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The writing culture of ancient Dadān: A description and quantitative analysis of linguistic variation

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
Title: The writing culture of ancient Dadān: A description and quantitative analysis of linguistic variation

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Chapter 4 - Orthography and Phonology

As already mentioned in Chapter 2 - Script and manners of inscribing, the Dadanitic script is made up of 28 glyphs each representing a separate phoneme, except for s^l which came to represent both $*s^1$ and $*s^3$. Their merger probably does not only reflect the merging of the signs in the script, but also the phonological situation. Since there are no transcriptions of Dadanitic language into other scripts,¹⁰² it is difficult to tell for sure how each glyph was pronounced, and whether some glyphs merged in script but not in pronunciation. However, based on the shapes of the letters, Macdonald has argued that the earliest form of the ANA script probably did not have a sign for the interdental \underline{d} . He shows that the \underline{d} sign used in Dadanitic looks like an adaptation of the z sign, while other scripts have found other solutions to deal with this ‘missing’ glyph, creating a variety of signs representing \underline{d} in the various ANA scripts (Macdonald 2000, 43).

Table 29 Dadanitic \underline{d} , probably derived from z

	Dadanitic
\underline{d}	
z	

If gaps in the phonology of the language the script was used to represent could be filled by creating new ones, like the \underline{d} , it would seem unlikely this would not have happened for other ‘missing’ phonemes. It is possible that the Dadanitic alphabet developed using a language with a different phoneme inventory than Dadanitic, but we have no attestations of such use of the script. Moreover, based on comparative evidence it is not unlikely to find a language that only merged $/s^1/$ and $/s^3/$. Compare Arabic for example.

The fact that most glyphs were consistently kept apart suggests that they also remained separate phonemes in the spoken language of the oasis. An exception to this is $*z$, which is occasionally written with t (see § 4.6.3 $z > t$).

Following the considerations outlined in the methodological discussion in Chapter 1 - Introduction this chapter will provide an outline of the orthographic conventions and its implications for the vocalization of the inscriptions, followed by a discussion of the observable sound changes and problematic consonants.

4.1 Word dividers

There are several ANA scripts that use word dividers,¹⁰³ but only monumental Dadanitic uses them consistently (Macdonald 2008, 186). They are also “commonly, though not consistently” employed in Dadanitic graffiti (Macdonald 2008, 186). Of the 1969 Dadanitic inscriptions in the OCIANA database, 975 inscriptions contain word dividers.¹⁰⁴ These include longer dedicatory inscriptions on rock face (e.g. U 102bis; U 063; U 056), graffiti solely containing personal names (e.g. U114; JSLih 268; U 078), inscriptions on prepared surfaces, such as blocks and columns (e.g. AH 202; AH 209; AH 215), and inscriptions in relief (AH 204; AH 218; JSLih 052).

¹⁰² Such inscriptions are available, for example, of Safaitic in Greek script (e.g. Al-Jallad and al-Manaser 2016, 58–59).

¹⁰³ Taymanitic, Dumaitic (of which only three inscriptions are attested) also make use of word dividers (Macdonald 2008, 186). They also occasionally occur in Thamudic C (see Stokes 2016, 35).

¹⁰⁴ OCIANA database, accessed 18–10–2017.

Word dividers are usually employed to separate every lexeme in the inscription even in genitive constructions.¹⁰⁵

U 050 *s¹my/bn/tlǵl // 'zll/l-dǵbt*
'*s¹my son of tlǵl performed the zll for dǵbt*'

While certain proclitic elements can be attached to the following word.

U 108 *brd/s¹lm//dǵbt'z//ll/l-dǵbt //b-khl/b'd //d-kn/l-h/b-y//r/f-rd-h[]w ' //tb-h¹⁰⁶*
'*Brd s¹lmdǵbt performed the zll ceremony for dǵbt at khl on behalf of that which was his at yr so may he favor him and reward him*'

Word dividers are used somewhat irregularly at the end of lines, they are generally not written in that position, but the end of the line does not automatically indicate the end of a word; it is possible to end a line in the middle of a word and continue it on the next. AH 001 shows how 'zllw is written across two lines, while the personal name *gffh* and the noun *h-nq* end exactly at the end of the line in U 037, U 120 is an example of a word divider employed at the end of a line to separate the last word of the line from the first in the next.

AH 001 *bn[w]d/w-whb`m/w- //wd/w-lb`n/bnw//s¹'d`l/d-yf`n/'z//llw/zll/h-nq/l-//dǵbt/f-rd-hm*
'*bn[w]d and whb`m and `wd and lb`n sons of s¹'d of the tribe of yf`n performed the zll ceremony of the nq for dǵbt so please them*'

U 037 *'rs²/bn //zdlh/w //bn-h/gffh //fyw/ h-nq //l-dǵbt*
'*rs² son of zdlh and his son gffh accomplished the nq for dǵbt*'

U 120 *'bd`bdh//bn/bħmh //l-dǵbt*
'*bd`bdh son of bħmh, for dǵbt*'

There are some examples where the word divider was clearly placed in the wrong position.

