

## **Studying, Introducing and Comparing Seals from Settlement Areas and Cemeteries of the Iron Age I-II in Northern Region of Central Iranian Plateau**

**A.S. Mucheshi<sup>1</sup>, H. Tala'i<sup>2</sup>**

Received: 2011/10/8

Accepted: 2012/4/14

### **Abstract**

This paper focuses on studying, introducing and comparing seals from the settlement areas and cemeteries in the North of Central Plateau of Iran. These seals were discovered in the previous and present excavations and surveys over the region. Based on the obtained results, the ratio of similarity and difference between the two groups of seals (from the settlement areas and the cemeteries) is quite proportionate to that of the potteries found in the mentioned region (again in the settlement areas and the cemeteries). The differences are not so significant to that ignore the traits they have in common. To put it simply, the specific signs and traits could be generally introduced as the seal making style of the Iron Age.

**Keywords:** Seal; Iron Age; Settlement Areas; Cemeteries; Central Iranian Plateau.

---

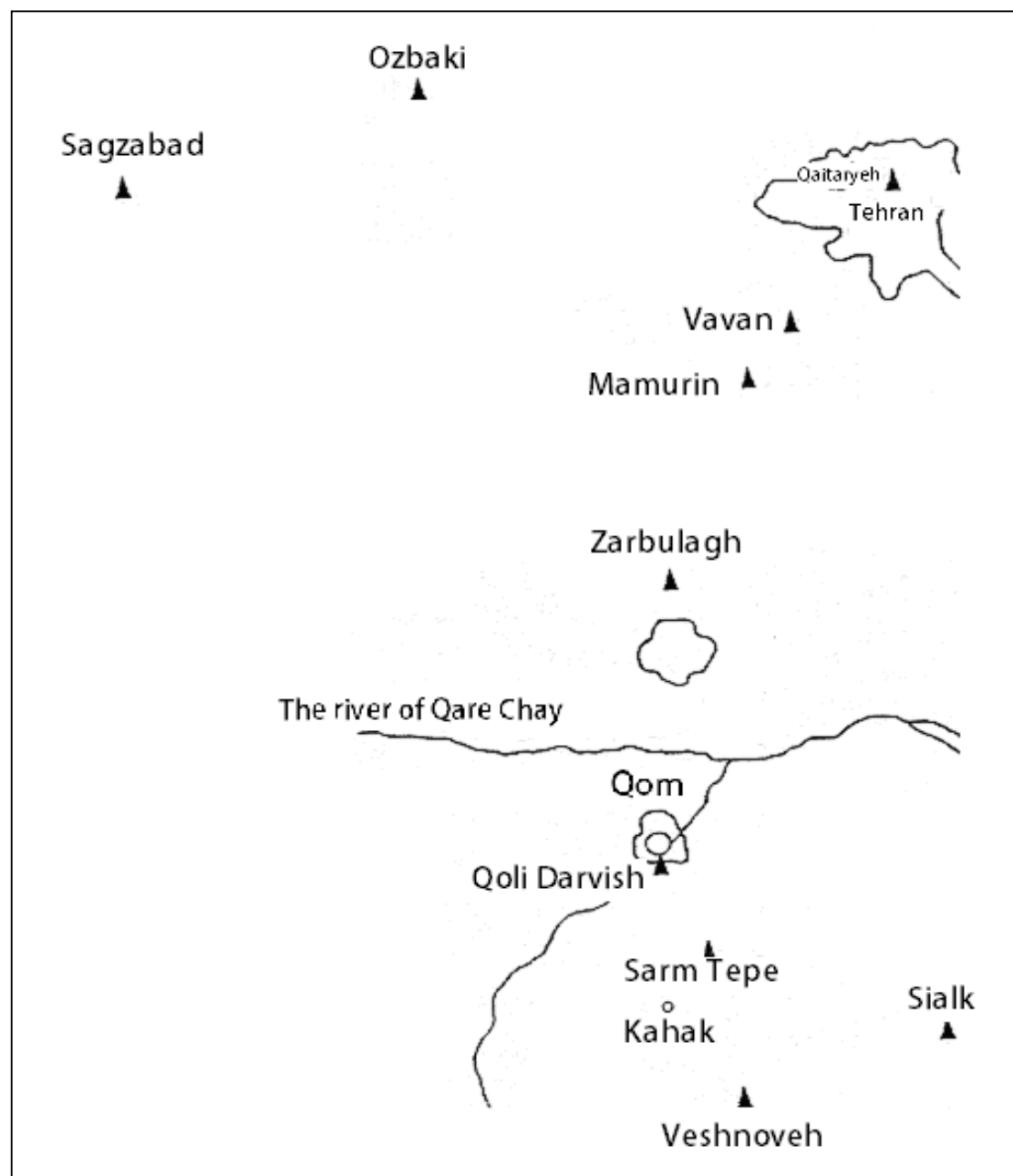
1. PhD Student, Department of University Archaeology Tehran, , saedmucheshi@ut.ac.ir

2. Associate Professor, Department of Archaeology, University of Tehran, htalae@ut.ac.ir

## **Introduction**

During the Iron Age, in the North of the Central Plateau of Iran, due to the lack of substantial settlements, the number of seals and their impressions is too low and nugatory. The same thing is seen in the cemeteries as well; in fact, no seal has been reported from the massive conducted excavations over the region. The scarcity of seals in the Iron Age of Iran, is not restricted to the northern parts of the Central Plateau; this is seen in other places, such as Luristan, as well (Overlaet, 2003: 221). Vanden Berghe has mentioned only a few seals found at Khurvin in his report. Based on this, there are only three seals of this kind in Iran Bastan Museum (National Museum of Iran). In the book "Sialk" – volume II – 28 seals have been discovered from the excavations in Sialk A and B, two of which have been associated with Sialk A and the other 26 with Sialk B by Ghrishman. In the excavations at the cemetery of Tepe Sarm, which was carried out by Pour Bakhshandeh up to 2003, 8 seals were unearthed which are going to be discussed in the present paper. In addition to the mentioned cemeteries, there are some settlement areas where some seals were found. Sagzabad is one of those settlement areas from which the Iron Age seals have been discovered during excavations

managed by Tala'i. Besides Sagzabad, a few seals have been unearthed from Tepe Ma'murin; however, only two of these seals could be studied as information concerning them was published. Moreover, there are some seals in Iran Bastan Museum, registered under the title of "The culture of Qazvin" which was highly likely to be found from Sagzabad. These seals are among the purchased ones, and their dating has not been done very carefully. While defining boundaries for Tepe Golestan in 2006, they discovered one clay seal impression dating back to the Iron Age. As well as seals from these sites, one cylinder seal - belonging to the Iron Age - has been found in Tepe Qoli Darvish located in Qom province and one seal impression from the recent surveys in Sialk. The comparison between seals (Figs. 2, 3 and 4) from the settlement areas and those from the cemeteries could indicate the differences in their contexts. The first part of this paper introduces the seals of the northern parts of the Central Plateau. Next, the seal designs and comparisons between them are presented. The final part of this paper deals with conclusions drawn from our research. The location of all the considered sites is shown in Fig. 1.



**Fig 1** Map of the Sites



Pl. 5



Pl. 10



Pl. 6



Pl. 11



Pl. 7



Pl. 12



Pl. 8



Pl. 13



Pl. 9



Pl. 14



Pl. 15

**Fig 2** Seals from Central Iranian Plateau



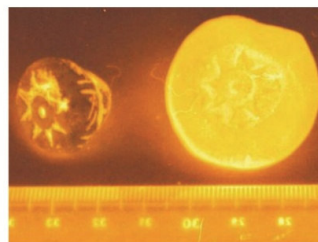
Pl. 16



Pl. 21



Pl. 17



Pl. 22



Pl. 18



Pl. 23



Pl. 19



Pl. 24



Pl. 20



Pl. 25



Pl. 26

**Fig 3** Seals from Central Iranian Plateau



Pl. 27



Pl. 28



Pl. 29

Fig 4 Seals from Central Iranian Plateau

### Cemeteries

**Khurvin:** This site is located in Bozghan region, on the left bank of the Karaj River (Kambakhsh Fard, 1991: 24). In May 1950, Mohammad Rad and Ali Hakemi were assigned to excavate Khurvin – in the northern parts of the Karaj River, Qazvin plain – over a period of 9 days. Mr. Isa Behnam conducted some excavations at the same place (Khurvin) during November

26<sup>th</sup> to December 5<sup>th</sup> 1954. Khurvin is a cemetery and the graves have been dug into the ground in the form of oval holes (oval shafts) (Vanden Berghe, 1959: 122). Vanden Berghe has dispensed with only one statement regarding these seals (of Khurvin): “Cylinder seals were so rare in this site”. These seals are now being kept in Iran Bastan Museum.

