

BETWEEN 'EARLY' AND 'LATE' IRON AGE IN SOUTH-EASTERN IRAN:
NOTES ON THE POSSIBILITY TO EVALUATE THE 'ACHAEMENID IMPACT'
ON THE AREA

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This paper explores the possibility to evaluate the intensity of an alleged 'Achaemenid impact' on South-eastern Iran in the light of researches on local material culture and settlement pattern. The focus of the paper is mainly represented by areas in Kerman Province and in Sistan (Sistan and Baluchestan Province) by virtue of a greater amount of information at disposal for these territories.

Keywords: South-eastern Iran; Early Iron Age; Late Iron Age; Achaemenid impact; material culture

1. INTRODUCTION

The main contribution of the archaeological researches carried out in the wide territories of South-eastern Iran (today including, from north to south, the three modern Iranian Provinces of Sistan and Baluchestan, Kerman and Hormozgan; fig. 1);¹ probably concerned the analysis of the emergence (during the Chalcolithic period: c. 5th and 4th millennia BC) and the consolidation (during the Early Bronze Age: c. 3200-1800 BC) of a long-distance system of commercial routes connecting Mesopotamia, the Iranian Plateau, the shores of the Persian Gulf and South Asian areas. Due to a relevant number of archaeological activities (both excavations and surveys) in South-eastern Iran, the role of several ancient sites (e.g. Tepe Yahya, Konar Sandal-Mahtoutabad, Tall-i Iblis, Shahdad, Shahr-i Sokhta, Bampur, etc.) and/or wider areas (e.g. the Halil river valley, the Shah Maran-Daulatabad basin, the Soghun plain, the Bard Sir plain, the Helmand basin, the Bampur river valley, etc.) within that context of long-distance trade routes and related cultural interactions has been diffusely documented and evaluated.²

Subsequent periods in the historical and cultural development of this wide area of Iran, on the contrary, are scantily documented in the archaeological records, if not completely unattested. This is particularly evident in the cases of the Iron Age or the 'transition periods' from the Bronze to the Iron Age and from earlier to later Iron Age phases.

These archaeological gaps seem even deeper and broader if compared with the information related to the same periods from Western Iran. Iron Age in Western Iran, indeed, has been the subject of a well-established tradition of studies and field researches and its periodisation has been the focus of scholarly debates since the middle of the 1960s, when both T.C. Young and R.H. Dyson proposed a tripartite subdivision of Western Iranian Iron Age.³ In the mid-1980s a further step was taken again by Young, who established the chronological framework of the Iron Age in Western Iran, based on the stratigraphy at Hasanlu.⁴ In 1975, however, Young had already introduced the concept of 'Iron Age IV', in

¹ Toponyms are reported according to the variants more commonly used in the international scientific jargon.

² For recent syntheses with related bibliography see Mutin 2013; Petrie 2013; Pittman 2013; Weeks 2016; Mutin *et al.* 2017.

³ Young 1965; Dyson 1965.

⁴ Hasanlu V = Iron Age I: c. 1450-1200 BC; Hasanlu IV = Iron Age II: c. 1200-800 BC; Hasanlu III = Iron Age III: c. 800-550 BC (Young 1985).

order to refer to the chronology of a specific corpus of pottery he was able to isolate during his survey in the Kangavar Valley, whose lower chronological range probably extended into the early Parthian times.⁵ The concept of an Iron Age IV was broadened some years later by L.D. Levine, who proposed to extend the term 'Iron IV' over all Western Iran, adding another chronological component to the Iron I-III subdivisions established by Young.⁶

Moreover, quite recently the periodisation of earlier phases of the Iron Age in North-western Iran has been somewhat modified by M. Danti, according to a reassessment of the chronology at Hasanlu.⁷ The Iron Age chronology was recently reassessed also in Luristan, according to the evidence from cemeteries in the Pusht-e Kuh,⁸ and similar important steps were taken as far as the archaeological definition of the Iron Age in Northern and Central Iran is concerned.⁹

In the opinion of many scholars, however, the end date of the Iron Age in Iran is considered to coincide with the emergence of the political power of the Achaemenids, retained as an actual 'watershed' between Iron Age cultures and 'Historical Periods' of ancient Iran.

Several archaeological researches in the last decades, on the contrary, testified an increasing scholarly tendency to include the period of political control by the Achaemenid dynasty (c. 559-330 BC) within the Iron Age periodisation, on the basis of an overall continuity of the material culture. This scientific approach was explicitly recommended by R. Boucharlat, who warned against the generic utilisation of the term 'Achaemenid' in archaeology, suggesting to limit its use to evidence surely datable between 559-330 BC and denoting a real 'impact' of the royal power. Thus, he proposed to eschew the term 'Achaemenid' to date sites or levels and to adopt systematically the term 'Iron IV' or alternative expressions, as 'Late Iron Age', etc., in order to avoid mistakes and misinterpretations.¹⁰

Together with the examination of chronological matters, the evaluation of the archaeological evidence from the (Late) Iron Age in Iran and neighbouring areas has been often concerned with the issue of the intensity and 'material' visibility of a possible 'impact' originated from the establishment of the political power of the Achaemenid dynasty on the socio-cultural and socio-economic life in the wide subjected territories. Obviously, debates over this issue has been mainly fostered with regard to regions characterised by considerable evidence from both the period of the Achaemenid political power and the immediately previous decades and centuries, to be used as a source of

⁵ Young 1975, 192.

⁶ Levine 1987.

⁷ Iron I = Hasanlu IVc: c. 1250-1050 BC; Iron II = Hasanlu IVb: c. 1050-800 BC; the chronology of Iron III, instead, remained the same Young proposed in 1985, thus coming to an end with the rise of the Achaemenid Empire (Danti 2013a; 2013b).

⁸ Iron Age IA = c. 1300/1250-1150 BC; Iron Age IB-IIA = c. 1150-950/900 BC; Iron Age IIB = c. 900-800/750 BC; Iron Age III = c. 800/750-650 BC (Overlaet 2013).

⁹ See e.g. Mousavi 2013; Alibaigi - Khosrawi 2014; Pollard *et al.* 2015.