U 018 *f r/d//y-h/w s¹'d-h/w `h//rt-h/*
'*So may he favor him and aid him and his posterity*'

4.2 *Matres lectionis*

Scholars have identified three *matres lectiones* employed in Dadanitic: *-h*, *-w* and *-y* (Drewes 1985, 167–68, followed by Farès-Drappeau 2005, 62–63). Even though there seems to be clear evidence for the use of *-h* for *-ā* and *-w* for *-ū*, the evidence for the use of *-y* for *-ī* or *-ē* in Dadanitic is less clear cut (Macdonald 2008, 186).

4.2.1 Final *-h*

Evidence for the use of *-h* as a *mater lectionis* for *-ā* comes from the dual verb in the SC (see § 5.1.3 Dual) (Drewes 1985, 168; Farès-Drappeau 2005, 62); one example of the dual *-h* in the nominative case (see § 6.2.2 Plural and dual forms); and the difference between the spelling of relative *mh* in

¹⁰⁵ Compare Taymanitic in which there is never a word divider between *b* 'son of' and the following personal name in genealogies (Kootstra 2016, 71).

¹⁰⁶ Note that even though the word dividers are used as expected in most of this text, the word divider between *f-rd-h w-`tb-h* was omitted in this inscription. The inscription was pounded onto a rock face in not very regularly formed letters and does not seem to be the work of a professional mason.

proclitic, or independent position (Drewes 1985, 168). There are also several personal names attested in which *-h* seems to represent *-ā* (Drewes 1985, 168).¹⁰⁷

4.2.1.1 On verbs

The representation of *-ā* with *-h* is attested on what seem to be dual verbs in the SC (Drewes 1985, 168).

U 019 *rhz/bn/tḥmh/w//`mt`zh/s`lḥt//dḡbt/`zlh/h-zll//l-dḡbt/b-khl/b`d/ml-hm/b-bdr/f rd-hm//w `hrt-hm*
 ‘*rhz* sn of *tḥmh* and ‘*mt`zh*, priestess of *dḡbt* **performed (du)** the *zll* ceremony for *dḡbt* at *khl* on behalf of their (pl.) property at *bdr* so may he favor them (pl.) and their (pl.) posterity’

Since there are clearly two dedicants, it seems that ‘*zll-h* represents a dual verb here, with *-h* representing *-ā*. The suffixed personal pronouns in the inscription are all plural *-hm*, which seems to be a mistake (see § 7.1.2.1.3.1 Agreement). A dual verb seems to fit the inscription better than assuming that ‘*zll-h* represents a feminine singular verb with a sporadic *-at* > *-ah* shift (see Overlaet, Macdonald, and Stein (2016, n. 23) and § 5.1.2 3FS), as this would have to account for both disagreement between the verb and its subject, and rest on the assumption that the sporadic sound change *-at* to *-ah* operated in the language of this inscription.¹⁰⁸ There is one inscription attested with full dual agreement throughout the text (AH 199).

AH 199 *s`mwh/bnt/s`mr/s`lḥt/w//d/w zyd/b`l-h/d- yf`n//`zllh/l-dḡbt/h-zll/b-h-mš//d/f rd-hmy/w s`d-hmy w*
 ‘*s`mwh* daughter of *s`mr* priestess of Wadd and *zyd* her husband of the lineage of *yf`n* **performed the zll** for *dḡbt* at the sanctuary so may he favor them (both) and aid them (both) and...’

Despite the variation in the use of the dual in the rest of the corpus, the interpretation of AH 199 is fairly certain.

4.2.1.2 Nominative dual

Even though the ending *-y* was generally leveled for all forms of the dual (see § 6.2.2 Plural and dual forms), there is one inscription that seems to use a nominative form of the dual *bnh* /*banā*/.

Nasif 1988: *d/ms`yh/w bd/bnh/tm`l//`zlw/h-zll/l-dḡbt*
99, pl. CLVIII ‘*d ms`yh* and *bd* **two sons** of *tm`l*, they performed the *zll* ceremony’

4.2.1.3 Relative mh

There are two examples of a relative *mh*. The final *-h* may represent the etymological consonant in this form (compare Ugaritic *mh* (Tropper 2000, 239), CAr. *mahmā*¹⁰⁹).