**Tepe Sarm:** The cemetery of Sarm is located on the Qom-Kashan road, 10 km east of Kahak Township and 16 km southeast of Qom. This mound (Tepe) is between the two villages, Khor Abad and Sarm, 50m far from the left side of the road (Pour Bakhshandeh, 2002: 5). Pour Bakhshandeh carried out some excavations during several seasons from 2000 to 2003 at Sarm. Based on the relative chronology of the potteries, it is to say that this site belongs to the late Iron Age I and II (1200 – 900 B.C.) (Bahrani Pour, 2006). Among the funerary objects in the Iron Age cemetery of Sarm were several cylinder seals tied round the corpses’ necks.

Pour Bakhshandeh presents us with the following brief explanation: During the second season of excavation, in operation N7.207-3, one cylinder seal with geometric design and in operation M6.218 another

seal – 3cm long and 0.9cm thick with human design – were discovered. In the third season, besides teapots with spreading mouth, one cylinder seal was found which were 3.5cm long and 0.9cm thick as well as another seal with 3cm length that was lying next to two bronze pins at the time of being found. The seals were made of gypsum, greenish white in color and had engravings on them. The second seal with a geometric design in the form of zigzag and a spindle-like (conical) seal with the same geometric figures were both discovered from the same place one by another. It appears that most of these seals are made of faience. The seals of Sarm are viewed as distinctive and special artifacts in the excavation. Two broken pieces of two other seals with geometric designs were also among those discovered (Pour Bakhshandeh 2003: 68 and 69).

**Tepe Sialk:** Ghirshman excavated Tepe Sialk in Kashan, located on the eastern side of Gorgis (Karkas) Mount, as an authorized official from the Louvre Museum during the 1933-1937 period (Vanden Berghe, 1959). He has briefly explained about the designs of seals unearthed from the cemetery B.

**Tepe Qabrestan:** Tepe Qabrestan is situated

6km north of Sagzabad Village, 60km south of Qazvin and 140km west of Tehran. The excavations at this site began in 1970 by Negahban (1973). The mentioned excavations were firstly designated for the archaeology students at University of Tehran as a training course, thus many excavations were carried out there (Majidzadeh, 1999: 80). The remnants of this site all date back to the 4<sup>th</sup> and 5<sup>th</sup> millennium BC. In the excavations led by Fazeli in 2006, 6 Iron Age graves were discovered (Fazeli Nashli and Naghshineh, 2006: 129). A lot of seals were found from these 6 graves. The excavators believe that some of the beads are more probable to be seals rather than beads since they are very similar to the seals (especially the cockroach-like ones). All the same, these seals will not be discussed owing to the fact it is uncertain whether or not they are seals.

#### Settlement Areas

**Tepe Sagzabad:** The village of Sagzabad is located 60 km south of Qazvin, northwest of Tehran and south of the plain of Qazvin (Tala'i, 1983: 54). Sagzabad is locally known as Ghara Tepe (Negahban, 1973: 8). During Tala'i's excavations, some seals were discovered. There are 13 purchased

and smuggled seals in the National Museum in a collection named “The seals of Khurvin and the culture of Qazvin” (Figs. 23-25). Because of the immense similarity between these seals and the ones discovered by Tala’i and Malek Shahmirzadi as well as the eminence of Sagzabad Tepe and the lack of parallel contemporaneous sites, these Museum seals are categorized in the Sagzabad seals group. Dating these seals mistakenly to the 2<sup>nd</sup> millennium and also dating the seals of Khurvin to the 3<sup>rd</sup> millennium denote the careless studies on these seals.

**Tepe Sofali of Ma’murin:** This site was discovered near Tehran while constructing the road to Imam Khomeyni International Airport (Mehrkian, 1997: 143). The name of this site comes from Ma’murin Village (which was flattened for building the Airport in 1991). This site is a settlement area and is composed of three mounds, in the north, south and east encompassing an area of 12 hectares and the height of more than 4 meters (Mehrkian, 1995: 74). Seals and seal impressions are those noticeably important archaeological finds among all the artifacts found during the systematic excavation seasons at Ma’murin (Mehrkian, 2003: 115). One cylinder seal and a clay

seal impression are introduced from this site (figures 26-27).

**Tepe Qoli Davish:** Tepe Qoli Darvish is located at 34.38 E latitude and 53.50 N longitudes, with an elevation of 935 meters ASL. This site is in the surrounding western parts of Qom; it is actually placed adjacent to the old road of Qom-Kashan, in the eastern part of Baghiatollah square at the start of the newly built highway from Qom to Jamkaran. The extension of defined boundaries of this site was about 50 hectares before the destruction; at that time, its height on the eastern part was 20 meters and 10 meters on the western part. Four seasons of excavations were performed at this site up to 2007 (Sarлак, 2007: 190). Two cylinder seals, one whole and one broken, have been discovered from the context of Iron Age I, dating back to 1430 BC (based on the c14 dating) as noted by Sarлак (Figs. 27-29).

**Tepe Sialk:** one sealed potsherd was found from this site when the project of revising and organization was being undertaken in Tepe Sialk in 2002 (Chegini, 2002: 171).

#### **An Explanation of Seals Discovered from Cemeteries Seals of Tepe Sialk**

Since the designs of these seals have been written about in many published issues of



diverse magazines and books (such as Ghirshman's book) anymore explanations concerning the figures and designs seem unnecessary. Ghirshman has classified them into three groups: those with designs of people, with the designs of animals and those with geometric figures (Ghirshman, 1939: 62). Two cylinder seals made of black stone and hematite were unearthed from Sialk A. They depict figures of standing people. These designs are as simple as those on the other seals from this area. From Sialk B, 26 seals – 4 stamp seals and 22 cylinder ones – were discovered. The stamp seals show various designs on them; 2 of them have the design of animals, one of them a monster and the other a geometric figure. The scenes reported on the cylinder seals include feasting (2 seals), animal fight (5 seals), hunting (1 seal), animal farm (1 seal), hunting on a chariot (1 seal), the battle between riders and dragon (1 seal), grazing animals (2 seals), caravan of camels (1 seal), palm trees and monkey (1 seal), geometric figures (2 seals) and a broken cylinder seal with a figure of an animal. The length of most of the seals is about 2-3cm and the highest and lowest ratios are 40mm and 11mm, respectively. The diameter of most of them is 7-11mm.

Ghirshman subscribes to the view that the designs on the seals of Sialk had been more or less influenced by Kassite art, the style of the middle Assyrian art and that of Karkuk. He also suggests that the influence of Neo-Assyrian art, the art style of northern lands in Caucasia, and Phoenician art had greater influence on Achaemenid art and architecture to which the art of Sialk is a sort of prologue (Ghirshman 1939). The designs of seals in Sialk are comparable to those at Hasanlu and Sorkh Dom Lori (Maras, 2005: 143). Here we are briefly studying and comparing the seals of Sialk.

On two seals from Sialk (Ghirshman, 1939: PL. XCVI, S.1795 and S.1571) and the scene of feasting (the figure of a dignitary sitting on a chair opposite a servant) are also observed on some seals from Haft Tepe (Negahban, 1993), such as designs 69, 71, 74, 79, 82, 84 (Amiet, 1999: Figs.1, 2, 3 and 6) as well as on some Neo Assyria seal designs (Buchanan 1966: plate 39, n 592). Such designs date back to ancient times and could be seen on many seals much older than Susa (Malekzadeh Bayani 1996: Fig. 118).