¹⁰ Boucharlat 2005, 270-271; personal communication by R. Boucharlat (Dec. 2017).

comparisons to speculate about concepts as ‘impact’, ‘continuity/change’, ‘tradition/innovation’, ‘integration/interactions’, etc.¹¹

As already mentioned, differing significantly from the situation in other areas of Iran, both earlier and later Iron Age phases are rather scantily documented in South-eastern Iran. Hence, due to the overall paucity of the available evidence, it seems more advisable to discuss the issue of the ‘Achaemenid impact’ on this area making reference to case studies involving slightly better documented territories, i.e. Kerman Province and the Sistan region.

2. THE EVIDENCE FROM KERMAN PROVINCE

The key-site for the Iron Age in Kerman Province is presently Tepe Yahya (figs. 1-2). Tepe Yahya, located in the south-western corner of the Soghun Valley, was excavated by a team of Harvard University headed by C.C. Lamberg-Karlovsky between 1967 and 1975. It is by now the only site in south-eastern Iran providing substantial and well-dated archaeological evidence for a long period encompassing also the Early and Late Iron Age.¹² The earliest Iron Age remains at Tepe Yahya are represented by the evidence from Period III = c. 800-650 BC, after a hiatus of many centuries in the occupational sequence since the final Bronze Age phase at the site, which ended around 1400 BC.¹³ The «widespread decline in archaeologically visible settlement» at the end of the Bronze Age attested in all South-eastern Iran has been convincingly related to climate changes, which affected (to different extents) specific areas of the region.¹⁴ Architectural evidence from Period III at Tepe Yahya is represented by remains of two roughly square structures interpreted as ‘nondomestic’ buildings pertaining to a ‘village’.¹⁵ However, the most important Early Iron Age evidence at the site is represented by two mud-bricks platforms (only partially put into light by excavations) constructed sequentially during the ‘Platform Period’ = c. 650-500 BC, upon the remnants of the abandoned Period III buildings (apparently without any lengthy hiatus), likely to serve as «symbols of independence and autonomy within the landscape» in a moment shortly before the establishment of the Achaemenid power on the area.¹⁶ Judging from the architectural remains dated to the 5th and 4th century BC (Period IIa = c. 500-375 BC), instead, during full Achaemenid period Tepe Yahya was simply a rather small village and the construction of the platforms did not «usher in a period of monumental construction and imperial importance».¹⁷

A massive mud-brick platform was unearthed at Konar Sandal North (figs. 1-2), in the Halil Rud Basin (Jiroft District, Kerman Province) during the activities of the Jiroft Region Archaeological Project (directed by Y. Madjidzadeh in 2002-2008) and was interpreted by

¹¹ Several important works (both with a specifically archaeological or a more historically-oriented approach) should be cited in this respect. For brevity’s sake, one may mention only some of the monographs published in the last decade (e.g. Delemen 2007; Ivantchik - Licheli 2007; Briant - Chauveau eds. 2009; Curtis - Simpson eds. 2010; Nieling - Rehm 2010; Dusinberre 2013; Katchadourian 2016; Jacobs - Henkelman - Stolper 2017).

¹² Lamberg-Karlovsky - Magee 1999; Magee 2004.

¹³ Magee 2004, 75.

¹⁴ Magee 2004, 77-78; 2013, 494-495. See also fn. 45.

¹⁵ Lamberg-Karlovsky - Magee 1999, 42; Magee 2004, 78.

¹⁶ Magee 2004, 79.

¹⁷ Lamberg-Karlovsky - Magee 1999, 49-51.

its excavator as a monumental religious structure dated to the Bronze Age.¹⁸ But a recent series of radiocarbon analyses on organic materials from the site revealed dates ranging from the end of the 2nd millennium to the mid-1st millennium BC, that is in the Iron Age.¹⁹

Moreover, in the upper Halil Valley joint Iranian-Italian (ICAR: Iranian Center for Archaeological Research and ‘Sapienza’ University of Rome) survey activities were carried out in 2009, focusing on the site of Qaleh Kutcheh (Jiroft District; figs. 1-2) and directed on the field by A. Azadi, E. Ascalone and L. Peyronel.²⁰ On the basis of the preliminary study of the potsherds collected from the surface, the site was interpreted as a large and important settlement flourishing at least from *c.* 600 BC to the Achaemenid and Post-Achaemenid period (*c.* 600-200 BC); some traces also indicate a probable previous occupation (*c.* 800-600 BC) limited to the central and northern part of the site.²¹ The publication of the preliminary results reported the presence of also a widely plundered graveyard (Tepe Kenar Cheshmeh), located immediately east of the main mound and likely dated to the Achaemenid period.²²

Preliminary archaeological investigations carried out in the Zeh-Kalout area (figs. 1, 2), instead, at the western portion of the Jazmuriyan depression, in the south-eastern sector of Kerman Province (Rudbar District), yielded a significant amount of pottery possibly pertaining to the Achaemenid period.²³ Of remarkable interest are the pottery assemblages from Qal‘a-ye Soniya Gazbor, Sar Tepe Lakkoh and the cemeteries of Gavcharan I and II, Deh Jalal Mil-e Farhad, Moshtin I, and Pishok I. All of them find some morpho-typological parallels with ceramic assemblages dated to the 6th-4th century BCE from several excavated sites and surveyed areas in Iran as well as in neighbouring Countries.²⁴

The results of the first season of the recent joint Iranian-German (ICAR and Tübingen University) SOJAS (South-of-Jiroft Archaeological Survey) project, carried out in 2015 in the southern part of the Jiroft District (fig. 2), although mainly focused on the Bronze Age, revealed also evidence related to the Iron Age (SOJAS Period 15 = ‘Iron Age I-II’: *c.* 1200-550 BC; SOJAS Period 16 = ‘Iron Age III/Achaemenid’: *c.* 550-300 BC).²⁵ While only some potsherds from Period 15 were retrieved at the site of Hajjiabad-Varamin, two settlement ‘clusters’ (Bog Atashan 1-3; Tom-e Imam Hossein, Nurabad, Kuguyeh 1 and 3) were recorded in the surveyed area (all of them west of the Halil Rud) for Period 16 (fig. 3), and were interpreted as evidence for a «repopulation [...] during the Achaemenid period».²⁶

Hence, waiting for further evidence from stratigraphic excavations at well-dated Iron Age sites (or layers) in Kerman Province, the analysis by P. Magee²⁷ can be still retained as extremely influent in evaluating the consistency of the ‘Achaemenid impact’ on the area of Tepe Yahya in particular and on Kerman Province to a wider extent. In 2004, indeed, the

¹⁸ Madjidzadeh 2008, 88-89, fig. 20.