¹⁰⁷ If the interpretation of *lwh* as /*liwā*/ ‘sandy depression’ in Graf Abū al-Ḍibā‘ 1 is correct, this would be another example of the mater *-h*. Note, however, that the expected reflex of **liway* would be *lwy* in Dadanitic see § 4.2.3 Final *-y*.

¹⁰⁸ See Al-Jallad, commentary OCIANA on U 026 and compare *bnh* in JSLih 384, which seems to represent a third person feminine singular verb in the SC: */*banat*/ > /*banah*/ (Overlaet, Macdonald, and Stein 2016, n. 23). It has also been argued that it represents a third person masculine singular verb in the SC /*banā*/ in which the final triphthong /*aya*/ has collapsed to /*ā*/ (Macdonald 2000, 50).

¹⁰⁹ And possibly Hebrew *mā* (< **mah*) (Suchard 2016a, 93).

- JSLih 077** *wdyw/nfs¹/mr/bn/hwt/m{h}*¹¹⁰//¹hd/¹l-hmy/hrg/
 ‘They placed the funerary monument of *mr* son of *hwt* according to **what** had been taken out on them as a loan’
- JSLih 064** *b¹ls¹mn/¹hrm/h-qrt /mn/mh/trq-h/mr¹t /l-bhny/hn-¹fkl*
 ‘*b¹ls¹mn* protected the village from **what** the woman of *bhny*, the priestess, had conjured’

Note that both examples of *mh* with the *-h* represented, occur in word final position. In JSLih 064 this is clear from the word divider following *mh*; in JSLih 077 *mh* occurs at the end of the line and is not followed by a word divider, it is not unusual, however, for word dividers to be left out at line breaks in Dadanitic, although it is possible to continue a word across lines (see § 4.1 Word dividers).

In word internal position, however, relative *m(h)* is consistently attested without the *-h* (Drewes 1985, 168).¹¹¹

- U 059** *ly/m-kn/l-h*
 ‘on behalf of that which was his’
- AH 125** *l-m-kn/l-h*
 ‘On behalf of that which was his’
- U 044** *b¹d/m//kn/l-hm/b-bdr*
 ‘on behalf of that which was theirs at *bdr*’

The position of the word dividers in U 059 and AH 125 clearly shows that *m(h)* is considered to form an orthographic unit with the following verb *kn* in this expression. This may indicate that the consonantal *-h* was lost in proclitic position in this phrase. It could also be taken as additional evidence that *-h* was purely a *mater lectionis* in the independent form /mā/, which would not be represented word internally /mākān(a) lah(u)/ (Drewes 1985, 168), compare CAr. which shows the opposite distribution, in which the *h* continued to be represented in word internal position *mahmā* while it was lost in the independent form *mā*, due to the loss of *-h* in word final position. If this interpretation is correct, this suggests that in Dadanitic the consonantal *-h* was lost in all forms of *m(h)* and only remained orthographically represented as a *mater lectionis* in the independent form of *mh*. The latter interpretation would have as an additional benefit that it can help us understand the environment in which the *mater lectionis -h* for *-ā#* developed. If original *-ah#* shifted to *-ā* in Dadanitic after the orthography had been fixed, then all *-h#*’s came to represent *-ā* in pronunciation, which could then spread as an orthographic device to other environments such as the dual verbal endings.

4.2.1.4 Evidence from personal names

There are several personal names in which *-h* clearly represents *-ā*.; *mt¹zh* (U 019) (Drewes 1985, 168) and *mktbh* (AH 078).¹¹² The theophoric elements of the first two names come from feminine

¹¹⁰ The tip of the *-h* is missing, so only a triangle is visible, but it is difficult to see how this could have represented anything but *h*.

¹¹¹ It is unlikely that these examples should be read as the noun *mkn* /makān/ ‘place’. Possession is generally indicated with an enclitic pronoun on a noun (***mkn-h* ‘his place’), and would not be expected to be expressed with a preposition (I would like to thank Ahmad Al-Jallad (pc.) for this insight). Moreover, when we compare this phrase to some variant forms, it seems that the dedications were being made on behalf of property in general and when a specific place was mentioned the local toponym was used, compare: *b¹d//d- kn/l-h/b- y//r* ‘on behalf of what was his at *yr*’ (U 108); *b//¹d/ml/kn/[l-]/h/b-bdr* ‘on behalf of property that was his at *bdr*’ (AH 120).

elatives */kutbay/ and */'uzzay/ respectively. The only way in which *-h* could have replaced *-y* in the orthography is if the final diphthongs collapsed to a long vowel *-ā* or *-ē*, which became orthographically represented by *-h* in Dadanitic. The language internal evidence for the use of *-h* for *-ā* supports an interpretation *-ā* rather than *-ē* in these personal names.