Ghirshman offers the title "animal fight" for five of the Sialk seals (Ghirshman, 1939: PL. XCVII, S.1574, PL. XCVI,

S.1301, and S.737). Vanden Berghe associates the mentioned design with quivers from the 8<sup>th</sup> and 7<sup>th</sup> centuries (1959). In this scene, most of the beasts are standing on their two legs. On seal no.1301, a curved arc has been incised; the mentioned kind of arc is illustrated between two gods or kings on a Neo Assyrian seal (Frankfort, 1969: Fig.119).

On seal PL. XCVI, S.1386 (Ghirshman, 1939), the design of the “hunting on a chariot” has been displayed. The first sample of such a design was found from Warka on a piece which dated back to early Babel. The wheeled chariot, shown on the above mentioned piece, is bound to a pony (Littauer, 1971: 24). The figure of the chariot with a horse, designed using very simple and fine lines, has been spotted among the seals from the temple of Ninurta in Nimrud (Parker 1962: Fig.5380). The oldest figure of the chariot riding in Iran can be seen on a seal from Hesar III (Schmidt, 1937: H892).

Ghirshman has classified 5 seals into a category named seals with the figure of animal fight (Ghirshman1939: PL. XCVII, S. 1574, XCVI, S. 1301, S. 737, PL. S. 1712 and S. 1572). This type of design bears a lot of resemblance with that of

Lurestan Style (1969-1970 p: 33, Vanden Bergh 1345/1966/1967 Fig.9). Vanden Berghe believes this mentioned figure, which has been engraved on a quiver, belongs to the 7<sup>th</sup> and 8<sup>th</sup> centuries. In these designs most animals are standing on their hind legs. On the seal no. 1301, an arc has been designed; on another case of seal from Neo- Assyria the figure of an arc has been displayed between two gods or kings (Frankfort 1969: fig. 119).

On seal PL. XCVI, S. 1386 is the scene of hunting using a cart in a very simple style. One of the earliest samples of wheeled carts was discovered on a sample from Warka, dating back to early Babel. Littauer suggests this cart is bound to a pony (Littauer, 1971: 24). The design of a cart/chariot drawn by a horse, formed using simple lines, was observed on some seals found in The Temple of Ninurta in Nimrud (Parker 1962: Fig. 5380). The oldest cart rider figure can be seen among the seals of Hesar III (Schmidt, 1937: H892).

One of the famous seals of Sialk is the figure of a rider (Ghirshman, 1939: PL. XCVI, S.810). Ghirshman has introduced this scene as “the battle between riders and dragon”. The scene of an archer targeting

an ibex has been seen on two cases of seals; one from the temple of Sorkh Dom Lori and the other from the Iron Age of Chogha Sabz (Vanloon, 1989: 1 and 2). Also, an analogous cloth is observed on another rider's body in the Acropolis of Susa. This seal has an inscription in the name of Kitada (Amiet, 1973: PL.4). Porada, considering the sameness between this seal and the other one from Susa kept at the Louvre Museum (Louvre s.555), regards it as an artifact from Sargon II reign (Porada, 1948: Fig.812).

### Seals of Sarm Tepe

Figure 5- Design of birds: on this seal, some birds are moving to the left. The frame of the scene is a triangle and the birds' feet are tied to each other if we pay attention to the bottom of the design. Wide open wings for birds could be seen on the seals of places beyond the Iranian Plateau boundaries. On a seal, discovered from Nimrud, such signs exist on standing beasts. This seal becomes thicker at the end part as well. The gripping point that Parker points out is that these seals have been imported from Loristan (Parker, 1962: Fig.5373). For instance, design 5379 shows feathers clearly and this seems to signify

wings.

Figure 6- The design of birds: there are two ostriches on this seal with two pine trees between them. Depicting ostriches on seals had a sudden boost in the neighboring countries like Anatolia, Neo Assyrian Mesopotamia and Urartu. This figure has also been seen on some seals found from Nipur (Parker 1962: Fig.1) and Musasir (Collon, 1990: pl. 4.1.1 and 4.1.3). The figure of ostrich exists on several seals from the collection of Ex-Colville, one from Paris (Bibliothèque Nationale), London (British Museum), 2 seals from the collection of Hardi, and some other stamp seals. The majority of these seals belong to Neo Assyrian and Neo Babylonian period (Collon, 1998). What makes this seal important is the figure of ostrich with Mesopotamian origins. On the account of the fact that ostrich often inhabits the deserts of Africa this figure might have come from Egypt. One of the seals designs shows a person running after an ostrich. The person in this scene is wearing Assyrian clothes, but generally, this seal resembles our discussed seal (Motarjem, 1996: 60).

Figure 7- The design of birds: the remaining lines on this seal could reflect the

feet of birds standing in a row, one after another. Such figure of feet is also seen on a better preserved analogue in Fig.320 from Haft Tepe (Negahban, 1993). A seal with the design of an ostrich was also discovered in cemetery B of Sialk (Ghirshman, 1939: PL. XCVI, S.1312).

Figure 8- Geometric designs: these are simple geometric figures. These figures are multiplication. A similar seal design was found in Hasanlu (Marcus, 1989 Fig.13).

Figure 9- Geometric designs: oblique lines have been placed above each other neatly separated. It may represent the form of a piece of cloth or some fabrics. The design is very much like that of the seals in the 13<sup>th</sup> group of seals in Chogha Zanbil. The seals in this group are cylinder and made out of faience. They are very fragile as well. The most important group is the one introduced as the oblique figures by Porada (1970). They are made of soft breakable material. Cylinder seals with oblique hatches could be categorized in a variety of ways. The most significant seal of this category contains a piece which is 40mm long and about 10mm thick (Porada, 1970: Figs.128-132).

Figure 10- Geometric designs. It is similar to the previous design.

Figure 11- Geometric designs: its design incorporates oblique lines, lozenge and a circle inside another one. Unfortunately, we only have one piece of this seal as it is broken. The circular figures on this seal are similar to those on Elamite seals with sacred scenes. On one of these seals, which are among the second group of seals (cylinder glass seals with the style of Elam), two concentric circles have been designed between two fish (Porada, 1970: Seal 16). A design, parallel to designs on the other seals of this group, has been used (Ibid: seals 17 and 19). Porada believes that such circles are Elamite art and contain architectural elements; in fact, they embody the head of Elamite slipped clay nails many of which have been discovered in Chogha Zanbil (Porada 1970: 33). The oblique figures on this seal resemble the designs 128-132 from Chogha Zanbil, namely seals no.16, 17, 19, 26, 40, 42 and 91. In figure no.24 of Chogha Zanbil there are sun beam-like lines around a circle which makes us more convinced of regarding it as the sun. Moreover, there is the figure of two circles together with anthropomorphic and zoomorphic figures on a seal found at grave no.97 in Tepe Gian. This grave is one of the remnants of Gian III (2500-1800 BC).

Contenau and Ghirshman think, contrary to Porada, that the figure is definitely the sun (1935: 9).

Figure 12- The design of people across from a tree: two people are standing next to a tree. The traces of another design could be recognized on the background; nonetheless, the extreme erosion prevents us from giving a true statement about it. This seal and its design are very similar to that of Sorkh Dom Lori (Dehghan, 2003: 83). In both designs on the two seals the people are standing opposite each other and the tree is situated between them. This scene has middle Assyrian analogues as well. Another case of this type of design has been discovered from tell-ol-Rimeh (Parker, 1977: Fig.41).

### Seals of Khurvin

Figure 13- Design of the horse-back rider: On this seal bodies of horses are designed very simply, and the legs have been formed by a couple of lines. The legs grow thinner toward the hooves, and the muzzle is in the form of an abstract cube. The designing style on this seal is incredibly similar to the seals of Hasanlu and particularly the one which is made of ivory. Overall, the scene of the horse back rider is vastly common

over the majority of sites (Sialk, Hasanlu and Khurvin) as well as on the artifacts, especially the seals like the ones in Sialk (Ghirshman, 1939: seal no.16). Another seal from Bakhtar (Bactria) in Afghanistan, dating back to early Achaemenid period exposes the figure of a horse back rider (Sarianidi 2000: Figs.3, nos.1, 2). The way of forming the animals at a 45 degree angle with the bottom horizontal line (axis) of the seal can also be observed on the Elamite seals (Macquenen, 1925: Fig.42).

