes, a lot of vestigial wall lines have appeared presumably thanks to the rainfall on the day before (Figs. 4 and 5).
- 4) In general, the tell is well maintained for preparation of further archaeological investigations including the work of our local guard.



Fig. 1 Trench 1



Fig. 2 Trench 2



Fig. 3 The latest opened trench



Fig. 4 Vestigial walls on the eastern slope



Fig. 5 Vestigial walls on the western slope

الموسم الثالث عشر من أعمال البعثة الأثرية السورية اليابانية المشتركة في منطقة البشري

فقد اقتصرت أعمال هذا الموسم على التحضير لأعمال النشر لهذا البحث من خلال تقديم كل فريق من أعضاء البعثة تقرير عن نتائج الأبحاث والدراسات التي تمت في المنطقة خلال المواسم السابقة 0

حيث كان هناك تعاون مشترك مع المديرية العامة للآثار والمتاحف في أعمال الترجمة والنشر للغة العربية في مجلة الرافين 0

الشكر الجزيل لكل من ساهم في إنجاح كل المواسم السابقة من أعمال البعثة السورية اليابانية المشتركة في منطقة البشري وعلى رأسهم الدكتور بسام جاموس المدير العام للآثار والمتاحف والدكتور ميشيل مقدسي مدير التنقيب والبحث العلمي في المديرية العامة للآثار والمتاحف والمشرف المستشار لهذا البحث العلمي لما قدموه من دعم مساندة لعمل البعثة 0

احمد سلطان

مدير الجانب السوري

كاتسوهيكو اونوما

مدير الجانب الياباني