Elam and its Neighbors

Recent Research and New Perspectives.

Proceedings of the International Congress Held at Johannes
Gutenberg University Mainz,
September 21-23, 2016

Editors
Behzad Mofidi-Nasrabadi,

Doris Prechel, Alexander Pruß

Elam and its Neighbors
Recent Research and New Perspectives.
Proceedings of the International Congress Held at
Johannes Gutenberg University Mainz, September 21-23, 2016

Editors Behzad Mofidi-Nasrabadi, Doris Prechel, Alexander Pruß

CONTENTS

II

PREFACE

The international congress "Elam and its Neighbors. Recent Research and New Perspectives", which forms the content of the present proceedings volume, was held at the Johannes Gutenberg University Mainz from September 21st - 23rd 2016. The idea to hold a congress originated from the recent excavations and fieldworks carried out in different Elamite sites. These new research activities yielded interesting archaeological, philological and historical results which offer new perspectives concerning Elamite studies. The aim of the congress was to provide an opportunity to discuss such new results in order to reflect the research strategy and create impulses for further studies in the future. I would like to thank the contributors for taking part in the discussion and I am very grateful to all lecturers who submitted their contributions to be published in this volume.

The Institutes of Ancient Near Eastern Studies of the University of Mainz funded the congress. My warmest thanks go to Doris Prechel and Alexander Pruß, who not only co-organized the congress, but also financed the publication of the proceedings. Moreover, I express my sincerest thanks to all students, faculty members and chairs for their support.

Behzad Mofidi-Nasrabadi

The Functions of Abrupt Spellings in the Elamite Writing System

Jan Tavernier[1]

Abstract

Broken spellings, i.e. spellings of the type CV_1-V_2C, are commonly known in Elamite. Especially frequent in the later stages of Elamite, they have no morphological impact whatsoever. This paper will have a look on another type of spellings, the so-called morphological spellings, regularly attested in all periods of Elamite linguistic history. It will be demonstrated that these spellings are deliberately used to mark the separation between root and morphological suffix.

1. Introduction

This contribution aims at discussing an aspect of the Elamite cuneiform writing system that was not that frequent in the Mesopotamian script: spellings of the type (C)VC-VC[2]. This does not imply that spellings of this type, which will henceforth be called "abrupt spellings", are frequently attested in Elamite, but in comparison with the Mesopotamian cuneiform script they are indeed more often used. They also occur in every period of the history of Elamite cuneiform.

When Justeson and Stephens (1994, 171) argue that the boundary between roots and affixes is sometimes spelled "abruptly" in Achaemenid Elamite, they refer to one possible function of such spellings. In the following study, the attestations and other functions of abrupt writings throughout Elamite linguistic history will be examined.

---

[1] Jan Tavernier, Université catholique de Louvain (jan.tavernier@kuleuven.be).

[2] Not simply all (C)VC-VC-spellings are abrupt. Most spellings where a CVn-sign is involved should not be included in this study since the phonological value of CVn-signs is rather /CV)/ than /CVn/, at least since the Middle Babylonian period (Harmatta, apud Mayrhofer 1973, 110-111). An exception is the theophorous element Hu(m)ban, written with the sign BAN and with °-ba-an, indicating that /n/ was really pronounced.

2.   Abrupt Spellings

2.1 Old Elamite Period[3]

The source material for the Old Elamite period can be divided in three categories: genuine Elamite texts, Akkadian inscriptions of Susian kings and Akkadian administrative and legal texts from Susa.

2.1.1 Genuine Elamite Texts

In this type of texts, most of them being royal inscriptions, only four examples of abrupt writings in three forms are attested. One is a toponym [diš]Nu-ur-in-ga-ra (ZA 64 82 rev. ii' 24'; Siruktuh I), which is composed of Akkadian *nūr* "light" and a further unknown Elamite expression, most likely a divine or personal name[4]. If so, this proper name could be I(n)ka (attested as such in MDP 14 19 rev.16) followed by the classifier -*r*-. Here one can already trace a first function of abrupt spellings, i.e. to indicate the distinction between two components of a compound name.

A second form is haškli, attested by two spellings ha-áš-ak-li and ha-áš-ik-li ("May it be honoured"). With regard to these spellings, it is more complicated to determine the exact function of the abrupt spelling. *Hašikli* is an optative form of the 2nd conjugation 3rd person singular of the verb *haš*- "to keep in honour"[5]. The form is two times attested in the Naram-Sin Treaty and is spelled once ha-áš-ak-li (perhaps due to vowel harmony) and once ha-áš-ik-li. Both spellings clearly render a form *haškli*. Now two possibilities come in mind to justify the use of the abrupt spelling: either it was used to denote the consonantal cluster /škl/, or it was used to separate the root *haš*- from the verbal suffixes *k* and *li*. Both explanations can of course also be combined and in this case this is the most plausible solution.

Finally, the third form, *hišanri* (spelled hi-iš-an-ri, but also hi-ša-an-ri), is a substantivized active participle of a verb, whose meaning is not certain. König (1965, 146) translates "who makes shine", whereas Hinz/Koch (1987, 663) prefer "who makes famous". Anyhow, the form's construction remains strange, as the Elamite epenthetic supporting vowel is normally *i*. A form *hišinri* should therefore be expected. Nevertheless, a root *hiš*- is known from later periods and therefore the spelling is most probably also used morphologically.

---

[3] Three expressions (Ir-iš, nap-ir and nap-ir-ša [Hinz/Koch 1987, 774, 986, 988]) are written in Linear Elamite and will not be taken into account here, since this writing system is not yet fully deciphered.

[4] The hybrid Akkado-Elamite character of this name might suggest a localisation in the Mesopotamian-Elamite borderland, although Farber (1975, 85; also Vallat 1993, 201) rather believes that the places listed in the inscription must be situated on the Iranian plateau. Geopolitically seen, however, a localisation in the western borderlands is equally plausible. Note that in line 27 an Akkadian-Elamite toponym [diš]Nu-ur-wa-an-zu occurs. Wanzu is not attested in Elamite, but in an Old Elamite Akkadian text (MDP 28 538:6) a proper name Ia-an-zu-ma-ak is attested.

[5] Related to *haštu*- "to honour, venerate".