Figure 14- Design of animals: on this seal, there is a design of two animals, one opposite the other. The right animal is probably a two- hump camel, which is observed among Sialk seals as well. The beast across from this camel looks even simpler; it has two big cones on its back. A big bird could be seen beside these two animals. The scene of animal rows, which are often moving to the left (such as Ghirshman 1939: PL. XCVI, S. 1714 and S. 1338 and S. 1457), are seen among the other seals from Sialk. It appears that producing these types of design has been specifically for Iran, and it is, like Elamite, too rare in the neighboring areas. As a case in point, we may mention Sagzabad (Seals 17 and 18), Sarm (5, 6 and 7), Khurvin

(23), Hamedan (No. 1636, Iran Bastan Museum) and Khatunban in Lurestan as places having this design on their seals (Hearnick and Overlaet, 2004: pl. 2/ 2- 1).

Figure 15- Design of dragon: the seal has a missing part and is also broken vertically. This seal has an annular and also a circular design. Inside the circular design are a vertical line with a few horizontal segments on the left and a diagonal line on the right, separated from the main vertical line. The annular lines could be the continuation of a tail of a scorpion or that of a dragon or even a legendry creature. Moortgat believes these designs conjured up on seals in the 9th and 8th centuries and lasted till the 7<sup>th</sup>; they have a longer- time background in Iran and could date back to the Iron Age I based on the chronology (1969).

#### **Explanation of Seals from Settlement Sites Seals of Sagzabad: Cylindrical Seals**

Figure 16- Horned animals accompanied by human: in the engraved design, there is a human across from the animal. In this abstract simple design, the man is holding his hands upright, and it seems that there is an object hanging from his waist: his face is toward the animal. The animal has four legs and a not very complicated body, and like

the similar examples, very long horns have been regarded as sufficient. The horn is curved, ending at the ground.

Figure 17- Horned abstract animals, running away: on this seal, the design of some running beasts is seen. They have horns and tails, but they have been designed to simply let us recognize what kind of animal they are. Running or moving is one of the common motifs for this period of time in Iran. This style could be found in Sagzabad (Fig. 19) and Sialk (Figs. 13, 14 and 17). Pictures in which the body of animals has been formed using two triangles have long- time record in Iranian art, like the ones from Calcholithic era. In Bakun A (Alizadeh 2006, fig. 33, no. 1, 2, 4), Shushan, among late Susiana potteries (Alizadeh 1992, fig. 62, design K), and in Sialk III (Ghraishman, 1938, tablet 79, design B, No. 1, 4) and in Hesar I (Tala'I, 2006, Fig. 1- 3), the body of goats contains two triangles as components.

Figure 18- Abstract running horned animals: this one is an excessively simple design of two running animals, and it is thoroughly analogous to the Fig. 17.

Figure 19- Vague designs: it embraces a few separated horizontal figures. Nearly all of them grow wider on the upper parts.

They seem to represent a sort of tree.

Figure 20- Seal impression with human figure: an incomplete impression has been discovered on a buff potsherd, which includes only a human. There is no similar design among the seals.

### Seals of Sagzabad: Stamps

Figure 21- Stamp seal: due to the extreme erosion, no impression has remained on the seal. Moreover, no hole could be seen in the seal or its handle. We can view this group of seals as Iranian according to its form. Marcus has put these seals as well as the cylinder ones with local designs into the Iranian category because of their oval shape in his categorization for seals of Hasanlu (Maras, 2005: 136, Marcus, 1989: 57).

Figure 22- Design of multi- point star (sun): Deep lines have been engraved on the seal's edge and cover it all. There is an 8-point star (sun) with a filled central circle. There are two rows of incised designs on the seal as well, and the main design has been formed on it. Three main circles have formed the design, and the sun is on the third one. Among seals of Sorkh Dom Lori is an entirely similar seal (Dehghan, 2003: fig. 2). The same design is observed on the seals from Susa too (Amiet 1972: nos. 91

and 92). Michael Marcus has categorized this type of seals under the second group, namely the local ones (Marcus 1989: Fig.12) and he subscribes to the view that all these seals have been produced in Hasanlu or the adjacent areas (Ibid: 57). Incised row of designs also exist on the local seals of Hasanlu as well as the oval ones.

### The Purchased Seals of Qazvin

These seals are among the purchased seals of the museum and have been recorded in the museum registry office.

Figure 23- Unicorn beast: Two animals have been so primitively and disorderly designed. The two animals are leaning against each other. The left one is kneeling on its front feet and has very thin neck and muzzle. The artist (producer) has dispensed with a big horn rather than the right animals' neck and head. Representing the head, neck and horn all in the form of only one horn in an abstract style has been discovered in Sagzabad (figure. 16) from Dr. Tala'i's excavation. These seals both seem as if they have been made in the same place. The similarity between these two seals in all aspects, such as the style of producing, the way they have been incised

on the stone and the decoration style which is annular and serrated and the same as that of Sagzabad. On seal no. 16 there is also a person. In both seals, the horn covers the behind part of the body, and it is thicker than the body itself. Generally, the main design includes animal (zoomorphic) and human (anthropomorphic) and it has been deeply engraved. Although seal no. 12 of Sagzabad has been found from a settlement, it is similar to the seal from Khurvin. One leg of the animal on the ground is also seen on the ivories from Hasanlu (Mascarella 1980: Fig. 220). This ivory has been unearthed from room no. 10 in layer IVB and Mascarella classifies it as Iranian ivory (Ibid: 5).

Figure 24- Vague designs: Some horizontal and vertical lines have been engraved on this seal, which may indicate a shape of an animal. These lines are simple, angled and chiefly have three points even when they signify body parts. In most cases of this group using a sort of white stone is quite common. The incised designs on them usually comprise beasts, trees and human; however, the majority comprise of beasts. The traits of seal no. 25 also exist in those of Sagzabad and Khurvin (13 and 14). Furthermore, seal no. 17 from Sagzabad is

very much like this one.

Figure 25- Vague designs: The horizontal line is likely to be taken into account as the figure of a horse. The design of a dog and a puppy is illustrated on the right.

### **Seals of Ma'murin Tepe in Tehran**

Figure 26- Mittani style: There are some people and animals together in this design. A vertical zigzag line is just between the two standing men. Its designing style resembles that of Haft Tepe (Negahban, 1993: 98), and the goats have been designed in different positions like standing on two legs and sleeping. The animals' face and eyes are like geometrically concentric circles. This kind of displaying appearance and eye in Mittani art has some analogues terminologically called augured (drilled) holes (Negahban, 1977: 11). This style (each body part and object have been separately done and eventually put together) could be observed among diverse seals from different regions such as Qazvin culture seals in The National Museum of Iran which are among contrabands with the official number 2666 (Saed Mucheshi, 2007: Figs. 51- 54), seals from Nimrud in Mesopotamia (Parker 1955: PL 12: ND.



1686), Assyria (Parker 1962: fig. 7835 and Buchanan 1966: fig. 619 and Dalley 1972: fig. 29), and Haft Tepe (Negahban, 1993: Fig. 97). There is a similar scene showing a standing person between a goat and a tree and the same designing style on a Middle Eastern seal in a North American collection studied by Porada (Porada, 1948: Fig.1008e). Apart from this seal, there are a lot of other seals filed as Mittani seals each of which has a feature in common with this seal. Schaeffer has also considered some seals as Mittani (Schaeffer, 1948).this style remains until early Iron Age at the following sites: Dinkhah, Marlik, Hassan Zamini, and Aghevlar (Tala'I, 1995: 29).

Figure 27- Clay seal impression with plowing scene: This seal impression, as the excavator believes, was formed on the pottery before cooking (Mehrkian, 1995: 75). In this scene, there is an animal (highly likely a cow) between two people. It appears that the person in front of the cow is holding the beast's muzzle, and the man behind the animal is handling the probable ropes hanging from the cow's horns; there is a vague figure under this man's feet too. On the whole, we can assume that this design shows plowing. The designing style, considering simplicity in operation, holds

similarity with the local seals and the beast's head is very much like that from Tepe Ma'murin. Plowing is a very scarce figure and the only scene which bears close resemblance with it has been discovered from the survey in Tepe Golestan in Robat Karim (Alibaigi and Khosravi, 2009). The mentioned impression, like the case in Tepe Ma'murin, is of clay with plowing figure, dating back to the Iron Age. Another example, of course with a difference in procession and details, is an Achaemenid seal (Buchanan 1966: pl. 91, Fig. 21 (A. 791). Factoring this theory about Tepe Ma'murin in, we can infer that this is a hierarchical society. Plowing as a design on the seals has a long history dating back to the proto- Elamite period (Alizade, 1996: 146b).