¹⁹ Mashkour *et al.* 2013, 228, tab. 1.

²⁰ Azadi - Ascalone - Peyronel 2012.

²¹ Azadi - Ascalone - Peyronel 2012, 286.

²² Azadi - Ascalone - Peyronel 2012, 280, 300, fig. 6.

²³ Sheikhabari *et al.* 2015, 24-29.

²⁴ Sheikhabari *et al.* 2015, tabs. 1-14.

²⁵ Pfälzner - Alidadi Soleimani 2017, fig. 12.

²⁶ Pfälzner - Alidadi Soleimani 2017, 120, 131, figs. 28-29.

²⁷ Magee 2004, 79-81.

scholar tried to evaluate the significance of «two main alterations in the archaeological record [...] roughly contemporary with the establishment of the Achaemenid Empire» at Tepe Yahya during Period II.²⁸ The ‘alterations’ discussed were the increased presence of significant quantities of highly standardized ‘Achaemenid tulip bowls’²⁹ and the contemporary increased production (and trade) of fine ‘Burnished Maroon Slipped Ware’ (BMSW) bowls.³⁰ Partially following E.R.M. Dusinberre, who had already considered ‘tulip bowls’ (at Sardis) as part of ‘non-élite emulation’ of ‘élite’ (i.e. ‘courtly Persian’ or directly involving Persian administrators) banqueting habits/rituals in which silver or gold vessels were used,³¹ Magee considered the ‘tulip bowls’ at Tepe Yahya more as evidence for ‘emulated courtly practices’ than as evidence for an actual Achaemenid presence at the site.³²

The evidence concerning BMSW bowls, on the other hand, was taken into account especially in the light of commercial and cultural contacts between Tepe Yahya and south-eastern Arabia. According to archaeometric analyses, indeed, many iron artefacts and BMSW bowls frequently attested at sites or cemeteries in South-eastern Arabia were originally produced in the area around Tepe Yahya or at Tepe Yahya itself during Yahya Period II and were subsequently exported as luxury commodities with a rather evident function of status symbols. Hence, during Period II, at the same time when the ‘internal’ tendency to ‘emulate’ Achaemenid élite behaviours was testified by the increased presence of ‘tulip bowls’, Tepe Yahya played a major ‘external’ role in influencing and ‘orienting’ the material manifestations of the socio-cultural and socio-economic status of neighbouring communities in its turn. For this reason, as far as the ‘Achaemenid impact’ is concerned, Magee stated that although «the region [...] of Tepe Yahya may have reshaped social practices and, possibly, even its local economy with the pressure of centralized Achaemenid control» it was engaged in a considerable trade system with neighbouring regions, preserving a noticeable «degree of economic autonomy from the imperial center».³³

3. THE EVIDENCE FROM SISTAN

Differing considerably from the archaeological attestations in Kerman Province, the area of Sistan is characterised by the nearly total absence of archaeological evidence from the centuries immediately prior to the establishment of the Achaemenid political control over that territory. If one excludes the problematic case of the Sorkh Dagh at Nad-i Ali, in Afghan Sistan (Nimruz Province),³⁴ and also, in the same sector (figs. 1, 4), the evidence

²⁸ Magee 2004, 80.

²⁹ Magee 2004, 65, fig. 5.37.

³⁰ Magee 2004, 65, figs. 5.34-5.36, 5.39-5.42.

³¹ Dusinberre 1999, 101.

³² Magee 2004, 80.

³³ Magee 2004, 81.

³⁴ The Sorkh Dagh (‘Red Mound’) at Nad-i Ali was investigated by several scholars between 1938 and 1968. According to the first excavator, the site flourished between the 8th century BC and the Achaemenid period (Ghirshman 1942). On the basis of his excavations in the late 1960s, G.F. Dales proposed instead, a chronology ranging from the 8th-7th century BC until the Hellenistic and Sasanian periods (Dales 1977). Some decades later, however, the chronology of the site was quite radically put in discussion and the monumental platform was dated to the second half of the 3rd millennium BCE (Besenval - Francfort 1994).

from the Sar-o-Tar plain (where three sites possibly dated to c. 1300-750 BC were detected³⁵ during the activities of the Helmand-Sistan Project),³⁶ literally nothing is known in Iranian Sistan (Sistan and Baluchestan Province) for the period encompassed between the collapse of the famous Bronze Age urban settlement of Shahr-i Sokhta³⁷ (figs. 1, 4) and the emergence of Dahane-ye Gholaman (figs. 1, 4) between the end of the 6th and the beginning of the 5th century BC. Even the results of recent survey activities seem to indicate a total *vacuum* of archaeological evidence from the Early Iron Age in the area.³⁸

On the contrary, settlement, architectural and ceramic attestations concerning the Late Iron Age/Achaemenid period are rather significantly documented in Sistan since several decades. This is especially exemplified by the evidence brought to light at Dahane-ye Gholaman (about 30 kilometres southeast of Zabol; figs. 1, 4) by the Italian IsMEO archaeological mission (directed by U. Scerrato) in the 1960s and 1970s³⁹ as well as, more recently, by the Iranian Cultural Heritage, Handicrafts and Tourism Organization (ICHHTO) archaeological mission (directed by S.M.S. Sajjadi) between 2000 and 2006⁴⁰ and, moreover, by results of geophysical prospections sponsored by ICHHTO and ICAR (directed by K. Mohammadkhani) between 2008 and 2012.⁴¹ These activities yielded evidence for a consistent number of monumental as well as public buildings dated to the Achaemenid period, together with a huge ceramic assemblage still under a more in-depth study.⁴²

In southern Sistan, in addition, at least 103 sites to be possibly dated to the aforementioned period were detected during a recent survey of the area (fig. 5), revealing a pottery production akin to the one attested at several other Achaemenid-period sites in Iran and neighbouring Countries.⁴³

Hence, the archaeological picture of Sistan during the 6th-4th centuries BC would seem clear enough to infer that the substantial evidence breaking the previous centuries' documentary silence would definitely testify the impetus of the 'Achaemenid impact' on the area. It would seem undeniable that the outstanding evidence from Dahane-ye Gholaman - likely founded in the late 6th century BC and revealing rather strong ties with the heartland of the Achaemenid Empire (especially as far as architectural layouts are concerned) - as well as the emergence of more than one hundred possible Achaemenid-period sites in southern Sistan after centuries of apparently total settlement *vacuum*, could

³⁵ Whitney 2006, 29-30, fig. 18.