2.1.2 Akkadian Inscriptions of Susian Kings

In the Akkadian inscriptions of Susian kings only four expressions, all toponyms, have an abrupt writing: A-in-un-ak[ki], Hu-ut-in[ki], Iz-ad[ki] and Ut-in-šu-ut-gu-ri[ki]. The analysis of only A-in-un-ak[ki], i.e. A'in-Unak, "house of Unak" (cf. Hinz/Koch 1987, 37) looks secure. Interestingly, this name contains two abrupt spellings, one of which functions as separator of the two elements of the compound and one of which denotes a consonant cluster /nk/. The toponym Hu-ut-in[ki] could be derived from *hut-*, "to make" (cf. ME hu-ut-ta-an, NE hu-ut-tan, AE hu-ud-da-in). In that case, it would be a verbal form and the abrupt spelling would be a morphological one. Concerning Ut-in-šu-ut-gu-ri[ki] a transcription Ut-inšutguri[ki] is less likely since the first part (*ut*) would be rather short whereas the second one (*inšutkuri*) looks rather long.

2.1.3 Akkadian Administrative and Legal Texts from Susa

The greater part of the abrupt writings attested in Old Elamite sources is found in the Akkadian administrative and legal texts from Susa. In these texts many Elamite personal names[6] occur and it is therefore not surprising that all the abrupt writings are attested in personal names. Most of the 27 Elamite personal names with abrupt spellings can easily be analysed:

- Six names contain the element *sir-*, "grandfather": Si-ir-a-du-ur (Sir-atur), Si-ir-a-hu-bi-ti-ir (Sir-a-hupitir), Si-ir-a-ni (Sir-ani), Si-ir-ap-pi (Sir-appi), Si-ir-uk-duh (Sir-uktuh; also spelled Si-ir-uk-tuh) and Si-ir-ú-lul-uk (Sir-u-luluk).
- Five of them are composed with *kuk-*, "protection": Ku-uk-a-da-ar (Kuk-Atar; also spelled Ku-ka-[a]-da-ar), Ku-uk-i-na-ru-ut (Kuk-Inarut), Ku-uk-in-ma (Kuk-Inma), Ku-uk-in-su-uš-na-ak (Kuk-Inšušinak) and Ku-uk-in-zu (Kuk-Inzu).
- Of four names the first element is the divinity's name Simut: [d]Si-mu-ut-a-gu-un ([d]Simut-akun), [d]Si-mu-ut-ir-ha-pi-ru-h ([d]Simut-ir-hapiruh), [d]Si-mu-ut-ù-li-si-ni-ki ([d]Simut-uli-siniki) and [d]Si-mu-ut-um-me-en ([d]Simut-u-men; also spelled Si-mu-ut-um-mi-en-na)[7].
- Two names begin with the element *kun-*[8]: Ku-un-a-al-pi (Kun-alpi) and Ku-un-in-za-ki (Kun-Inzak).
- Two names end with the element *ahpi* "family, clan": Hu-ban-a-ah-pi (Hupan-ahpi) and Na-ap-a-ah-pi (Nap-ahpi).

---

[6] The discussion of parts of proper names is based on Zadok 1984 and Hinz/Koch 1987, unless otherwise indicated. Concerning some aspects there may be disagreement between these studies, but that does not affect the goals of the research conducted here.

[7] Scheil's reading (1930, 101) Si-mu-ut-el-ta-aš in MDP 22 87:16 must be discarded. Zadok reads (1977, 78). [d]Si-mu-ut-hal[ı]-ta-aš, but a new collation corroborates the reading Si-mu-ut-ar-ta-aš, which, however, stands for Si-mu-ut-<wa>-ar-ta-aš. Accordingly, there is no real abrupt spelling here.

[8] *Kun-* is probably related to *kuna-* and *kuni-*, according to Zadok (1984, 23) a theophoric element. Cf. infra.

- The name of the sukkalmaḫ Tan-Uli (16th century BC) is twice written Tan[an]-nu-li (MDP 23 177:rev.2, 206:29) and once Tan[an]-ni-Ú-li (MDP 24 353:41). The other spellings are Ta-an-nu-li (IrAnt 15 89; MDP 23 173:rev.17, 24 338:6, 28 416:29), Tan-ni-ú-li (MDP 23 247:17), Tan-nu-li (MDP 22 9:rev.6; MDP 23 173:rev.1, 186:2, 196:rev.5) and Tan-nu-Ú-li (MDP 23 178:11).

- Other clear names are A-pa-ku(?)-ri-tuk-iš[9] (Apakur-tukiš), Hu-ul-im(?)-ma-ri (Hul-immari), Ku-uš-a-pa-an (Kuš-apan), Pi-ir-i (Pir-i; Zadok 1983, 108) and Za-al-in-zu (Zal-Inzu)[10].

Two Elamite personal names withstand any structural analysis and accordingly the function of the abrupt spelling cannot be determined with certainty: Bi-ib-ir and Iš-ib-bi.

Finally, there is one abrupt spelling, which cannot be satisfactorily explained: in the name Si-ir-ú-lul-uk, the abrupt spelling lul-uk stands for *lulu-k*, the passive participle of a verbal stem *lulu-*, and does not seem to be the result of one of the aforementioned functions, unless a consonantal cluster is meant (/lulk/).

Next to the really Elamite names there are seven hybrid Elamite-Akkadian names which have an abrupt spelling. Three of them have the element *kuk* "protection": Ku-uk-e-li-gu-ne (Kuk-eligune), Ku-uk-e-li-mu-tum (Kuk-elimutum) and Ku-uk-[d]Iš-me-ka-ra-ab (Kuk-Išmekarāb). The other names are [d]Gul-a-zi-ir ([d]Gula-zir; a hybrid OE-Akk. name with the theonym Gula), Nu-úr-in-zu (Nūr-Inzu), [d]Si-mu-ut-a-bi ([d]Simut-abi) and Wa-tar-in-za-ak (Watar-Inzak; cf. Zadok 1984, 58).