### Seals of Tepe Qoli Darvish

Figure 28- With design of hunting: This motif is about hunting in a very simple way. Two close lines have been utilized for making all animals and human organs. The animal's figure is upright just like the human with a bow in his hand, and the seal has been filled all over with shallow hole-like points formed presumably by an auger. These kinds of hole - like drilled circles are

almost abundant on the Elamite seals from Chogha Zanbil (Porada, 1970). Hunting scenes are also seen on the seals from Sialk (Ghirshman 1939: PL. XCVI. S.1726). There is the figure of an animal in an upright position in Sialk too. This seal was found on the floor of room 120 (Sarlak, 2003: 167).

Figure 29- Broken cylinder seal: It comprises in part of floral designs, and in part a small curved figure. It also has other vague designs (maybe heads or animals or birds). This seal was unearthed from the architectural space 211, phase, II and trench 18 Z (Sarlak, 2003: 156). The context in which this seal was found has been related to productive and economic affairs on the grounds of vast dimensions, brick platform, ledges, numerous floors and chalk tokens.

#### **Seal of Sialk Tepe (Settlement Area)**

During revising excavations on Sialk, led by Malek Shahmirzadi in 2002, while removing the surrounding soil, a great architectural feature, ornamented bricks and one clay seal impression was discovered. Norouz Zadeh Chegini believes that the designs on the bricks are actually impression of cylinder seals (2002: 171). If Norouz Zadeh is right, for the first time we

are faced with huge seals which are totally different from all the known seals. Their decoration length equals the length of the cylinder seal itself which is something in the region of 11.5 to 18 cm, while the seals reported by Ghirshman are between 2 to 3 cm long, and the longest seal is a cylinder one which is 40 mm (Ghirshman, 1939: PL. XCVI, S. 1301). In addition, no case of such seals has ever been reported or observed from the north of the Central Plateau and the rest of Iran. A reduction in the size of the seals is seen in Syria as well (Collon 1990: 40). Ghirshman regards these decorated bricks as components of a huge feature, and he does not classify them as seal impressions (Ghirshman, 1939: PL. XCVII). As Sarlak and Malek Zadeh point out, the designs on the bricks have probably been made by negative flat clichés (2005, p 56). A part of a decorated brick has also been discovered from Qoli Darvish in Qom (Ibid: Fig. 1).

Figure 30- Seal impression with tree and animal design: In addition to the decorated bricks, there was a seal impression on pottery. Norouz Zadeh Chegini describes it in the following manner:

“It is a light brown potsherd with a 3-

centimeter length impression on it. The figure of it is a tree of life (the central figure) and some animals beside it. These beasts are turning to the left toward the tree of life and looking at it. We can observe parts of body of another animal that is standing on its front feet to the tree. The potsherd's size is 10.5 × 9.5 cm." (Chegini, 2002: 173). There are some similar zoomorphic designs on the decorated potteries from cemetery B in Sialk (Ghirshman, 1939: pl. LXXX: a), the figure of animals laying down on the ground and having turned their heads toward their rumps is seen on the seal introduced by Ghirshman as "animal farm" (Ghirshman, 1939; PL. XCVI. S. 1327), seals of Marlik (Negahban 1977: fig. 5, 6), Hassan Zamini in Talesh (Schaeffer, 1948: 410), Agh Evlar (Ibid: n2) and Mesopotamia (Ibid: n. 4, 5). Maras, based on what John Curtis says, view the figure of one tree and goats around it as adapted from Phoenician art elements (Maras, 2005: 141). The gripping point about this seal and its design is that it is analogous to Mittani seals (Porada 1948: pl. CLIX: 1046e, pl. CLX: 1053, 1056) and the seal of Tepe Gian (Contenau and Ghirshman, 1935: pl. 38: Fig. I) at the sight of their figures. Owing to the mentioned

comparisons, the aforementioned seal must be for Iron Age I. However, at this period of time settlement has not been identified on Tepe Sialk. It is to be stated that the details of Mittani designs such as drilled hole- like points do not exist, but the empty spaces [this constitutes one of the Mittani seal's features which was continually in use on the middle Assyrian seals that replaced them in the mid 14th century (Porada, 1948: 138).] are similar to the Mittani designs. We should emphasis that during the early years of the Iron Age people would go on using the old seals- not of their own time (Collon, 1990: 40). This seal and the one from Tepe Ma'murin both imply the constancy of Mittani art during the Iron Age in Iran. This Mittani art style constancy was in existence till 13th and 14th centuries despite the Assyrians' predominance. In Assyria, there are many sealed documents bearing resemblance with the seals from Noozi and Alalakh. Even more importantly to be noticed is that this style is not confined to the small cylinder seals; it is also seen on the craftsmen's work of art (Moortgat, 1969). There is an Assyrian seal with a figure of an animal turning its head to the tree which is very much like fig. 26 (Majidzadeh, 2001: 124).

The Mittani art perpetuation in Lorestanian Bronze Age artifacts survives till the 2<sup>nd</sup> century (Majidzadeh, 1988: 13).

### **Comparisons of Seals from Cemeteries and Settlements Similarities**

Deep engraving on the seals of the Iron Age in the area is a unique style and has very simple designs with shallow ridges on them; moreover, there is absolutely no symmetry in the body parts. The cylinder's diameter cannot be the same in the different upper, middle or lower parts. Sagzabad is very likely to have been the center for producing deeply- engraved seals.

The simplicity in designing animal, human and other figures forms the characteristics of the Iron Age in the North of the Central Plateau. We can mention the small size (they are often less than 2 cm long and many others have the length 2- 4 cm) of seals as another specific trait for Iron Age seals. Wavy form of the chest of animals and their very long necks in an exaggerated way are two distinctive signatures for the seals of the Central Plateau during Iron Age, and the figures. 16, 17, 19, 21, 23 very well exemplify this. All three seals of Khurvin are similar to those of Sagzabad both from a technical

and design point of view.

The sameness of the seals from cemeteries and those of settlements in the North of the Central Plateau include the old local symbols, elements and designs. As a case in point, we have dividing body into two adjoining triangles that is clearly seen on the seal numbers 19 and 21 (Sialk) and no. 17 (Sagzabad). This figure has also a very old record in Iranian pottery making since the specimens of it had been found in Susa, Bakun and Sialk during the chalcolithic period. The figure of "cart rider" is the other designs in Iran dating back to the time before the Iron Age. A seal with such a design was found in both Sialk and Hesar, layer III (Schmidt 1937: 892).

Designing various animals in motion is one of the local Iron Age seal engravings. This attribute has not been reported in the neighboring countries and places due to the existence of static and governmental art; in other words, the designed animals in their art imply lack of motion. Motion is a common attribute for Marlik, Hasanlu (seals and ivories) and seals from the North of the Central Plateau. Mascarella generalizes this trait to all of the artifacts in addition to the ivories throughout the Iron Age (1980: 190).

The decrease in the figure of gods and goddesses over this period of time (Iron Age) in the neighboring places, and not having even one design of gods in Iron Age Iran is a sort of specific feature of the seals. Such an attribute exists on the Middle-Elamite cylinder seals in Chogha Zanbil as well. As Ghirshman has stated, the seals of Chogha Zanbil were used in rituals rather than for sealing tablets or other items (Porada, 1996: 496). Diversity of the seals unearthed from the settlements and the cemeteries is another common feature for them. One of the particular qualities of the Iron Age seals and especially the ones from the North of the Central Plateau is the accentuation which can be observed on designing individual animals or rows of animals and birds in a way that have no analogue in the other parts of Iran nor in the neighboring places Mesopotamia. Another eminent signature of these seals is engraving animals as the main background.

### **Dissimilarities**

One of the distinguishing figures of the seals from the settlements like Sagzabad and Qoli Darvish is the image of an archer which has not been seen in any cemetery in the Central Plateau.