4.2.2 Final *-w*

The clearest example of the use of *-w* as a *mater lectionis* for *-ū* comes from the third person masculine plural verbs in the suffix conjugation (Drewes 1985, 170). To give a complete overview of the data, final-*w* verbs and relevant nouns and personal names with *-w* will also be discussed.

4.2.2.1 Verbs

4.2.2.1.1 3M PL SC

Final *-w* was used to represent *-ū* on 3rd person masculine plural verbs in the suffix conjugation.

Müller, D.H. 1889: 63-64, no. 8	<i>bnyw</i> ¹¹³	they built
U 088	' <i>gww</i> ¹¹⁴	they dedicated
Al-Ḥuraybah 11	<i>f'lw</i>	they made
U 023	{ <i>g</i> } <i>rs</i> ¹ <i>w</i>	they planted
AH 197	<i>hggw</i> ¹¹⁵	they made the pilgrimage
AH 197	<i>hḡnyw</i>	they dedicated (lit. make rich)
JSLih 049	<i>hwdqw</i>	they dedicated
Al-Ḥuraybah 09	<i>qrbw</i> ¹¹⁶	they offered
e.g. AH 235	' <i>zlw</i>	they performed the <i>zll</i>

The consistent representation of final weak consonants in the 3M PL SC verbs, as opposed to the 3FS SC verbs in which the third root consonant *y* is almost¹¹⁷ never represented suggests a different phonological environment in each. This probably confirms the vocalic nature of the 3M PL suffix */-ū/* and suggests that while */ayū/* and */awū/* was maintained, */ayat/#* collapsed to */ayt/*, */ēt/*, */āt/* or */at/*.

bny (e.g. AH 208; AH 234; JaL 006) but *bnt* (Al-‘Uḡayb 043)

'*fy* (e.h. U 004; U 031; U 035) but '*ft* (AH 051; U 005)

Alternatively it could be argued that the glide is there secondarily in the plural forms to fill the hiatus: if the final triphthongs had collapsed and *-y* came to represent *-ē* or *-ā*, the glide may have been reintroduced or preserved in the 3MPL SC to fill the hiatus between the vocalic end of the verbal stem

¹¹² And possibly '*ls'mh*, although the exact interpretation of the name is uncertain, it could come from √S¹MY: 'Ēl has named.

¹¹³ *bnyw* as a plural verb is also attested in (U 008; AH 200 and Al-Sa‘īd 1420/1999: 26–36, no. 3)

¹¹⁴ '*gww* is also attested in AH 243; Nasif 1988: 99, pl. CLVII; Al-‘Uḡayb 001.

¹¹⁵ *hggw* also occurs in AH 217; AH 221; AH 231; AH 233; Rabeler 001; U 063; Al-‘Uḡayb 075; Umm Daraḡ 22.

¹¹⁶ Also in AH 209

¹¹⁷ There is one attestation of *rdyt* (AH 288), see § 4.2.3.1 Verbs.

and the vocalic verbal suffix. If the glide is secondary in this position the consistent use of the etymologically correct one is probably based on analogy with the 3MS SC.

4.2.2.1.2 III-*w* verbs

It seems that in III-*w* verbs, the reflex of the final glide is represented orthographically in the 3 MS SC.¹¹⁸

U 038 *ḏbn/ʿmr/bn/mrd//ʿgw/h-ḏll/ḏh/l-ḏḡbt*
 ‘*ḏbn* ‘*mr* son of *mrd* dedicated this *ḏll* to *ḏḡbt*’

Based on the present evidence it is difficult to say whether the final triphthong obtained, or whether it collapsed and -*w* came to represent /-ō/ or /-ū/. Given the development of the final-*y* verbs, however, (see § 4.2.3.1 Verbs), it seems likely that the final triphthongs of final-*w* verbs also collapsed during the history of Dadanitic. Note that the final *w* is never represented in any of the attested feminine forms of this verb ʿ*gt* (U 126; AH 006; 079; Al-ʿUḏayb 129; 008). There are no attestations of III-*w* verbs with enclitic personal pronouns.¹¹⁹

4.2.2.2 Substantives

Final -*w* is also found on the bound plural of *bn* ‘son’;¹²⁰ and on the nouns *mḥrw* and ʿ*rb* ʿ*w*.