³⁶ The Helmand-Sistan Project (1971-1979) was the result a cooperation between the Smithsonian Institution and the Afghan Directorate of Archaeology. The American scientific coordinator was W.B. Trousdale (former Curator of Anthropology, National Museum of Natural History, Smithsonian Institution). The results remain largely unpublished, but the efforts towards their publication have been recently resumed by Trousdale and M. Allen with the support of the Smithsonian Institution (personal communication by M. Allen, Oct. 2017).

³⁷ Period IV-Phase 1: c. 2200-2000 BC and Period IV-Phase 0: c. 1950-1650 BC (Salvatori - Tosi 2005, 288-290).

³⁸ Musavi Haji - Mehrafarin 2008; Mehrafarin - Musavi Haji 2010; 2016, 43; Mehrafarin 2016, 5, 7.

³⁹ See especially Scerrato 1962; 1966a; 1966b; 1979; Genito 1986; 2012.

⁴⁰ See especially Sajjadi 2004; 2007; Sajjadi - Saber Moghaddam 2003; 2004; Sajjadi - Casanova 2006.

⁴¹ Mohammadkhani 2012.

⁴² Genito 1990; Maresca 2010; Mehrafarin - Zehbari - Musavi Haji 2013; Zehbari - Mehrafarin 2014; Zehbari - Mehrafarin - Musavi Haji - Alizadeh 2014; Zehbari - Mehrafarin - Musavi Haji 2015a; 2015b.

⁴³ Mehrafarin 2016; Mehrafarin - Musavi Haji 2016; Alayi Moqaddam - Musavi Haji - Mehrafarin 2016.

be definitely retained as a clear indication of this process. Thus, according to this assumption, the establishment of the Achaemenid political control on the region would have acted as a boosting factor for a noticeable intensification of cultural processes, much more than elsewhere in South-eastern Iran.

Under closer scrutiny, nevertheless, this apparently undisputable inference can be questioned: can the *ex-novo* foundation of Dahane-ye Gholaman (with its chronological issues still open to some debate),⁴⁴ complemented by the evidence represented by a hundred of possibly Achaemenid-period sites in Southern Sistan, to be explicitly interpreted as a direct consequence of the ‘Achaemenid impact’ on the area? More specifically, are the outstanding urban layout of Dahane-ye Gholaman and the rather striking flowering of dozens of allegedly Achaemenid-period sites in southern Sistan to be unequivocally understood as the outcome of a breakthrough in the economic, demographic and socio-cultural phenomena consequent to the establishment of the political power of the Achaemenid dynasty over that area?

In giving an answer to these questions, it seems wise to underline that the overall perception of the archaeological evidence pertaining to the 6th-4th centuries BC in Iranian Sistan is by now significantly influenced by the total lack of data from previous centuries, possibly acting as a benchmark to test the aforementioned assumption and to formulate alternative hypotheses. Actually, there is not absolute certainty that the impression of an ‘Achaemenid impact’ on Sistan is not merely the effect of an increased visibility in the archaeological records of sites dated around the 6th-4th century BC. Since ‘absence of evidence is not evidence of absence’, the ‘absence of data’ from the Early Iron Age in Iranian Sistan might be more cautiously considered as a mere ‘absence of data visibility’ on the terrain more than representing an actual lack of evidence.⁴⁵

For these reasons, it would be advisable to avoid as much as possible the temptation to interpret data concerning the Achaemenid period in Sistan in the light of what we presently know about the Early Iron Age in the area and, consequently, to infer an ‘Achaemenid impact’ on it. Likely, Sistan played an important role in the political sphere of the Achaemenid Empire, but the actual extent of the cultural influence exercised by the Achaemenid dynastic power on the region is still far from being evaluable with certainty.

⁴⁴ On the basis of architectural issues, of the pottery evidence, of the typology of the arrowheads and of the sigillographic evidence retrieved at the site (Scerrato 1966a, 464-465, fn. 18; 1974, 111), Dahane-ye Gholaman was dated by its first excavator to a rather short time span, between the 6th and the 5th century BC (Scerrato 1966a, 467; 1966b, 11), possibly stretching into the 4th century BC (Scerrato 1979, 709). Still in the absence of any radiometric dating, instead, the reported presence within the pottery assemblage of ‘fishplates’ of Hellenistic tradition, led some scholars to consider also a later chronology for the site (Zehbari - Mehrafarin - Musavi Haji 2015a, 255).

⁴⁵ Two main hypotheses can be put forward to explain this ‘gap’: radical climatic and, consequently, socio-economic changes at the end of the Bronze Age which may have significantly affected cultural developments, population and settlement dynamics in the area, shifting the settlement model from ‘urban’ towards ‘non-urbanised’ schemes (thus making Early Iron Age evidences more ‘inconsistent’ and ‘intangible’); peculiar hydrological and geo-morphological features (flooding, Aeolian processes) that may have physically wiped out or completely hidden every supposed archaeological trace of the centuries encompassed between the Late Bronze Age and the Early Iron Age.