The design of a single- horned cow on seal no. 49 (Sagzabad- Qazvin) is very much like that of the metal vessels of Marlik. We may associate the existence of this figure in Qazvin with Babel and factor it in as an interrelation between these two regions providing that we admit John Curtis's theory that the figures on the Marlik metal vessels originally come from Babel.

One of the major differences between Sagzabad as a settlement and Sialk, Khurvin and Sarm Tepe as cemeteries, is the difference in the stamp seals. The stamp seals of Sialk (Figs. 29, 30, 31 and 32) are small and look like cockroaches; they have been produced and engraved so precisely, the designs persist longer and there are even some little geometrical lines on the back of them. However, the seals from Sagzabad (Figs. 21 and 23) are bigger and oval-shaped. Incidentally, seal no. 21 has no design on it because of overuse.

The designs of seals from the settlements have more in common with those seals from the neighboring sites of Iran rather than the seals from the cemeteries; this fact is proved by the Mittani figures (from Tepe Ma'murin). Apart from that, the designs on the

settlement- found seals are in harmony with the usual activities and affairs of that time. Plowing, seal impressions (Sagzabad, Tepe Ma'murin, Tepe Golestan), and oval-shaped worn out seals used in relation with management may be mentioned in this regard.

Another difference between the seals from these two contexts is that they were made of various materials; the seals from settlements were often made of hard severe materials like stone owing for functional reasons, while the seals from the cemeteries, as they would not ever be used, were made of soft materials which could be easily formed. Based on these facts, we can infer settlement and social complexity in Central Plateau- which was a nomadic area during the Iron Age. Unfortunately, this facet of culture in this area has been neglected, and it demands more surveys and researches.

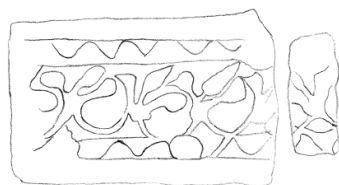
### **Conclusion**

Our knowledge of different aspects of life in the settlement is nugatory because of much attention being diverted to cemeteries and a boost in the population of nomads contrary to our knowledge of the sedentary population in this area. Having conducted

excavations during recent years in the North of the Central Plateau, some new aspects of trading, architecture, social complexity and religious traditions have been discovered. Meeting with settlements adjacent to the cemeteries, the subsistence and environmental interaction has suggested a different approach toward the cultural material (such as seals). We hope that we can study and observe these matters more profoundly in the future. One of issues about the Iron Age that is worth reflecting on thoroughly is the lack of similar cultural materials compared with those from the Middle- Elamite era, a period of time during which the Elamite people could find ascendancy over a part of Mesopotamia. This was probably because of the nomads' coarse nature and their flexibility toward the monarchs. The figures on the seals indicate that nomadic affairs were contrary to those of the settlements; as an illustration, figure. 27 from settlement of Ma'murin show the scene of plowing and farming, whereas on seal no. 13 from the cemetery of Khurvin we can see the design of a horse rider. Considering the stamp seals, sealed potsherds and also the seal impressions discovered from the settlements spread over this area, utilizing

seals were considered both prestigious and functional for sealing goods and storages and also in management and commercial affairs. Nevertheless, the nomads would not use the seals daily. Hence, there were diverse professions with more specialized and complicated activities in the settlements and the sedentary societies. This difference could be seen on the other artifacts as well as the seals between the cultural material of the settlements and the cemeteries in the North of the Central Plateau (Abbas Zadeh 2006). Another fascinating point is the constancy in past art traditions which were used in seal production across the sites of settlement such as plowing and Mittani style that show cultural interaction in addition to the mentioned constancy.

### Designs of the Seals



**Fig 5** Design of Birds  
Pour Bakhshandeh, 2003, Sarm Tepe

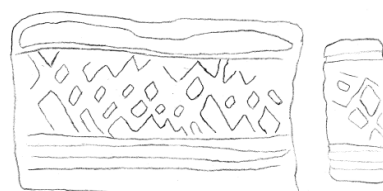


**Fig 6** Design of Birds

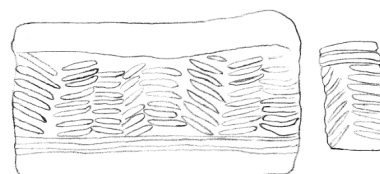
Pour Bakhshandeh, 2003, Sarm Tepe



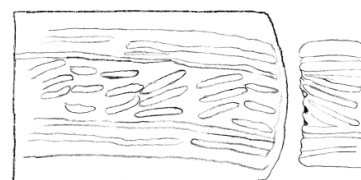
**Fig 7** Design of Birds  
Pour Bakhshandeh, 2003, Sarm Tepe



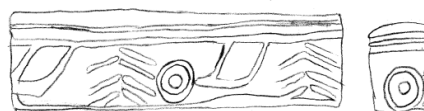
**Fig 8** Geometric Designs  
Pour Bakhshandeh, 2003, Sarm Tepe



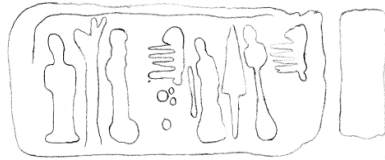
**Fig 9** Geometric Designs  
Pour Bakhshandeh, 2003, Sarm Tepe



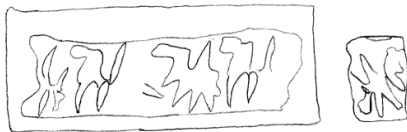
**Fig 10** Geometric Designs  
Pour Bakhshandeh, 2003, Sarm Tepe



**Fig 11** Geometric Designs  
Pour Bakhshandeh, 2003, Sarm Tepe



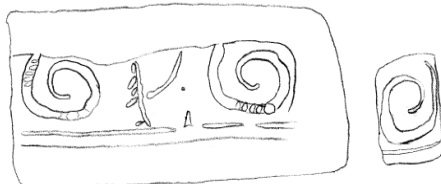
**Fig 12** People Standing across Tree  
Pour Bakhshandeh, 2003, Sarm Tepe



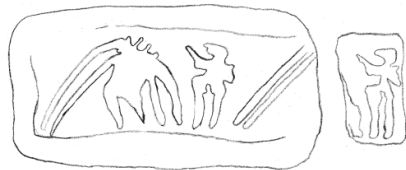
**Fig 13** Design of Horseback Riders  
Discovered at Khurvin, Purchased & Kept in Iran Bastan Museum – Code: 1671.3, Length: 14mm, Diameter: 12mm.



**Fig 14** Animal Designs  
Discovered at Khurvin, Purchased & Kept in Iran Bastan Museum – Code: 1671.1, Dated 3000 BC, Length: 14mm, Diameter: 12mm.



**Fig 15** Design of Dragon  
Discovered at Khurvin, Purchased & Kept in Iran Bastan Museum – Code: 1671.2, Dated: 3000 BC, Length: 15.5mm, Diameter: 10.2mm.

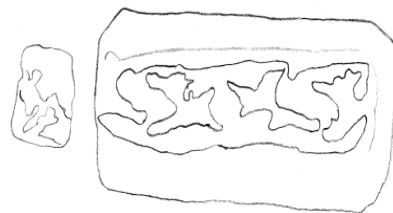


**Fig 16** Design of Horned Animal with Human  
Discovered at Sazabad, Trench: o.xx, Registered

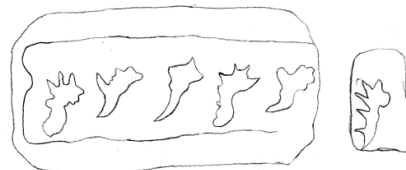
no.: 1165 – length: 14.5mm and 15mm – Diameter: 9mm – Kept in Museum of the Institute of Archaeology, University of Tehran



**Fig 17** Design of Abstract Horned Animals in Running Position  
Discovered at Sagzabad in 1977 of 9<sup>th</sup> season of excavation, Slide no.: 252 – Kept in the Museum of the Institute of Archaeology, University of Tehran.