AH 001; AH 197; JSLih 079; U 064 *bnw*

AH 209 *qrbw/h-mḥrw*
 ‘they dedicated the **incense burner**’

U 008 *bnyw/hn-ʿrb//ʿw/f rḏ -hm*
 ‘they built the sanctuary¹²¹ so may he favor them’

Both *mḥrw* and ʿ*rb* ʿ*w* have been interpreted as plural forms (Hidalgo-Chacón Díez 2017, 60; Sima 1999, 97). The nominal plural suffix in unbound position is -*n*, however (see Chapter 6 - Nominal and Pronominal Morphology), which makes this interpretation unlikely. I would suggest that the *w* in *mḥrw* is part of the root¹²² (see Appendix - Glossary for a discussion). Sima (1999, 97) links ʿ*rb* ʿ*w* to the word *rabī* ʿ ‘qanāt channel open to the sky’ following Nasif (Nasif 1988, 274). However, it may be better to compare it to Nabataean ʿ*rb* ʿ*n*, which Nehmé suggests to be derived from the root RB ʿ ‘four’ and which she interprets as ‘square building’ (Nehmé 2003, 25). In the Nabataean context these buildings were also the object of dedications mentioned in inscriptions. The -*w* seems to be part of the noun formation, possibly related to that of the numeral in the Arabic form of Wednesday *yawm al-ʿarbi* ʿ*ā*, which Lane reports to be the only singular word of this measure (except ʿ*armidā*) (Lane, 1020a), but compare for example also plural formations like CAr. *ṣaḏīq* ~ ʿ*aṣḏiqā* ‘friend’. This -*ā* suffix may have come from *ʿ*arba* ʿ*āw* or -*āy* (compare CAr. **samāy* > *samā*).

¹¹⁸ The verb ʿ*gw* ‘he dedicated’ occurs 26 times in the Dadanitic corpus.

¹¹⁹ Transcription into another script with a better understood orthography could be another give source of more conclusive evidence for this.

¹²⁰ There is also a plural of brother ʿ*hw* attested once (JSLih 079), in this case the *w* seems to represent a glide however /ʿaḥawā/, since the *w* is not in word final position due to the enclitic pronoun ʿ*hw-hm* ‘their brothers’ (but see Drewes 1985, 170). So far there is only evidence for the use of *matres lectionis* in word final position.

¹²¹ U 008 ʿ*rb* ʿ*w* ‘sanctuary’ is translated as singular in OCIANA. In Sabaic it occurs as ‘quarter’ or ‘fraction’ (of a tribe) both translated as a plural (Ir 19; Ir 22; Ja 650) and a singular (Ir49) (accessed through DASI).

¹²² On the variant *mḥry* see § 4.6.6 Interchange of *w* and *y*.

4.2.2.3 Personal names

There are two examples of personal names with a suffixed *-w*. Their vocalization is unclear at the moment. They look very similar to names bearing wawation, as is common in Nabataean names (Cantineau 1930, 48).¹²³ Since we have no evidence for this use of the *-w* in Dadanitic outside of these two names, it could suggest that they are an orthographic calque, and their orthography was borrowed along with the name.

'bdw (JaL 061 d)

hdrw (JSLih 349)

zhyw (al-'Udayb 124)

4.2.3 Final -y

The evidence for the use of *-y* as a *mater lectionis* for *-ī* is not as certain as for *-h* and *-w* for *-ā* and *-ū* respectively. Most examples of final *-y* seem to represent either diphthongs or triphthongs, at least etymologically.¹²⁴ Word final *-y* is attested in the 3MS form of the SC of III-weak verbs; on bound dual forms (see § 6.2.5.1 Bound forms); as the gentilic suffix (Farès-Drappeau 2005, 62); and on several personal names (Drewes 1985, 169–70). Below only the forms that require further discussion will be treated more extensively.

4.2.3.1 Verbs

In the 3MS and PL forms of the SC of III-*y* verbs the *y* is always orthographically represented.

bny (e.g. Al-Sa'īd 1420/2000: 15-26, no. 2; JSLih 045)

bnyw (AH 200; U 008; Al-Sa'īd 1420/1999: 26-36, no. 3)

Word internally there seems to be variation. Compare *rḏy-h* (e.g. AH 213) and *rḏ-h* (e.g. U 038). This difference could be interpreted as a difference in morphological form: *rḏy-h* representing the optative use of the SC /raḏḏaya-hu/ 'may he favor him' and *rḏ-h* the imperative /raḏḏī-hu/ 'favor him'.¹²⁵

Alternatively we might interpret *rḏ-h* not as an imperative, but as a developed phonological form of the SC. While *rḏy-h* shows us that the triphthong was still intact when this spelling was introduced /raḏḏaya-hu/. The form *rḏ-h* could suggest a pronunciation /raḏḏē-h/. For this form to develop the final triphthong had to have collapsed, possibly after an initial loss of final short vowels. This would leave us with a form /raḏḏē/ for the 3MS of the SC, in which case the etymological *-y* would come to represent /ē/. This would be represented with a *mater lectionis* word finally, but not in word internal position.