The number of abrupt writings in pure Akkadian names, which make up the majority of personal names in the Old Babylonian texts from Susa, is significantly lower than the number of abrupt writings in Elamite and hybrid names. There are only six examples: Ḫatin-ibanni (spelled Ḫa-ti-in-i-ba-ni), Igmilanni (spelled Ig-mil-an-ni and Ig-mi-la-an-ni; also Igmilanni-Inšušinak), Iṣruranni (spelled Iṣ-ru-ur-an-ni), Puzur-abi (spelled Pu-zur-a-bi), Puzur-ili (spelled Pu-zur-ì-lí) and Rīb-iliʾat (spelled Ri-ib-ì-lí-at). Here the abrupt spellings are predominantly used to mark the boundary between the two components of a compound. Only in Igmilanni and Iṣruranni the abrupt spellings seem to be used for marking the distinction between root and suffixes (*igmil-anni, iṣrur-anni*). Note that the suffix chains in both names are identical.

There is also one noun attested with an abrupt spelling: te-pír[ir] (MDP 23 320: 11,rev.3 and passim in MDP 23 321-322), next to de-bi-ir, te-eb-bi-ir, te-ep-pi-ir and te-pír.

What can one draw from these data? First of all, abrupt writings are especially attested in documentary texts. The official texts, both Elamite and Akkadian ones, only have eight examples of forms with an abrupt writing, whereas the Akkadian documentary texts have 41 examples.

---

[9] Hinz (apud Moortgat-Correns 1968, 294-295) first reads A-pa-ba(?)-ri tuk-iš, considering Tuk-iš as the personal name ("wish") and A-pa-ba(?)-ri as a place name ("Tukiš the Apaparian"). Hinz/Koch (1987, 69), however, simply read A-pa-ku(?)-ri-tuk-iš as one personal name.

[10] The name Tal-lak-ar-te, read as such by Scheil (1908, 45) must be read Ri-ib-na-ar-te (Hinz/Koch 1987, 1038; De Graef 2012, 533 n.23). Pe-el-i-lu-lu(?)-ti (Pelu-lu-ti, cf. Zadok 1983, 107) is probably not an abrupt spelling, but merely an error for Pe-el/il-lu-lu-ti.

Secondly, especially scribes of Akkadian texts (i.e. Akkadian scribes or Elamite scribes fluent in Akkadian) make use of such spellings. Only four of the 49 Old Elamite examples come from texts drafted in the Elamite language. Admittedly, there are far more Akkadian than Elamite texts.

Thirdly, most of the abrupt writings occur in Elamite lexemes: 35 against 6 in Akkadian forms. There are also 8 hybrids. This implies that the Akkadian scribes only rarely used this feature in their renderings of Akkadian names[11]. Accordingly, the main function of the Old Elamite abrupt writings was to clarify the structure of a proper name or lexeme to scribes who were not familiar with the language the proper name or lexeme was written in, more precisely, to scribes who were not familiar with Elamite. This clarification of the structure can be done in two ways:

(1) Abrupt spelling to mark the boundary between the two elements of a compound name (only attested in proper names: 4 in Akkadian names, 7 in hybrid names and 24 in Elamite names).

(2) Morphological spellings: abrupt spelling to mark the boundary between root and suffix (2 in Akkadian names, 2 in Elamite proper names and three in an Elamite verbal form).

Two other functions must also be mentioned: the writing of a consonant cluster (probably *hašakli* /*hašikli*) and the indication of phonetic complements (Tan-Uli and *teppir*).

2.2 Middle Elamite Period

Royal inscriptions make up the majority of Middle Elamite texts. Especially Untaš-Napiriša, Šutruk-Nahhunte I and Šilhak-Inšušinak I produced many inscriptions. This explains the smaller number of personal names, which occur mainly in the two corpuses of Middle Elamite administrative texts: the Elamite texts from Tall-i Malyan (Anshan) that are dated to the very end of the Middle Elamite period (c. 1100 BCE) and the Akkadian administrative texts from Haft Tepe (ancient Kabnak)[12], dated to the Kidinuid dynasty (15th century BCE).

2.2.1 Middle Elamite Royal Inscriptions

The Middle Elamite official royal inscriptions have more examples of abrupt writing than their Old Elamite counterparts do. First of all, there are two personal names: ᵈHu-ban-um-me-en-na (Hupan-u-

---

[11] In fact, where a scribe is named in texts with abrupt spellings, they nearly all have an Akkadian name, e.g. Dam-qí-ia (MDP 23 257:16, 260:16, 266:16), I-ri-ib-Si-in (MDP 24 345:16), ᵈKAB.TA-na-ṣir (MDP 23 285 rev.13), ᵈMÙŠ.EREN-mu-ba-lí-iṭ (MDP 23 205:23), Nu-ri-ia, (MDP 24 324:15'', 341:34), Ri-ši-ia (MDP 24 353:39), Sin-ri-šu (MDP 22 56:23'). Elamite-named scribes are Ku-uk-in-zu (MDP 43 1769) and Si-ir-a-hu-bi-ti-ir (MDP 43 2327). Both are named in their seal inscriptions, but do not appear in this function in other texts (Morando, pers. comm. 17/02/2017).

[12] Including the so-called "Mālamīr Texts", whose provenience is most likely Haft Tepe (Reiner 1973, 97; Stolper 1987-90, 280; Potts 1999, 192). Glassner (1991, 115-117), however, does not accept this assumption.

mena; other abrupt spellings of this name are ^dHu-ban-um-me-na, Hu-um-ba-an-um-me-en-na, ^dHu-um-ban-um-me-en-na and ^{diš.d}Hu-um-ban-um-me-na) and Ši-ir-uk-du-uh (Šir-uktuh).

Two divine names should also be mentioned: ^dHu-ban-e-lu (Hupan-elu) and ^dŠa-ak-am-mar-ha-ni-iš-ta (Šak-ammar-haništa). Both are attested in inscriptions of Šilhak-Inšušinak I. In both cases the abrupt writing has the same function as in personal names.

Unfortunately, less certainty can be obtained regarding the two toponyms attested in the royal inscriptions, ^{aš}Pur-al-si-iš and ^{aš}Šá-mar-az-za. Nevertheless, it is likely that the former one can be analysed as Pur-alsiš, with *pur*(*u*) being some object and *alsiš* a verbal form of the third person singular (cf. Tavernier 2016). The second name is generally situated somewhere in Mesopotamia and analysed as Ša Marazza, a Semitic name. Nevertheless, it could also be an Elamite name composed of the elements *šamar* and *azza*. If the latter is right, then both toponyms use an abrupt spelling to mark the boundary between both elements of the compound word.