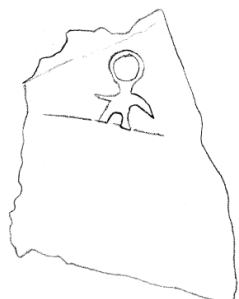


**Fig 18** Design of Abstract Horned Animals in Running Position  
Discovered at Sagzabad, Trench: o.xx – Registered no.: 1165 – length: 11mm – diameter: 8 and 9mm – kept in the Museum of the Institute of Archaeology at University of Tehran.



**Fig 19** Obscure and Unknown Design  
Discovered at Sazabad – Trench o.xx - Registry no: 1165 – length: 15mm – diameter: 8 and 9mm – kept in the Museum of the Institute of Archaeology at University of Tehran.

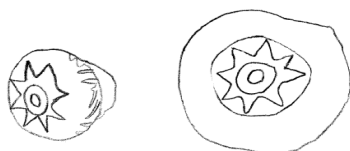




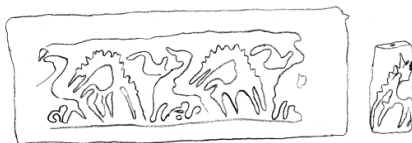
**Fig 20** Impression of a Human  
Date of excavation: 1997 – surface find – sealed pottery – kept in the Institute of Archaeology at University of Tehran.



**Fig 21** Stamp Seal  
Discovered at Sagzabad in 1977 the 9<sup>th</sup> season of excavation – Number: 377 – Clay-made – kept in the Museum of the Institute of Archaeology at University of Tehran.



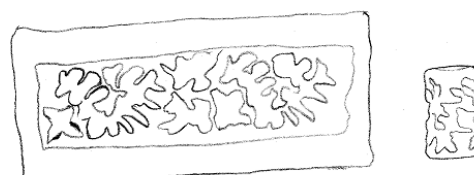
**Fig 22** Multi Points Stars (Sun)  
Discovered at Sagzabad in 1977 the 9<sup>th</sup> season of excavation – number: 377 – made of clay – kept in the Museum of the Institute of Archaeology at University of Tehran.



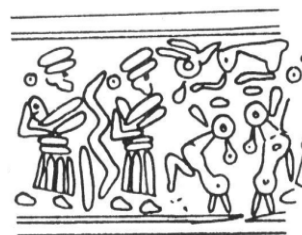
**Fig 23** Design of Single-horned Monster  
Discovered at Qazvin – Kept in Iran Bastan Museum – Length: 20mm – Diameter: 9.7mm.



**Fig 24** Obscure and Unknown Designs  
Discovered at Qazvin (the culture of Qazvin) – Kept in Iran Bastan Museum – registry number: 2666.4 – Length: 12.5mm – Diameter: at the bottom of the design 10 and at the top 10.5mm.



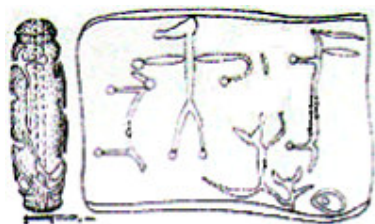
**Fig 25** Obscure and Unknown Design  
Discovered at Qazvin (the culture of Qazvin) – Kept in Iran Bastan Museum – Registry number: 2666.10 – Length: 16mm – Diameter: 10.5mm.



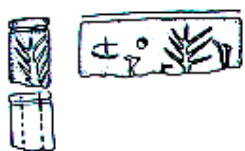
**Fig 26** The Mittani Style  
Discovered at Tepe Ma'murin



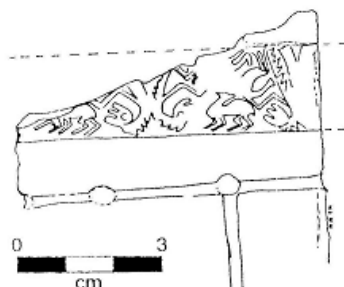
**Fig 27** Seal Impression with Plowing  
Discovered at Tepe Ma'murin



**Fig 28** Cylindrical Seal with Hunting Design  
Discovered at Qoli Darvish Tepe in 2003 –  
Material: Backed clay (Pottery) – Excavator: Sarlak



**Fig 29** Broken (incomplete) Cylindrical Seal  
Discovered at Qoli Darvish Tepe in 2003 –  
Excavator: Sarlak – Material: Steatite? – Scale: 01.



**Fig 30** Seal Impression, Sacred Tree & Animal  
Design  
Discovered at Sialk in 2002 – Excavator: Malek  
Shahmirzadi – Material: Pottery (Nourzadeh Chegini  
2002: Tablet 1: No.1).

## References

- [1] Abbaszadeh, A. (2006). "Studying and comparison between the potteries of the Qoli Darvish settlement and the potteries from the Iron Age cemeteries" *Unpublished M.A Dissertation*, University of Tehran.
- [2] Alibaigi, S., Khosravi, S. (2009). "Some Evidences of the social and economic organizations in the Iron Age communities of the Central Plateau of Iran," *Journal of Archaeological Research* 1: 85-108.
- [3] Alizadeh, A. (1992). *Prehistoric Settlement Patterns in Susiana, Southwestern, The Analysis of the F.G.L. Gremliza Survey Collection*, Published by Regents of University of Michigan Museum of A.
- [4] Alizadeh, A. (1996). *Choghamish*, Vol. 1, University of Chicago.
- [5] Amiet, P. (1972). *La glyptique de la fin de l'Elam*, *Art Asiatiques* 28: 3 – 32.
- [6] Amiet, P. (1999). *Les Sceaux de Kabanak (Haft Tappeh), The Iranian World, Essay on Iranian art and archaeology, presented to Ezat O. Negahban*, Alizadeh, A., and Majidzadeh, Y. and Shahmirzadi, S.M. (eds.), Tehran: 101-130.
- [7] Bahrani-pour, H. (2006). "Studying pottery making technics during the Iron Age at Sarm Tepe (Kahak – Qom) based on the excavations by Khosrow Pour Bakhshndeh," *unpublished M.A. dissertation*, University of Tehran.
- [8] Buchanan, B. (1966). *Catalogue of Ancient Near Eastern Seals in the Ashmolean Museum*, Volume 1, Cylinder Seals, Oxford Press.
- [9] Collon, D. (1990). *Near Eastern Seals*, Published by British Museum.
- [10] Collon, D. (1998). First catch your ostrich, *Iranica Antiqua* XXXIII: 25 – 42.
- [11] Contenau, G., and Ghirshman, R. (1935). *Fouilles du Tepe - Giyan*,

- Pres de Nehavend 1931- 1932*, Librarie Orientaliste Paul Geuthner, Ruevavin.
- [12] Dalley, S. (1972). "Seals from the Hutchinson Collection," Iraq XXXIV: 125- 134, 1972.
- [13] Dehghan, N. (2003). "Studing the seals discovered from Sorkh Dom Lori and kept in the National Museum of Iran," unpublished M.A Dissertation University of Tehran.
- [14] Fazeli Nashli, H., and Naghshineh, A.S. (2006). *The Iron Age graves of Tepe Qabrestan, the Archaeology of Qazvin plain from the 6th millennium to 1st millennium BC*. Published by University of Tehran.
- [15] Frankfort, H. (1969). *The Art and Architecture of the Ancient Orient*, published by Penguin books.
- [16] Ghirshman, R. (1938). *Fouilles de Sialk près de Kashan*, vol. 1, Librarie Orientaliste paul Geuthner, Paris.
- [17] Ghirshman, R. (1939). *Fouilles de Sialk*, Vol. 2, Librarie Orientaliste paul Geuthner, Paris.
- [18] Haerinck., E., and Overlaet, B. (2004). *The Iron Age III graveyard at Ware Kabud, Chavar District, Pusht-i Kuh, Luristan*, Acta Iranica 42.
- [19] Kambakhsh Fard, S. (1991). *Tehran: A three thousand and two hundred years old site*, Tehran, Faza institute.
- [20] Littauer, M A. (1971). "Decorated garment in Ashurnasirpal's sculpture," Iraq, XXXIII: 31-53.
- [21] Majidzadeh, Y. (1988). "Dating of the bronze head pins of Luristan," Journal of the archaeology and history V: 3-15.
- [22] Majidzadeh, Y. (1999). "The oldest narrative pictoral phrase on a pottery vessel from Tappeh Qabrestan," In Alizadeh. A., and Majidzadeh. Y., and Malek Shahmirzadi S(eds.), *The Iranian World, Essay on Iranian art and archaeology, presented to Ezat O. Negahban*, 80-84.
- [23] Majidzadeh, Y. (2001). *Ancient Mesopotamia: History and Civilization*, Vol. III (Art and Architecture), Tehran, Iran University Press.
- [24] Malekzadeh Bayani. (1996). *History of seal in Iran*, Golshan publication. Tehran.
- [25] Maras, S. (2005). "Notes on Seals and Seal use in Western Iran from 600 - 900 bce," *Iranica Antiqua* XL: 133 - 147.
- [26] Marcus, M. (1989). "Emblems of Authority, the Seals and Sealings from Hasanlu4b," Expedition, vol. 31: 53 - 63.
- [27] Masumi, G.R. (1969). "The bronze goblets (cups) of Luristan," *Journal of the historical researches*. Vol. 20 and 21: 44-21.
- [28] Mecquenien, R. (1925). Inventaire de cachets et de cylindres (Suse 1923-1924) », *Revue d'Assyriologie et d'archéologie orientale* XXII: 1-15.
- [29] Mehrkian, J. (1995). "A new horizon in the researches regarding the grey pottery culture," *Mirase Farhangi* XIII: 74-75.
- [30] Mehrkian, J. (1997). "Teppe Mamurin," *Iran* XXXV: 143.
- [31] Mehrkian, J. (2003). Hurri-Mittanian cultural symbols on the cylinder seals