The eventual collapse of the triphthongs is further supported by the attestation of both 3 FS SC *rḏt-h*¹²⁶ and *rḏyt-h*. These forms can only represent variant spellings of the same morphological form and

¹²³ For a more recent analysis of the function of the otiose *w* at the end of personal names see Al-Jallad (forthcoming).

¹²⁴ But see Drewes (1985, 170) who interprets forms like *bny* 'he built' as evidence for the use of *-y* for *-ē* and Farès-Drappeau (2005, 62) who suggests a vocalization /banī/ for *bny*.

¹²⁵ I would like to thank Ahmad Al-Jallad (pc.) for suggesting this interpretation of the difference between *rḏ* and *rḏy* to me.

¹²⁶ The form *rḏt* is also attested in Tall al-Kaṭīb, no. 1, but the context seems to be slightly different than in other inscriptions (there is no enclitic pronoun on *rḏt*). In combination with the fragmentary nature of the inscription it is unclear how this should be interpreted and whether the form really represents a verb here.

since they are based on the same root, the difference in spelling cannot be explained as a difference in vowel quality (see § 4.3.2 /aya/).

JSLih 036/2 ---- {'}zy/ f rḏt-h/{h}----
 '... 'zy so may she favor him/her...'

AH 288/4 f rḏyt-h/w 'hrt-h ----
 'so may she favor him/her and his/her posterity...'

This suggests that we are witnessing a historical development in the corpus, where the *rḏyt* and *rḏy-h* forms represent older forms or archaic spellings, representing a period in which the final triphthong had not collapsed yet, while the *rḏt* and *rḏ-h* spellings represent the form after the collapse of the triphthong. This means that all other attestations of III-y feminine verbs (e.g. 'ft (U 005; AH 015)) are only attested in the more progressive spelling. Since the *rḏ-h* forms seem to have been the norm (224 attestations, with only 30 attestations with *plene* spelling), and 'ft only occurs twice it is not surprising that these two attestations conform to the norm.

The fact that there is no variation attested in the spelling of word final triphthongs suggests that at the time when the triphthongs collapsed word final -y came to be used as a *mater lectionis* for -ē. Given the high frequency of *rḏ-h* spellings, most of the final -y's on 3 MS SC verbs were probably intended to represent -ē (e.g. *bny* and 'fy as /banē/ and /'ōfē/), as Drewes already suggested (Drewes 1985, 170). However, since over 10% of the attested forms of √RDY preserve the *plene* spelling of the final root consonant, it is not unlikely that some of the word final -y's in other verbs were also intended to represent a triphthong at the time of writing. The consistency in the writing of the etymologically correct root consonant in the verb¹²⁷ suggests that the collapse /awa/ and /aya/ had different outcomes, probably /awa/ > /ū/ or /ō/ and /aya/ > /ī/ or /ē/.

4.2.3.2 Gentilic suffix -y

The gentilic suffix cannot be directly compared to word final diphthongs, as it etymologically terminates in a consonant. Compare ClAr. -iyy or Aram. -āy.¹²⁸ In the Safaitic inscriptions the -y of the gentilic ending is always represented, clearly signaling its consonantal value in the purely consonantal Safaitic script (Al-Jallad 2015, 73).

In Dadanitic Farès-Drappeau mentions the name of the asterism 'bs'mwy,¹²⁹ in which the -y should probably be interpreted as the gentilic suffix */'ab samawiyy/, as evidence for the use of -y as a *mater lectionis* for -ī (Farès-Drappeau 2005, 62). This interpretation depends on whether the sound change -iyy > -ī had taken place, like in the modern dialects of Arabic.

4.2.3.3 Personal names

There are several divine names based on a feminine relative pattern *fu'lay*.

JSLih 055 *h-ktby* 'divine name'

AH 197 *hn'h'zy* 'theophoric name' (occurs in an inscription with *rḏy-h*)

AH 096 *zd'zy* 'theophoric name' (occurs in an inscription with *rḏ-h*)

¹²⁷ Except for one attestation of 'gy, for 'gw (JSLih 177), see § 4.6.6 Interchange of w and y.

¹²⁸ Suchard reconstructs *-īy- for Hebrew (2016a, 258).

¹²⁹ Farès-Drappeau interprets this form as a personal name (Farès-Drappeau 2005, 62).

While these forms etymologically end in a diphthong, it may have collapsed in these forms to -ē (as suggested by Drewes 1985, 170), in which case -y would represent a final long vowel.¹³⁰ Note that AH 197 contains the form *rdy-h*, which suggests that the *mater lectionis* -y for -ē had not yet developed, or that the author of the inscription chose to use an archaic form of the orthography, while AH 096 contains the form *rd-h*, strongly suggesting a pronunciation /'uzzē/ for the theophoric element of the personal name (See the discussion of *rdy* above § 4.2.3.1 Verbs).