The other Middle Elamite examples from royal inscriptions nicely indicate that most Middle Elamite abrupt writings are in all likelihood morphological spellings. Abrupt spellings were regularly used to separate the morphological suffix from the root. Examples are:

(1) -e "his" (possessive pronoun): hi-it-e "his army", ki-it-ir-e "his *kitir*" and ku-ši-ik-e "her fledgling".

(2) -*imma*, "(made) of": a-ta-ar-im-ma "(made) of *atar*", ha-la-at-im-ma "(made) of clay", la-an-si-it-im-ma "(made) of gold" (also spelled la-an-si-it-ma and la-an-si-ti-im-ma) and ú-pa-at-im-ma "(made) of mudbricks" (also spelled ú-pa-at-ma).

(3) -n-r (Conj. III 3rd sg.): ha-at-an-ra "he tears down" (also spelled ha-at-ta-an-ra).

(4) -p (plural marker): ba-at-ip for /patip/ "feet" (also, but less frequently, spelled [ba-at-p]i-ip, ba-ti-ip and ba-ti-pi), ^{aš}Li-ia-an-ib-ba fir /Liyan(i)p/ "the people from Liyan" and ^{aš}Šu-še-en-ip for /Šušan(i)p/, "the Susians" (also spelled ^{aš}Šu-še-ni-ip and ^{aš}Šu-še-en-pi).

(5) -r (locutive sg.): Ka₄-ri-in-taš-ir-ra "the one from Karintaš", la-ha-ak-ir-ra "he who is hidden" (also spelled la-ha-ak-ra), ^{aš}Li-ia-an-ir-ra and ^{aš}Li-ia-an-ir-ru-me "the one from Liyan" (also spelled ^{aš}Li-ia-an-ra).

(6) -u, "me" (personal pronoun): ku-ši-ik-ú-be "those begotten by me".

(7) -ume and -uri, "my" (possessive pronoun): ha-li-ik-ú-me "my work" (frequently attested; cf. also three times ha-li-ku-me and once ha-li-ik-ku-me), hi-iš-ú-me/i(-ni) "my name" (also spelled hi-šu-me/mi), na-pír-ú-ri "my god", si-ia-an-ku-uk-si-ia-an-i-me "my *siyankuk*-temple") and si-ia-an-um-me-ma "in my temple".

2.2.2 Elamite Documentary Texts from Anshan

The second textual corpus, the Elamite administrative texts from ancient Anshan, do not have many abrupt spellings. In fact, only three of them are found. Two of them occur in personal names ([Ki-t]i-en-ak-sir [Kiten-aksir] and ^dŠi-mut-i-hi-šá-h [Simut-i-hišah]) and, as may be expected, serve to make

the distinction between two elements of a compound name. The last example, the anthroponym Ki-den[en]-na-ku [Kiten-nak-u], has an abrupt spelling to indicate a phonetic complement.

2.2.3 Akkadian Documentary Texts from Haft Tepe

Finally, the third group of texts, the Akkadian documentary texts of Haft Tepe, should be looked at. Here 15 personal names containing an abrupt writing are attested. Twelve of them are purely Elamite and, just like in the Old Elamite period, the abrupt writing serves as indicator of the boundary between the two (or more) elements of the compound name. Again, some elements occur more often[13]:

(1) Kuk: Ku-uk-am-ma-te-im-di-ir (Kuk-amma-Temtir), Ku-uk-in-di-ir-ki (Kuk-Intirki; IrAnt 28 [1993], 113 no. 188: 9; cf. Zadok 1995, 241-242 n. 2).

(2) Kuner[14]: Ku-ne-er-at-ta (Kuner-atta), Ku-ne-er-[d]In-šu-uš-[na-ak] (Kuner-Inšušinak; IrAnt 26 [1991], 41 no. 74: 12).

(3) Simut: [d]Si-mu-ut-un-[pa-ha-aš] (Simut-un-[pahaš]; IrAnt 26 [1991], 50 no. 91: 2), [d]Si-mu-ut-un-taš (Simut-un-taš; IrAnt 28 [1993], 125 no. 205: 12; cf. Zadok 1995, 241-242 n. 2).

(4) Tet (meaning unknown): Te-et-in-ha-am-ru-li-ri (Tet-in-hamru-liri), Te-et-un-pa-ha-aš (Tet-un-pahaš).

The other names are Ka-ar-in-ri-[ir] (Kar-inrir), [f]Ki-ri-ir-ú-me (Kirir-ume), [f]Mi-it-iz-zu-uš (Mit-izzuš) and [f]Si/Šu-ia-šu-um.am-ma (Siašum-amma).

In the three Elamite-Akkadian hybrid names, the abrupt spelling serves as indicator of the boundary between the Elamite and the Akkadian part of the name (as was also the case with regard to the Old Elamite hybrid names): [f]Ku-ne-er-iš-ḫa-ra ([f]Kuner-Išḫara), Ku-uk-al-la-at-tu (Kuk-Allatu) and Ku-uk-eš-ru-ú (Kuk-ešru). Again the same elements *kuner* and *kuk* appear.

Concerning the morphological spellings, one may argue that they could also simply render a consonantal cluster with geminated consonant. Ha-la-at-im-ma could be pronounced /halatmma/, ú-pa-at-im-ma would be /upatmma/, la-ha-ak-ir-ra would be /lahakrra/ and [aš]Li-ia-an-ir-ra would be /Liyanrra/. In any case should it be stressed that the uncertainty regarding the true characters of the Elamite consonants is not very helpful in studying such phenomena. It should also be noted that both functions (morphological spelling and denotation of a cluster) do not exclude each other.

In addition, this objection only works for some examples. The abrupt writings in hi-it-e, ki-ti-ir-e, ha-li-ik-ú-me, hi-iš-ú-me, ku-ši-ik-ú-be, na-pír-ú-ri and si-ia-an-ku-uk-si-ia-an-i-me cannot be interpreted as representing clusters. Even the examples with gemination are not certain, since variant

---

[13] The attestations of the names are to be found in Hinz/Koch 1987. Later attestations are mentioned between brackets.