REFERENCES⁴⁶

- ALAYI MOQADDAM, J. - MUSAVI HAJI, S.R. - MEHRAFARIN, R.
 2016 Dar Jostoju-ye Evergethā: *Moʼāla ʿāt-e Bāstānshenāsi* 5 (1395/2016), pp. 113-132 (in Persian).
- ALIBAIGI, S. - KHOSRAWI, SH.
 2014 Some Socio-Economic Evidence from Iron Age Societies of the Iranian Central Plateau: *Iran LII* (2014), pp. 53-64.
- AZADI, A. - ASCALONE, E. - PEYRONEL, L.
 2012 The First Season (2009) of Archaeological Research by the Iranian-Italian Joint Expedition at Qaleh Kutcheh, Halil Valley (Jiroft, Kerman Province, SE Iran): R. MATTHEWS - J. CURTIS (eds.), *Proceedings of the 7th International Congress on the Archaeology of the Ancient Near East*, 3, Wiesbaden 2012, pp. 277-302.
- BESENVAL, R. - FRANCFORT, H.-P.
 1994 The Nad-i Ali 'Surkh Dagh': A Bronze Age Monumental Platform in Central Asia?: J.M. KENOYER (ed.), *From Sumer to Meluhha: Contributions to the Archaeology of South and West Asia in Memory of George F. Dales, Jr.* (Wisconsin Archaeological Reports 3), Madison 1994, pp. 3-14.
- BRIANT, P. - CHAUVEAU, M. (eds.)
 2009 *Organisation des pouvoirs et contacts culturels dans les pays de l'empire achéménide* (Persika 14), Paris 2009.
- BOUCHARLAT, R.
 2005 Iran: P. BRIANT - R. BOUCHARLAT (eds.), *L'archéologie de l'empire achéménide: nouvelles recherches* (Persika 6), Paris 2005, pp. 221-292.
- CURTIS, J. - SIMPSON, ST.J. (eds.)
 2010 *The World of Achaemenid Persia. History, Art and Society in Iran and the Ancient Near East*, London - New York 2010.
- DALES, G.F.
 1977 *New Excavations at Nad-i Ali (Sorkh Dagh), Afghanistan* (Center for South and Southeast Asian Studies, University of California, Research Monograph 16), Berkeley 1977.
- DANTI, M.D.
 2013a The Late Bronze Age and the Early Iron Age in Northwestern Iran: D.T. POTTS (ed.), *The Oxford Handbook of Ancient Iran*, Oxford 2013, pp. 327-376.
 2013b *Hasanlu V: The Late Bronze and Iron I Periods*, Philadelphia 2013.
- DELEMEN, İ. (ed.)
 2007 *The Achaemenid Impact on Local Populations and Cultures in Anatolia (Sixth-Fourth Centuries B.C.)*, Istanbul 2007.
- DUSINBERRE, E.R.M.
 1999 Satrapal Sardis: Achaemenid Bowls in an Achaemenid Capital: *American Journal of Archaeology* 103 (1999), pp. 73-102.
 2013 *Empire, Authority, and Autonomy in Achaemenid Anatolia*, Cambridge 2013.
- DYSON, R.H.
 1965 Problems of Protohistoric Iran as Seen from Hasanlu: *Journal of Near Eastern Studies* 24 (1965), pp. 193-217.
- GENITO, B.
 1986 Dahan-i Ghulaman: una città achemenide tra centro e periferia dell'impero: *Oriens Antiquus* 25 (1986), pp. 287-317.

⁴⁶ Works written in Persian are transliterated according to the system adopted by the *Encyclopædia Iranica*.

- 1990 The Most Frequent Pottery Types at Dahān-e Gholāmān (Sistan) and Their Spatial Variability: M. TADDEI - P. CALLIERI (eds.), *South Asian Archaeology 1987. Proceedings of the Ninth International Conference of the Association of South Asian Archaeologists in Western Europe*, 2, Roma 1990, pp. 587-604.
- 2012 An 'Achaemenid' Capital of the Imperial Periphery: Zrānka/Drangiana/Sistan: G.P. BASELLO - A.V. ROSSI (eds.), *Dariosh Studies II. Persepolis and its Settlements: Territorial System and Ideology in the Achaemenid State* (Università degli Studi di Napoli 'L'Orientale' and ISMEO, Series Minor LXXVIII), Napoli 2012, pp. 365-386.
- GHIRSHMAN, R.
1942 Recherches Préhistoriques en Afghanistan. Fouilles de Nad-i Ali dans le Seistan Afghan: *Revue des Arts Asiatiques* XIII (1942), pp. 10-22.
- IVANTCHIK, A. - LICHELI, V. (eds.)
2007 *Achaemenid Culture and Local Traditions in Anatolia, Southern Caucasus and Iran. New Discoveries*, Leiden 2007.
- JACOBS, B. - HENKELMAN, W.F.M. - STOLPER, M.W. (eds.)
2017 *Die Verwaltung im Achämenidenreich. Imperiale Muster und Strukturen* (Classica et Orientalia 17), Wiesbaden 2017.
- KATCHADOURIAN, L.
2016 *Imperial Matter. Ancient Persia and the Archaeology of Empire*, Oakland 2016.
- LAMBERG-KARLOVSKY, C.C. - MAGEE, P.
1999 The Iron Age Platforms at Tepe Yahya: *Iranica Antiqua* XXXIV (1999), pp. 41-52.
- LEVINE, L.D.
1987 The Iron Age: F. HOLE (ed.), *The Archaeology of Western Iran. Settlement and Society from Prehistory to the Islamic Conquest*, London 1987.
- MADJIDZADEH, Y.
2008 Excavations at Konar Sandal in the Region of Jiroft in the Halil Basin: First Preliminary Report (2002-2008): *Iran* XLVI (2008), pp. 69-103.
- MAGEE, P.
2004 *Excavations at Tepe Yahya, Iran, 1967-1975. The Iron Age Settlement* (American School of Prehistoric Research, Bulletin 46), Cambridge 2004.
- 2013 Iron Age Southeastern Iran: D.T. POTTS (ed.), *The Oxford Handbook of Ancient Iran*, Oxford 2013, pp. 493-499.
- MARESCA, G.
2010 Reconsidering the Pottery from Dahān-i Ghulāmān (Iran, Sistān - 6th century BC): Some Preliminary Production-related Typological Observations: P. MATTHIAE - F. PINNOCK - L. NIGRO - N. MARCHETTI - L. ROMANO (eds.), *Proceedings of the 6th International Congress on the Archaeology of Ancient Near East*, I, Wiesbaden 2010, pp. 423-442.
- MASHKOUR, M. - TENGBERG, M. - SHIRAZI, Z. - MADJIDZADEH, Y.
2013 Bio-Archaeological Studies at Konar Sandal, Halil Rud Basin, Southeastern Iran: *Journal of Environmental Archaeology* 18 (2013), pp. 222-246.
- MEHRAFARIN, R.
2016 Alexander the Great: in the Realm of Evergetæ; *Mediterranean Archaeology & Archeometry* 16 (2016), pp. 1-8.
- MEHRAFARIN, R. - MUSAVI HAJI, S.R.
2010 Barrasi-ye Bāstānshenāsi-ye Sistān, Fāz-e Dovvom: *Report Prepared for the Cultural Heritage, Handicrafts and Tourism Organization of Iran, Tehran* (1389/2010) (in Persian).
- 2016 Hōwza-ye Gerdi, Koleksiun-e Bāstānshenāsi-ye Sistān: *Majalla-ye Jostārḥā-ye Bāstānshenāsi-ye Irān piš az Eslām* 1 (1394/2016), pp. 37-46 (in Persian).