4.3 Triphthongs

The glide of the (etymological) final triphthong is always represented in 3M PL SC verbs and 3MS SC verbs without an enclitic personal pronoun of final weak roots (see § 4.2.3.1 Verbs). They are never represented, in the medial weak verbs and rarely in the third person feminine singular suffix conjugation.¹³¹

4.3.1 /awa/

4.3.1.1 III-w verbs

The final -w of III-w verbs is always represented in the 3MS form of the SC (for a complete discussion of the possible vocalization of this form see § 4.2.2.1 Verbs).¹³²

JSLih 138 *w trw/n 'm/b-h/n 'rgd*
 'and may *n 'rgd* enrich him with livestock'¹³³

AH 109 *'bd 's' //bn/'n/b // 'gw/h-zll*
 ' *'bd 's'* son of ' *n b...* **dedicated** the *zll*'

It is not clear whether the -w represents a vowel or a consonant in the examples above. However, the w clearly represents a consonant before the plural ending (for a discussion of the origin of this glide see § 4.2.3 Final -y).

U 088 *'yd{h}/{b}nt qn{/}h w b{n}-h//s'h/'gww/h-zll/[l-][d]g//bt*
 'yd{h} daughter of *qn{h}* and her son *ls'h* **dedicated** the *zll* for *dgbt*'

AH 204 *----'----'l/bn/zdl{h} ---- // 'ht-h/'rgww/h-----*
 '... '... 'l son of *zdl{h}*... his daughter **sent up** (dedicated?) the...'

4.3.1.2 II-w verbs

In the one attested II-w verb *kn* 'he was' the medial glide is never represented, suggesting the presence of a medial long vowel /kāna/ or /kōna/.¹³⁴

¹³⁰ Greek transcriptions of Arabic material from the Greek and Byzantine period from Southern Syria, Southern Jordan and Israel show that in this area word final -ay collapsed to a non-ā vowel, probably close to [æ] (Al-Jallad 2017a, 154–55). Of course this material is much later and from a different area than the Dadanitic examples and can therefore not be seen as directly comparable material.

¹³¹ The only attested exception is *rdyt* in AH 288 (see § 4.2.3.1 Verbs).

¹³² Drewes (1985, 167–73) assumes that the diphthongs had been monophthongized, as they were not represented in word-internal position. See Macdonald (2000, n. 164) who argues against this argument. For a more extensive discussion on the interplay between orthography and phonology see § 1.7.5 Methodological concerns - Analyzing the language of a scribal school.

¹³³ I would like to thank Ahmad Al-Jallad for suggesting this translation to me (pc.).

¹³⁴ Compare the Safaitic inscriptions in which both spellings with and without a medial glide are attested, e.g. *bt* and *byt* 'he spent the night'; *mt* and *myt* 'he died'. The presence of y instead of etymological w in *myt* could suggest the sound changes áwi/u > ā and awi/ú > i (Al-Jallad 2015, 120). This interpretation depends on when the triphthong in medial weak

U 108

{b}rd/s^llm//dġbt/`z//ll/l-dġbt//b-khl/b`d//d-kn/l-h/b-y//r

‘brd s^llmdġbt performed the zll for dġbt at khl on behalf of that which was his at yr’

4.3.1.3 Personal names

The name *hn`mnwt* (JSLih 264; JSLih 319) probably preserves the old consonantal value of the -w-/hāni`-manawat/, especially when we compare it to the spelling *tmnt* (JSLih 256) which probably comes from a language in which the triphthong had collapsed /manōt/ or /manāt/.¹³⁵ The -w- here could reflect either /awa/ or a long vowel. However, outside of personal names there are no examples where word internal long vowels are represented with a glide, and there is no reason to assume separate orthographic rules for the personal names. The following names do contain word internal w, but due to the uncertainty surrounding their vocalization no reliable conclusions can be drawn based on them.

<i>drwt</i>	(JSLih 131)
<i>dwg</i>	(JaL 045 c)
<i>fkwy</i>	(JSLih 177)
<i>flwy</i>	(U 049; JaL 134)

4.3.2 /aya/

4.3.2.1 Verbs

4.3.2.1.1 III-y verbs

The final -y in III-y verbs is consistently represented in 3 MS SC verbs without enclitic pronouns (for a discussion of the vocalization see § 4.2.3 Final -y).