[14] According to Zadok (1984, 23), Kuner is a divinity. Nevertheless, if this were true, Kuner-Inšušinak would be a dvandva-compound and this type of names is not often attested in Elamite onomastics. Hinz/Koch (1987, 514) translate *kuner* with "flatterer".

spellings without double consonant of these forms are attested: la-ha-ak-ra, ^{aš}Li-ia-an-ra, si-it-me, ú-pa-at-ma. This means (1) that in Elamite consonant doubling was not consistently indicated and (2) that the graphically geminated consonants may rather be a consequence of the scribe's wish to separate the suffix clearly from the stem. A spelling la-ha-ak-ra proves this: an Elamite reader seeing this spelling will probably not think that la-ha-ak-ra is written this way to indicate the stem-suffix boundary, while the same reader would analyse a spelling la-ha-ak-ir-ra as an indication of this boundary, rather than as an indication of consonant doubling and hence different pronunciation. In this way, variant spellings are a support for assuming a morphological function for the abrupt writings.

On the other hand, a clear example of the use of abrupt writings to render a cluster is ki-it-ir-ma-ah (a first singular of a verb *kitr-*), which renders /kitrmah/.

Three more Middle Elamite examples of abrupt writings are not fully clear: Ak-im, sir-a-aš "he weighed" and zi-it-im-ma[15]. The first one, Ak-im, is a proper name occurring in the texts from Tall-i Malyan, but withstanding any analysis. The second one is the third person of the root *sira-* and seemingly, the abrupt spelling has no clear function here. The third one, zi-it-im-ma, is actually *zitin.ma* with assimilation (Hinz/Koch 1987, 1294). Related spellings are si-it-me, zi-it-me and zi-ti-in. Possibly, the abrupt spelling is used here to separate the nominal suffix –n from the root *zit-*, but that is not certain.

2.3 Neo- and Achaemenid Elamite Periods

The nature of the source material from the Late Neo-Elamite and Achaemenid Elamite periods is on two points different from that of the previous periods. Firstly, all textual sources emanating from an Elamite or Elamo-Iranian cultural environment are written in Elamite. The Semitic component is only attested in four Akkadian texts that contextually rather belong to Mesopotamia. Secondly, the discovery of four administrative archives (Neo-Elamite: Susa Acropole Archive and Susa Apadana Archive; Achaemenid Elamite: Persepolis Fortification Archive, Persepolis Treasury Archive) and of various letters has made the number of documentary texts far larger than the number of royal inscriptions. Most abrupt spellings do occur in the documentary texts. Additionally, as both periods also show many similarities in their development of the writing system, they may be treated together.

For all these reasons, the discussion on abrupt writings in the Neo-Elamite and Achaemenid periods will be otherwise structured. The main criterion is now the function of the abrupt writing.

In comparison to the preceding periods, Neo- and Achaemenid Elamite texts contain many more abrupt spellings. The already mentioned functions of abrupt spellings are also attested in texts from these periods:

(1) The morphological abrupt spelling[16].
(2) The abrupt spellings as marker of the boundary between two components of a compound.

---

[15] The spelling ip-il-la-ti (Hinz/Koch 1987, 765) should be read É il-la-ti (Grillot, apud Steve 1992, 153).

[16] Neo-Babylonian too uses abrupt writings as indication of morpheme boundaries (Woodington 1982, 17).

(3) Abrupt spellings as denotation of clusters.

(4) Abrupt spellings as denotation of phonetic complements.

The type of abrupt spelling that is most often used is the morphological abrupt writing, occurring with most grammatical suffixes. Sometimes the suffix may be followed by another one, but the abrupt spelling is always situated at the border of the root and the suffix(es).

(1) -e "his, her" (possessive pronoun): Neo-El. gab-e, hi-iš-e (against hi-i-še and hi-še), ki-te-ni-ir-e and su-maš-e; Ach. El. mi-ul-e (against mi-ul-li and mi-ul-le-e) and ri-ut-e.

(2) -k (Conj. II or passive participle): Neo-El. be-el-ik, [^{gam}]Hu-ban-šutur-uk, šá-am-ik and tur-uk (also tu$_4$-ru-uk); Ach. El. i-ip-ik-ra, ku-ut-ik, ku-ut-ik-ka$_4$ (also ku-ut-ka$_4$), pi-ir-ik-ra, tal-iš, tal-iš-[d]a (also tal-li-iš and tal-li-iš-da, the usual writings), ul-ás-da and ul-iš-da (also ul-la-iš-da, the usual writing).

(3) -me (nominal suffix): šá-bar-rák-um-me (also written šá-bar-rák -me).

(4) -n (nominal suffix): Neo-El. [^{aš}A-a]-pír-en-ni, ap-in, ^{diš}Du-hi-ir-li-ik-in-na, ir-še(-ik)-ki-ip-in-na and Na-hu-ti-ir-in-na; Ach. El. ^{aš}A-a-pír-in-na, ki-bat-in-na (also written ki-bat-na) and ^{d}Um-ba-an-in-na.

(5) -p (plural marker): Neo-El. ^{aš}A-a-pír-ib-be, gìr-ip, ik-ib-be and ^{aš}Za-am-be-zak-ip; Ach. El. ^{aš}[H]ar-máš-ip, uk-ap, ik-ip-ra and ^{aš}zik-ki-qat-ap.

(6) -r (locutive sg.): Neo-El. ^{aš}An-za-an-ir-ra, ^{aš}Ba-nu-um-ir-ra-b[e-ra], du-ši-um-ir-ra (also written du-ši-um-ra), Gi-sa-at-ir-ra, ka$_4$-ti-um-ir-ra, si-pa-ak-ir-ra and šà-nu-im-ir-ra.

(7) -š (Conj. I 3rd sg. or pl.)[17]: Neo-El. ^{be}Hal-tam$_6$-iš, ^{diš}ha-tan-tuk-iš (pronounced /atantukš/) and li-ip-iš-da; Ach. El. ^{hal}A-tuk-iš (/Atukš/), ku-iz-iš-da, ma-ak-iš (also ma-ki-iš, the usual writing), ma-ak-iš-da, ma-ik-iš-da (also ma-ki-iš-da, the usual writing), ^{hal}Na-pu-mi-ir-iš and pa-ir-iš-da (also pa-ri-iš-da, the usual writing).

(8) -ume, -upe and -uri, "my" (possessive pronoun): Neo-El. hi-iš-ú-me, na-pír-ú-ri, ^{aš}Šu-hu-um-ú-be and taš-šu-ip-ú-mi.