- of Tepe Mamourin, *The first international conference on the ancient cultural relations between Iran and West Asia*: 98-99.
- [32] Moortgat, A. (1969). *The art ancient Mesopotamia: the classical art of the Near East*, London.
- [33] Motarjem, A. (1996). "Studying and comparison between the seals discovered in the north and northwest of Iran and the seals of the Central plateau in the Iron Age," *unpublished Ph.D. dissertation*, University of Tarbiat Modarres.
- [34] Muscarella, W. (1980). *The Catalouge if Ivories from Hasanlu Iran*, Published by University of Pennsylvania.
- [35] Negahban, E. (1973). "Preliminary report on the 2 months excavation at Qazvin plain," *Sagzabad, Marlik I*: 1-24.
- [36] Negahban, E. (1977). "Seals of Marlik," *Marlik II*: 2-25.
- [37] Negahban, E. (1993). *Excavation of Haft Tepe, Iran. Tehran*, published by Entesharat Elmi va Farhangi, Tehran.
- [38] Norouzzadeh Chegini, N. (2002). "Bricks decorated with seal impression," In Malek Shahmirzadi(ed.), *report on the 1st season of excavation at Sialk*, Tehran: 171-175.
- [39] Overlaet, B. (2003). *The Early Iron Age of the Pusht-i Kuh, Luristan*, Acta Iranica.
- [40] Parker, B. (1955). "Excavation at Nimrud, 1949-1953, Seals and Seal Impressions", *Iraq XVII*: 93 – 140.
- [41] Parker, B. (1962). "Seals and Seal Impresion from the Nimrud Excavation," *Iraq XXIV* : 26 – 58.
- [42] Parker, B. (1966). *Cylindr Seals*, Oxford at the Clarendon Press.
- [43] Parker, R, B. (1977). "Middle Assyrian Seal Impressions from Tell Al Rimah," *Iraq XXXIX*: 257 – 268.
- [44] Parker, B. (1996). *Cylinder Seals, Encylopedeia Iranica*, vol VI: 479-505.
- [45] Porada, E. (1948). *Corpus of Ancient Eastern Seals in North American collections*, Washington D.C.
- [46] Porada, E. (1970). *Tchoga Zanbil (Dur-Untash). Vol. IV (only): La Glyptique*, Memoires de la Delegation Archeologique en Iran, vol. 42, Geuthner.
- [47] Pourbakhshandeh, K. (2002). *Report on the second season of excavation at the archaeological site of Sarm Tepe (under the dominance of grey pottery culture), Kahak – Qom*, Iranian Center for Archaeological Resarches, Tehran.
- [48] Pourbakhshandeh, K. (2003). *Report on the second season of excavation at the archaeological site of Sarm Tepe (under the dominance of grey pottery culture), Kahak – Qom*, Iranian Center for Archaeological Researches, Tehran.
- [49] Saed Mucheshi, A. (2007). "Studying, introduction and comparison between seals from the settlement areas and cemeteries of the Iron Age I and II over the North region in the Central Plateau of Iran," *unpublished Ph.D. dissertation*, University of Tehran.

- [50] Sarianidi, V. (2000). "Neo-Assiran Parallels in Late Bactrian Gliptics," *Iranica Antiqua* XXXV: 21-31.
- [51] Sarlak, S. (2007). "Preliminary report on the 4th season of excavation at Qoli Darvish in Jamkaran-Qom," *The Archaeological reports (7), volume II. Symposium of the 9th annual congress of the archaeology of Iran*, Iranian center of Archaeological Research, Tehran: 187-208.
- [52] Sarlak, S. (2003). *Preliminary Report on the excavation at Qoli Darvish, Jamkaran- Qom*, Iranian center of Archaeological Research, unpublished.
- [53] Sarlak, S. and Malekzadeh, M. (2005). Decorated bricks of the late Iron Age in eastern Media(Mud-Brick Platform of Qoli Darvish-e Jamkaran and 'la Grande Construction' of Sialk), *Bâstânshenâsi*: 52-66.
- [54] Schaeffer, F.A. (1948). *Stratigraphie Comparee et Chronologic De L Asie Occidentale*, Oxford University Press, London.
- [55] Schmidt, E. (1937). *Excavation at Tepe Hisar Damghan*, Published for the University of Pensilvania Press, Pennsylvania.
- [56] Tala'i, H. (1983). "Late Bronze Age and Iron Age 1 architecture in Sagzabad- Qazvin plain- the Central Plateau of Iran," *Iranica Antiqua* XVIII: 51 – 57.
- [57] Tala'i, H. (1984). "Notes on Bronze Artifacts at Sagzabad in Qazvin Plain, Iran, Circa 1400 B.C," *Iranica Antiqua* XIX : 31 – 42.
- [58] Tala'i, H. (1995). *Iranian art and archaeology Iran in the first millennium B.C*. Tehran : SAMT Publication.
- [59] Tala'i, H. (2006). *The Bronze Age of Iran*, SAMT publication, Tehran.
- [60] Tala'i, H. Unpublished. *Excavations of the University of Tehran 1997*.
- [61] Vanden Berghe, L. (1959). *Archeologie de l'Iran ancient*, Archeologie de l'Iran ancient.
- [62] Vanden Berghe, L. (1973). "Bronzes from Luristan, in": Vanden Berghe, L., and Joffroy, R., *Bronzes, Iran-Luristan, Caucasus, Evocations Métallurgiques* XIII: 69-95.

## مطالعه، معرفی و مقایسه مهرهای بدست آمده از منطقه شمال فلات مرکزی ایران در عصر آهن I و II

امیر ساعد موچشی<sup>۱</sup>، حسن طلایی<sup>۲</sup>

تاریخ دریافت: ۹۰/۷/۱۶

تاریخ پذیرش: ۹۱/۱/۲۶

در این مقاله به معرفی، مطالعه و مقایسه مهرهای بدست آمده از محوطه‌های استقرار با قبرستانهای شمال فلات مرکزی ایران پرداخته شده است. این مهرها از بررسیها و کاوشهای پیشین و اخیر این منطقه بدست آمده و به اختلاف این دو نوع مهر اشاره دارد. نتایج بدست آمده از این پژوهش بر تشابه مقایسات انجام شده بر روی سفالهای بدست آمده از قبرستانها و محوطه‌های استقرار و اختلاف بین این منطقه اشاره دارد. البته اختلافات موجود در حدی نیست که نتوان ویژگیهای کلی و مشترکی را برای آنها در نظر نگرفت، از اینرو در قالب یک سبک کلی می‌توان آنها را با عنوان مهرهای سبک آهن معرفی کرد.

واژگان کلیدی: مهر، عصر آهن I و II، قبرستانها و شمال فلات مرکزی.

۱. دانشجوی دکتری دانشگاه تهران

۲. هیأت علمی دانشگاه تهران