- MEHRAFARIN, R. - ZEHBARI, Z. - MUSAVI HAJI, S.R.
 2013 Barham-konešhā-ye Farhangi-ye Zranka bā Sātrāpihā-ye Šarqi-ye Emprāturi-ye Haḥāmaneši bā Estenād ba Šan'at-e Sofālgari: *Fašlnāma-ye Moṭāla'āt-e Šeba Qārā* 14 (1392/2013), pp. 131-154 (in Persian).
- MOHAMMADKHANI, K.
 2012 Une nouvelle construction monumentale achéménide à Dahaneh-e Gholaman, Sistan, Iran: *ARTA* 2012.001, pp. 1-18.
- MOUSAVI, A.
 2013 The Central Alborz Region in the Iron Age: D.T. POTTS (ed.), *The Oxford Handbook of Ancient Iran*, Oxford 2013, pp. 392-406.
- MUSAVI HAJI S.R. - MEHRAFARIN, R.
 2008 Barrasi-ye Bāstānšenāsi-ye Sistān, Fāz-e Avval: *Report Prepared for the Cultural Heritage, Handicrafts and Tourism Organization of Iran, Tehran (1389/2010)* (in Persian).
- MUTIN, B.
 2013 Ceramic Traditions and Interactions on the South-Eastern Iranian Plateau during the Fourth Millennium BC: C.A. PETRIE (ed.), *Ancient Iran and Its Neighbours: Local Developments and Long-Range Interactions in the 4th Millennium BC* (BIPS Archaeological Monographs Series III), Oxford 2013, pp. 253-275.
- MUTIN, B. - MORADI, H. - SARHADDI-DADIAN, H. - FAZELI NASHLI, H. - SOLTANI, M.
 2017 New Discoveries in the Bampur Valley (South-Eastern Iran) and Their Implications for the Understanding of Settlement Pattern in the Indo-Iranian Borderlands During the Chalcolithic Period: *Iran LV* (2017), pp. 99-119.
- NIELING, J. - REHM, E. (eds.)
 2010 *Achaemenid Impact in the Black Sea. Communication of Powers* (Black Sea Studies 11), Aarhus 2010.
- OVERLAET, B.
 2013 Luristan during the Iron Age: D.T. POTTS (ed.), *The Oxford Handbook of Ancient Iran*, Oxford 2013, pp. 377-391.
- PETRIE, C.A.
 2013 The Chalcolithic in Southern Iran: D.T. POTTS (ed.), *The Oxford Handbook of Ancient Iran*, Oxford 2013, pp. 120-158.
- PFÄLZNER, P. - ALIDADI SOLEIMANI, N.
 2017 The ICAR - University of Tübingen South-of-Jiroft Archaeological Survey (SOJAS). Results of the first season 2015: *Archäologische Mitteilungen aus Iran und Turan* 47 (2017), pp. 105-141.
- PITTMAN, H.
 2013 Eastern Iran in the Early Bronze Age: D.T. POTTS (ed.), *The Oxford Handbook of Ancient Iran*, Oxford 2013, pp. 304-324.
- POLLARD, M. - FAZELI NASHLI, H. - DAVOUDI, H. - SARLAK, S. - HELWING, B. - SAEEDI ANARAKI, F.
 2015 A New Radiocarbon Chronology for the North Central Plateau of Iran from the Late Neolithic to the Iron Age: *Archäologische Mitteilungen aus Iran und Turan* 45 (2015), pp. 27-50.
- SAJJADI, S.M.S.
 2004 Sistan and Baluchistan Project: *Iran XLII* (2004), pp. 247-250.
 2007 Wall Painting from Dahaneh-ye Gholaman (Sistan): *Ancient Civilization from Scythia to Siberia* 13 (2007), pp. 129-154.