The second function (compound-divider) is, compared to the earlier periods, less dominant, but still well attested. Expectedly, the great majority can be found in proper names, with Hupan as the most frequent element: Neo-El. ^{be}Hu-ban-a-h-pi (^{be}Hupan-ahpi), ^{be}Hu-ban-am-ba (^{be}Hupan-ampa), ^{be}Hu-ban-am-nu (^{be}Hupan-amnu), ^{be}Hu-ban-im-me(-en)-na (^{be}Hupan-mena; also ^{be}Hu-ban-um-me-na), ^{be}Hu-ban-uk-ra (^{be}Hupan-ukra), ^{diš}Hu-ban-un-taš (^{dišf}Hupan-un-taš), ^{aš}Kar-in-taš (Kar-intaš; also Ka$_4$-ri-in-taš), ^{be}Na-ab-a-h-pi (also ^{be}Na-ab-ba-h-pi; ^{be}Nap-ahpi), ^{be}Nap-ag-gi-tal-li (^{be}Nap-akkitalli), ^{be}Nap-in-na-sir (^{be}Nap-innasir), ^{be}Nap-in-ni-ni (^{be}Nap-innini), ^{aš}Si-in(?)-ik-ki (Sin-ikki), si-ir-a-hi-in (sir-ahin), ^{md}Ši-mut-ú-nu-kaš (^{md}Šimut-u-nukaš); Achaemenid El. Hu-ban-uk-ra (^{be}Hupan-ukra), ^{hal}Hu-ban-un-be-

---

[17] Possibly Neo-El. ^{Aš}har-iš-šá-el-be, a professional term, also belongs to this category. Cfr. A-hi-in-har-iš-da, mentioned below.

iš (halHupan-un-peš), halIz-at-taš (halIz-attaš[18]), dna-ap-ir-šá-ir-ra (dnap-iršarra), pír-uk-ku (pir-ukku; also pír-ru-uk-ku) and ašŠu-ma-ir-ak-ši (ašŠumar-akši; also ašŠu-mar-rák-še).

The third function, abrupt writings as markers of clusters, is also attested in texts from the Neo-Elamite and Achaemenid periods. It should be noted that originally the final consonants of some words may have been suffixes, but in this contexts the spellings also rendered the cluster: Neo-El. Am-iš (/amš/), har-ip (/arp/), hu-el-ip (/huelp/), giškar-ik (/kark/), beKar-ut (/Kart/), kur-ip (/kurp/), li-ul-ip (/lilp/), [ma]š-ip (/mašp/), pír-an-ni$_7$(?)-an (/pirnnan/), ašPír-iš-ti-ip (/Pirštip/), ri-du-el-ip (/ritu-elp/; also spelled ri-tú.hu-el-ip), beSir-ib-ba (/Sirppa/), šá-am-ir-tuk (/samrtik/; also šá-mar-tuk; cf. Hinz/Koch 1987, 1114), gišše-ir-it and gišše-ir-ut (/šert/; also še-ri-it; cf. Hinz/Koch 1987, 1149), ut-uk-ka$_4$-ka$_4$ (/utkkaka/) and zak-iš (/zakš/); Achaemenid El. [e?]-ul-áš-šip (/Eulšip/), ir-ip (/irp/), a variant spelling of the usual ir-pi, halNa-pír-iš(?)-ka$_4$ (/Napirška/), halTar-am-ti (/Tarmti/) and te-um-ip-te (/tempte/)[19].

This system is used especially in Achaemenid Elamite renderings of Old Iranian forms: halHa-ik-iš-ti-bar-ra (*Axštibara-; also halHa-kaš-ti-bar-ra; Tavernier 2007, 129 no. 4.2.2.221), halHa-ik-iš-ti-pír-na (*Axštifarnah-; Tavernier 2007, 129 no. 4.2.2.222), beMa-ak-iš-tur-ri and beMa-ik-iš-tar-ri-iš (*Uvaxštra-; Tavernier 2007, 21 no. 1.2.30), etc. Abrupt writings even appear in clusters of only two consonants, i.e. in a situation where they were not required: dišBa-ir-iš-šá (Pārsa-, Tavernier 2007, 375 no. 6.3.33), halBa-ka$_4$-bu-ik-iš-šá (*Bagabuxša-; also halBa-ka$_4$-bu-ik-šá and halBa-ka$_4$-bu-uk-šá; Tavernier 2007, 356 no. 6.2.11), halIa-áš-ud-da (*Yašta-, Tavernier 2007, 620 no. 8.2.1932), etc.
In this category, there are various abrupt spellings which at first sight seem to denote a cluster and certainly not a morphological spelling[20]. Yet it is possible that one is dealing here with "pseudo-morphological spellings". The scribes used these spellings in analogy with the morphological function of abrupt spellings: as a matter of fact the signs constituting the second part of the abrupt spellings, i.e. ID/T, IK, IP, IŠ and UD/T (albeit rarely), can all be used as grammatical suffixes to nouns or verbs. This may also be the explanation of the writings gi-ul-a-akmeš, ašKaš-in-ra (also spelled ašKa$_4$-áš-šá-an-ra), [beK]u-pu-ut-e and un-in.

Finally, Neo-Elamite and Achaemenid Elamite abrupt spellings also may function as indicators of phonetic complements: Examples are Neo-Elamite ašA-a-pírir-ra, [an]-nu-kurir-na, beBar-sìbib-be, li-manin-ri and mašáš and Achaemenid Elamite du-kašiš-da, ha-tinen, hu-ut-tašiš-da, na-sirir-na and pa-rášiš-da. Possibly mar-ir-ma also belongs to this category. Phonetic complements may alternatively also be written through a spelling CV-CVC, e.g. pa-rirás-da[21].

---

[18] Could this name be related to the Old Elamite Iz-adki?

[19] Scheil's reading dNir-ik (1907, 158), read dNer-gál by Hinz/Koch (1987, 996 and 1003), is correctly emendated by Steve (1988) to dHé-gal.

[20] The spelling ik-iš could be pronounced /ikš/, but unfortunately the reading is far from certain. The current reading ik-iš was proposed by Scheil (1904, 84), but rejected by König (1965, 171), who reads im x. Hinz/Koch (1987, 747) names both possibilities.

[21] More information on these phonetic complements can be found in Vallat 1989.

As is the case in the other phases of Elamite linguistic history, the Neo-Elamite and Achaemenid periods have also some problematic examples of abrupt spellings. These will be dealt with in the following section.

Only one Neo-Elamite example still defies any analysis: bar-iz. Since it appears in a broken context (2 i-pi-iš [kù.babbar^{meš}-na] bar-iz ^{be}Bar-ri[...]; MDP 9 269:6) it cannot be determined whether it is complete in its beginning.

In Achaemenid Elamite there are more examples requiring more study. First of all, attention should be drawn to three likely scribal errors: the particular writing in-ak-ka$_4$ is only attested once while variant spellings occur several times, so one may safely assume that it is probably the consequence of a scribal error for in-na-ak-ka$_4$. Another scribal error is to be found in na-sir-ik-na, which should be written na-sir-na (Hinz/Koch 1987, 994). Za-ir-pa-ik-um, the name of the Elamite second month, may be an error for the common spelling za-ir-pa-ki-um. It occurs three times in the Fortification Texts.

Secondly, some examples require an individual study. The first one is A-hi-in-har-iš-da, a hydronym. This name could be analysed as being composed of a-hi-in, "house" and har-iš-da. The latter might be a verbal form from a stem *har-*, in which case we are dealing with a morphological abrupt spelling. If not, then the scribe might have thought that *harišta* was a verbal form with a suffix *-išta*. This would explain the use of an abrupt spelling here, i.e. as a pseudo-morphological spelling. In that case, the main function of the abrupt spelling would be to indicate a cluster /A'in-haršta/.

The next example is ^{aš}An-in-za-an, in all likelihood a spelling of Anzan. The sign IN may be included to avoid possible confusion and a reading ^{ašd}In-za-an. Hinz/Koch (1987, 59) consider it to be a phonetic complement, but this is not likely.

Major difficulties are presented by ku-ut-kàl-ir-ra-[áš-da], ku-ut-kal-rák-ka$_4$ and ku-ut-ka$_4$-la-ir-rák-ki. The three spellings probably render /kutkalrašta/ and /kutkalrak/, which might mean that the abrupt spelling is a mere indication of a consonantal cluster /lr/. Yet also morphology could play its part, but to determine this one has to know the verbal stem behind these spellings. Bork (1912, 67) believes that *kutkala-* is the stem, while Hallock (1969, 704 and 719) considers *irra-*, "to take away" to be the verbal stem, while *kutkal-* is a substantive meaning "away". It is certain that a stem *kutkala-* must be a compound verb-base, such as *murta-* and *šalhupa-* (cf. Reiner 1969, 79). The explanation of the abrupt spelling depends on who is right. If Bork is right then it is a morphological spelling. If, on the contrary, Hallock is right, then it is a spelling denoting a cluster.

There is probably no cluster represented in the spellings of the toponym Naširma, with spellings ^{aš}Na-áš-ir-ma, ^{aš}Na-áš-šá-ir-ma and ^{aš}Na-áš-šá-ir-man-nu(-ip). Other explanations are either a pseudo-morphological spelling (less likely) or an abrupt spelling as an internal divider: Naš.irma.

Another Achaemenid example is ^{aš}Ra-ik-ut-ti-um for ^{aš}Rák-ka$_4$-tam$_6$-mu. Both forms could represent a spoken /Rak(a)timmu/ or /Rak(u)timmu/. The background of the abrupt spelling is not clear. Possibly it indicates the internal division of a compound or a cluster.

Finally, three spellings of Akkadian words in Neo- and Achaemenid Elamite contain an abrupt spelling: har-gal-um[22], ku-uk-in-nu-um[23] and šu-kur-um[24]. Despite the seductive character of such an assumption, one cannot accept beyond any doubt that the abrupt spelling is the result of the scribe's wish to separate the stem and the Akkadian nominative ending *-u-*. Of course such an explanation cannot be valid for ku-uk-in-nu-um.

Although in contemporary Akkadian mimation was not pronounced anymore, it is still visible in the Elamite forms. Most likely the end-*m* should be connected to other Neo-Elamite forms attested in the Susa Acropole Texts, which have the same ending *-m* (e.g. gal-lu-um, na-pír-ri-um, tam$_6$-ši-um, etc.; Tavernier 2011, 235). This end-*m* also occurs in Achaemenid Elamite renderings of Iranian words (e.g. bat-ti-kar-ra-um for **patikarā*, "sculptures" [acc. pl.]; kur-šá-am, kur-šá-um for Ir. **kr̥ša-*, a weight measure; Tavernier 2007, 35 no. 1.4.4.4 and 38 no. 1.4.11.1). The Achaemenid practice was probably adopted from the Neo-Elamite one, but this idea needs to be studied more profoundly.

3.   Conclusion

Abrupt spellings (spellings of the type (C)VC-VC) are more often attested in Elamite texts than in Akkadian ones and occur also more frequently in the later periods. In that sense, they have the same development as the so-called broken writings (spellings of the type CV_1-V_2C). Contrary to the broken writings, however, the abrupt spellings are already regularly attested in the Old and Middle Elamite periods.

The four functions that have been identified for this type of spellings were already used in the Old Elamite period and remained in use in all other stages of Elamite linguistic history. They are

(1) Distinguishing two parts of a compound. Especially used in proper names.
(2) Distinguishing the root and its suffixes (the morphological function).
(3) Indication of consonant clusters.
(4) Indication of a phonetic complement (especially in the later periods).

It must be noted that some of the abrupt writings may of course combine two of these functions. If so, the functions combined are always the indication of consonant clusters and morphological spellings: ha-áš-ak-li and ha-áš-ik-li (Old Elamite), la-ha-ak-ir-ra and ^{aš}Li-ia-an-ir-ra (Middle Elamite), ^{diš}ha-tan-tuk-iš (Neo-Elamite), etc.

---

[22] Akk. *ḫargullu*, "locking ring" (one time attested in a Neo-Elamite administrative text).

[23] Akk. *gegunnu*, "raised temple"; other Elamite spellings are gu-gu-un-nu-um, ku-ku-nu-um, ku-ku-un-na-a, ku-ku-un-na-am, ku-ku-un-nu-um and ku-ku-un-nu-ú-um. The word is attested from the Middle Elamite period onwards.