- SAJJADI, S.M.S. - SABER MOGHADDAM, F.
 2003 Seh Taşvir-e Dowra-ye Haḥāmaneši az Dahāna-ye Ğolāmān: *Nāma-ye Pažuhešgāh-e Mirāt-e Farhangī* 2 (1382/2003), pp. 11-25 (in Persian).
- 2004 Peintures et gravures murales découvertes à Dahan-e Gholāmān, Sistān: *Studia Iranica* 33 (2004), pp. 285-296.
- SAJJADI, S.M.S. - CASANOVA, M.
 2006 Sistan and Baluchistan Project 2005/2006: *Iran XLIV* (2006), pp. 347-357.
- SALVATORI, S. - TOSI, M.
 2005 Shahr-i Sokhta Revised Sequence: C. JARRIGE - V. LEFEVRE (eds.), *South Asian Archaeology 2001*, Paris 2005, pp. 281-292.
- SCERRATO, U.
 1962 A Probable Achaemenid Zone in Persian Sistan: *East and West* 13 (1962), pp. 186-197.
 1966a L'edificio sacro di Dahan-i Ghulaman (Sistan): *Atti del Convegno sul Tema: la Persia e il Mondo Greco-romano (Roma, 11-14 aprile 1965)* (Accademia Nazionale dei Lincei, Quaderno 76), Roma 1966, pp. 457-477.
 1966b Excavations at Dahan-i Ghulaman (Seistan-Iran), First Preliminary Report (1962-1963): *East and West* 16 (1966), pp. 9-30.
 1979 Evidence of Religious Life at Dahan-e Ghulaman, Sistan: M. TADDEI (ed.), *South Asian Archaeology 1977* (Istituto Universitario Orientale, Series Minor VI), 2, Napoli 1979, pp. 709-735.
- SHEIKHAKBARI, S. - SARHADDI-DADIAN, H. - AMIRHAJLOO, S. - DANESHI, A.
 2015 Comparative Study of Pottery Industry in Zeh-Klout Historical Period in Rudbar-Kerman with Its Neighbouring Cultures Based on the New Archaeological Evidences: *International Journal of Archaeology* 3 (2015), pp. 22-32.
- WEEKS, L.
 2016 Iran and the Bronze Age Metal Trade in the Persian Gulf: *International Journal of the Society of Iranian Archaeologists* 2 (2016), pp. 13-25.
- WHITNEY, J.W.
 2006 *Geology, Water, and Wind in the Lower Helmand Basin, Southern Afghanistan* (U.S. Geological Survey Report 2006-5182), Reston 2006.
- YOUNG, T.C.
 1965 A Comparative Ceramic Chronology for Western Iran, 1500-500: *Iran III* (1965), pp. 53-85.
 1975 Kangavar Valley Survey: *Iran XIII* (1975), pp. 191-193.
 1985 Early Iron Age Iran Revisited: Preliminary Suggestions for the Re-Analysis of Old Constructs: J.-L. HUOT - M. YON - Y. CALVET (eds.), *De l'Indus aux Balkans: recueil à la mémoire de Jean Deshayes*, Paris 1985, pp. 361-378.
- ZEBHARI, Z. - MEHRAFARIN, R.
 2014 Moṭāla'a-ye Taṭbiqi-ye Šan'at-e Sofālgari-ye Šarq-e Irān bā Ḥowza-ye Fārs dar Dowra-ye Haḥāmaneši (Nemuna-ye Mowredi: Moḥavveṭa-ye Dahāna-ye Ğolāmān): *Moṭāla'āt-e Honar-e Bumi* 1 (1393/2014), pp. 25-38 (in Persian).
- ZEBHARI, Z. - MEHRAFARIN, R. - MUSAVI HAJI, S.R.
 2015a Studies on the Structural Characteristics of Achaemenid Pottery from Dahan-e Gholaman: *Ancient Near Eastern Studies* 52 (2015), pp. 217-259.
 2015b Mo'arrefi-ye Livānhā-ye Bumi-ye Moḥavveṭa-ye Haḥāmaneši-ye Dahāna-ye Ğolāmān: *Majalla-ye Payām-e Bāstānšenās* 22 (1393/2015), pp. 57-77 (in Persian).

- ZEHBARI, Z. - MEHRAFARIN, R. - MUSAVI HAJI, S.R. - ALIZADEH, F.
2014 Moṭāla‘a-ye Taṭbiqī-ye Ṣan‘at-e Sofālgari-ye Šahr-e Dahāna-ye Ğolāmān bā Manāteq-e Ğarbi-ye Šāhanšāhi-ye Haḥāmaneši: M.H. AZIZI KHARANAGHI - M. KANIPOUR - R. NAZERI - K.A. NIKNAMI (eds.), *Proceedings of the International Conference of Young Archaeologists*, Tehran 1393/2014, pp. 367-378 (in Persian).

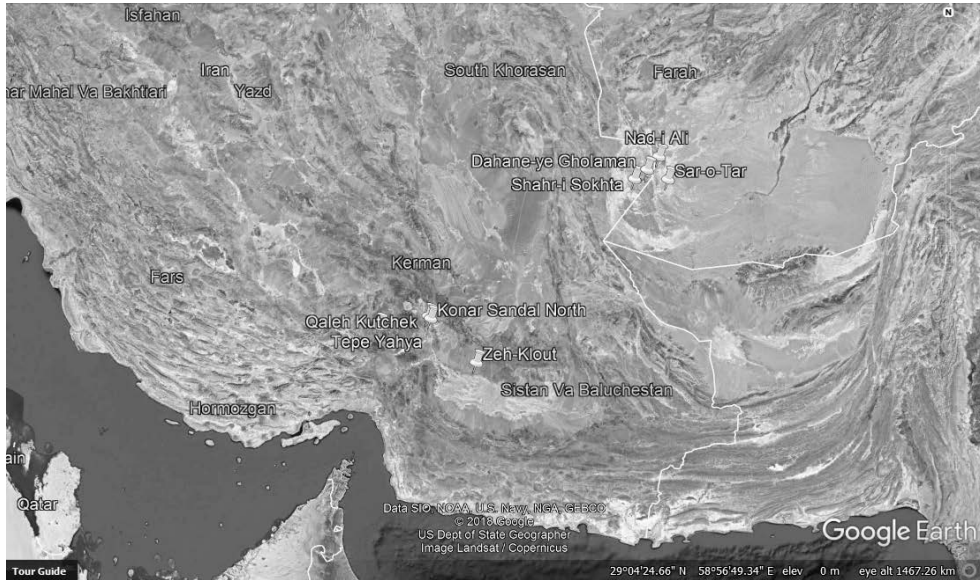


Fig. 1 - Map showing the location of the archaeological sites discussed in the text (satellite view after Google Earth™).



Fig. 2 - Map showing the location of the archaeological sites in Kerman Province discussed in the text (satellite view after Google Earth™).