[24] Akk. *šukurru*, "spear"; other spellings are šu-kur-ru-um and šu-ku-ur-ru-um The word is attested from the Middle Elamite period onwards.

The importance of abrupt spellings should not be underestimated. In some cases, they may help the modern scholar in his or her analysis of unclear forms, especially in their quality as boundary marker or as morphological spelling. Examples can be the two Middle Elamite toponyms discussed above and the appellative ^{diš}ha-tan-tuk-iš, which is likely to be composed of *hatan* and *tukš*, a verbal form.

To end this study with, a note on the name of Cyrus should be added. As already discussed in earlier publications (Tavernier 2007, 528-530; Id. 2011, 211-212, with literature; Id. 2015, 469), it is my opinion that the royal name of Cyrus is an Elamite name Kura-š, meaning "He bestowed care". This name appears in Neo-Elamite as [K]u-ráš and Kur-ráš, whereas in Achaemenid Elamite the name is always spelled Ku-ráš. Nonetheless, the Elamite spellings are not that interesting here, as the name was clear to the Elamite scribes. Rather the Babylonian spellings are of interest here and reveal an additional argument in favour of an Elamite etymology of this name. In Babylonian[25], the name is, among others, written Kur-áš or Kur-áš. In my opinion, the Babylonian scribes used this spelling to clarify the structure of this for them not indigenous and therefore not clear anthroponym. The function of the abrupt spelling here is to indicate that *-š* is the Elamite 3rd person verbal suffix. In this sense, such usage is completely in correspondence with what the Akkadian scribes did with Elamite names in the Old Elamite period. The abrupt spelling thus gives support to the "Elamiteness" of this royal name.

Bibliography

Bork, F.

1912   Review of Weissbach 1911, OLZ 15, 63-69.

De Graef, K.

2012   Dual Power in Susa: Chronicle of a transitional period from Ur III via Šimaški to the Sukkalmas, BSOAS 75, 525-546.

Farber, W.

1975   Eine elamische Inschrift aus der 1. Hälfte des 2. Jarhtausends, ZA 64, 74-86.

Glassner, J.-J.

1991   Les textes de Haft Tépé, la Susiane et l'Élam au 2ème millenaire, in: Mésopotamie et Élam. Actes de la XXXVIème Rencontre Assyriologique Internationale, Gand, 10-14 juillet 1989, Mesopotamian History and Environment. Occasional Publications 1, Gent, 109-126.

Hallock, R. T.

1969   Persepolis Fortification Tablets, OIP 92, Chicago.

---

[25] Already one time in an Ur III text, the spelling Kùr-áš is attested (cf. Zadok 1994, 33).

Hinz, W./Koch, H.

1987   Elamisches Wörterbuch. AMI. Erg. 17, Berlin.

Justeson, J. S./Stephens, L. D.

1994   Variation and change in symbol systems: case studies in Elamite cuneiform, in: C. Renfrew/E.B.W. Zubrow (eds.), The Ancient Mind: Elements of cognitive archaeology. New Directions in Archaeology, New York, 167-175.

König, F. W.

1965   Die elamischen Königsinschriften, AfO. Beih. 16, Graz.

Mayrhofer, M.

1973,   Onomastica Persepolitana: das altiranische Namengut der Persepolis-Täfelchen, SÖAW 286, Wien.

Moortgat-Correns, U.

1968   Die ehemalige Rollsiegel-Sammlung Erwin Oppenländer, BaM 4, 233-297.

Potts, D. T.

1999   The Archaeology of Elam: Formation and Transformation of an ancient Iranian State, Cambridge World Archaeology, Cambridge.

Reiner, E.

1969   The Elamite Language, in: Altkleinasiatische Sprachen, HdO I/2/1-2/2, Leiden, 54-118.

1973   Inscription from a Royal Elamite Tomb, AfO 24, 87-102.

Scheil, V.

1904   Textes élamites - sémitiques. Deuxième série, MDP 4, Paris.

1907   Textes élamites - anzanites. Troisième série, MDP 9, Paris.

1908   Textes élamites - sémitiques. Quatrième série, MDP 10, Paris.

1930   Actes juridiques susiens, MDP 22, Paris.

Steve, M.-J.

1988   Elamite gìr – šab/p$_6$, NABU 1988/22.

1992   Syllabaire élamite, histoire et paléographie, CPOP 1, Neuchâtel.

Stolper, M. W.

1987-90   Mālamīr. B. Philologisch, RlA 7, 276-281.

Tavernier, J.

2007   Iranica in the Achaemenid period (ca. 550-330 B.C.). Lexicon of Old Iranian Proper Names and Loanwords, Attested in Non-Iranian Texts, OLA 158, Leuven.

2011   Iranians in Neo-Elamite Texts, in: J. Álvarez-Mon/M.B. Garrison (eds.), Elam and Persia, Winona Lake, 191-261.

2015   Review of R. Schmitt, Iranisches Personannamenbuch. Band V: Iranische Namen in Nebenüberlieferungen indogermanischen Sprachen. Faszikel 5A: Iranische Personennamen in der griechischen Literatur vor Alexander d. Gr., SÖAW 823/Iranische Onomastik 9, Wien, 2011, AfO 53, 468-470.

2016   Two toponyms with abrupt spellings in Middle Elamite inscriptions, Res Antiquae 13, 281-284.

Vallat, F.

1989   Les compléments phonétiques ou graphiques en élamite achéménide, AION 49, 219-222.

1993   Les noms géographiques des sources suso-élamites, RGTC 11, Wiesbaden.

Woodington, N. R.

1982   A Grammar of the Neo-Babylonian Letters of the Kuyunjik Collection, Ann Arbor.

Zadok, R.

1977   Review of W. Hinz, Neue Wege im Altpersischen, GOF. Ir. 1, Wiesbaden, 1973, BiOr 34, 76-80.

1983   A Tentative Structural Analysis of Elamite Hypocoristica, BNF N.F. 18, 93-120.

1984   The Elamite Onomasticon, AION Supplementi 40, Napoli.

1994   Elamites and Other Peoples from Iran and the Persian Gulf Region in Early Mesopotamian Sources, Iran 32, 31-51.

1995   On the current State of Elamite Lexicography, SEL 12, 241-252.