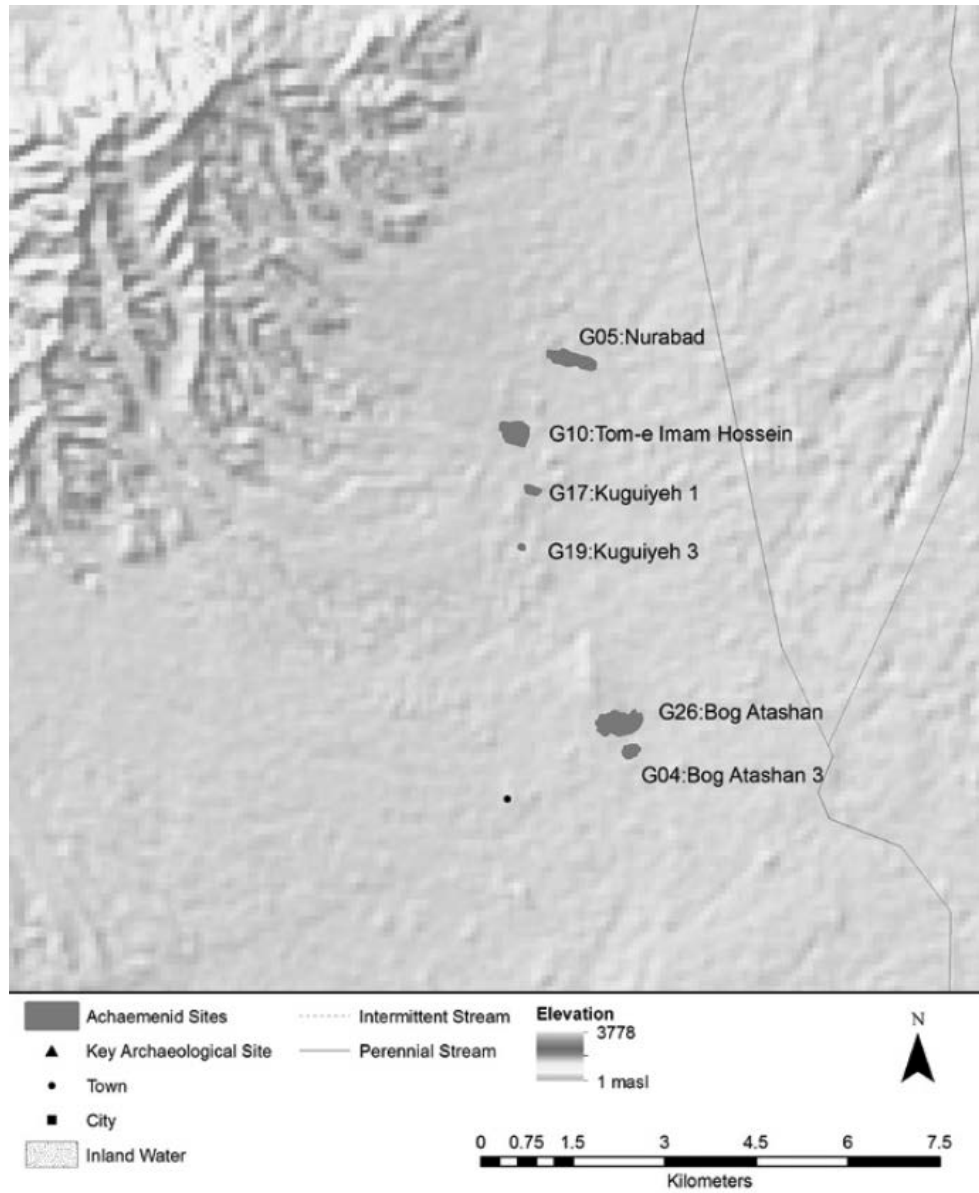


Fig. 3 - Map showing the location of the Achaemenid-period settlements recorded by SOJAS (South-of-Jiroft Archaeological Survey) project (after Pfälzner - Alidadi Soleimani 2017, fig. 28).

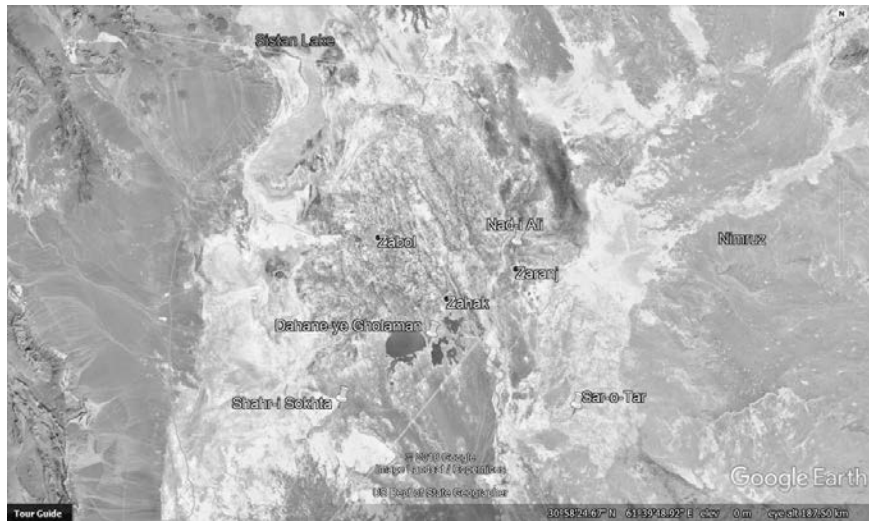


Fig. 4 - Map showing the location of the archaeological sites in Sistan (Sistan and Baluchistan Province) discussed in the text (satellite view after Google Earth™).

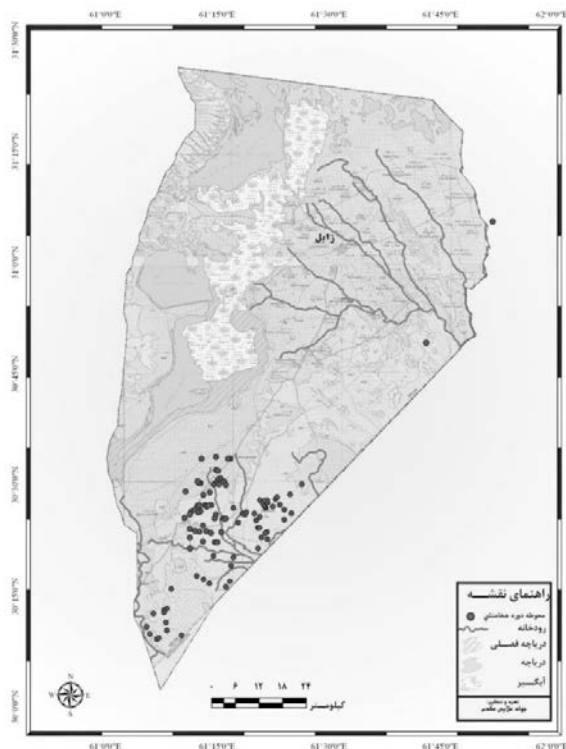


Fig. 5 - Map showing sites in Southern Sistan possibly dated to the Achaemenid period (after Mehrafarin 2016, fig. 2).