Al-Sa`īd 1420/2000: *nfyh/bn/`m/`fkl/hlh //bny/h-bnyn/dh/l-`lh*
15-26, no. 2 ‘*nfyh* son of `m priest of *hlh* **built** this building for `lh’

U 040.1 *`rs²/`y{d} //`zll h-zll //hny/hn-`/hrt*
 ‘*rs²* [son of] *`y{d}* performed the zll ritual, may he (the deity) benefit the posterity’

U 031 *`bdhgbr/b//n/hbl`l/`fy //h-zll/l-dġbt/b-khl//*
 ‘*bdhgbr* son of *hbl`l* **completed** the zll for dġbt at khl’

As with the III-w verbs, the third root consonant remains represented before the plural ending -ū clearly indicating that word internally the y has a consonantal value here. See the discussion in § 4.2.3 Final -y for the possibility of interpreting glide here as simply filling the hiatus.

verbs collapsed. See Huehnergard (2005, n. 75) who considers the triphthong to have collapsed at the Proto-Semitic stage but Suchard (2016b) for a reconstruction of Proto-Hebrew with the triphthong maintained.

¹³⁵ For a discussion of different spellings of *mnwt* in the epigraphic record see Al-Jallad (2017b, n. 6). For more on the deity Manāt and the spelling of her name see Healy (2001, 132–36).

AH 197 *zd`l/w bnwd/w `lh----//`d- h{s}br/w `m-hm/tbrh/bn[t] ---- //----ms¹/w {n}h`/w`ws¹/w zd{l}[h] ---- [s¹]-//{`d`l/w hn`h`zy/bnw/zd----//nwd/hggw/h-nq/w **hḡnyw/b-bt-hm***
 ‘*zd`l* and *bnwd* and *`lh...* ‘...of the lineage of *h{s}br* and their mother *tbrh* daughter of -----*ms¹* and *{n}h`* and *`ws¹* and *zd{l}[h]* ---- *[s¹]{`d`l* and *hn`h`zy* sons of *zd---nwd* they made the pilgrimage of the *nq* and **offered** at their temple’¹³⁶

JSLih 077 *whblh/bn/zdqny/w lmy/bn//nfyh/wdyw/nfs¹/mr/bn/hwt/m{h} //`hd/`l-hmy/hrg*
 ‘*whblh* son of *zdaqny* and *lmy* son of *nfyh* **set up** the *nfs¹* of *mr* son of *hwt* according to that which he took upon them by lawsuit’

The final weak root consonant also remains represented in some cases before enclitic personal pronouns.¹³⁷

AH 203 *...f-rdy-h ... w-`hrt-h*
 ‘and so **may he favor him...** and his posterity’

U 116 *`bd`tbl //hzll/l-dḡ//bt/f rdy-h*
 ‘*`bd`tbl* performed the *zll* for *dḡbt* and so **may he favor him**’

Note that the more common variant of this formula does not write the final -y (there are 218 attestations of *rḏ-h(m)* and 29 of *rdy-h(m)*). For a complete discussion of the interpretation of the variation between these forms and its impact on our understanding of the *matres lectionis* see § 4.2.3 Final -y.

AH 001 *... `z//llw/zll/h-nq/l//dḡbt/f rḏ-hm*
 ‘They performed the *zll* ceremony of the *nq* for *dḡbt* and so **may he favor them**’

JSLih 062 *hdqt/h//slmn //l-hn`kt//b/f rḏ-h/w //{}{}h}rt-h*
 ‘she dedicated the statuette to *hn-`ktb* and so **may he favor her** and her posterity’

4.3.2.1.2 II-y verbs

There may be two examples of the verb *byt* ‘to spend the night’ (AH 291 and Graf Abū al-Dibā‘ 1). Both these examples are attested in short graffiti. If *byt* is a verb in these inscriptions, it likely represents a D-stem /bayyata/, since it is a denominal verb. In this case the medial y does not represent a triphthong /aya/.

AH 291 *n`m//`kl`//w byt*
 ‘*n`m`kl`* and he spent the night’
 OR
 ‘*n`m`kl`* and *byt*’

¹³⁶ OCIANA translated *hggw h-nq* as ‘they made the pilgrimage to the top of the mountain’ and *bt-hm* with ‘their house’. All other attestations of *bt*, in Dadanic seem to mean ‘temple’, however, without any unambiguous meaning of house, or family. There are two attestations, however, that confirm that it refers to a structure *`rs² bn`mr f`l h-bt`rs²* son of *`mr* made the temple’ (AH 247) and *bny h-bt dḡbt* ‘he built the temple of *dḡbt*’ (JaL 006).

¹³⁷ See 4.6.7 -iwa > -iya for a further discussion on the third root consonant of *rdy* (< **rḏw*).

Graf Abū al-Ḍibā‘ 1 --- ḡr/w {h}{n}’l/byt/b-lwh/dld
 ‘... ḡr and hn’l spent the night (sing.) at [the] sandy depression lwh dld’
 OR
 ‘--- ḡr and {h}{n}’l byt are at [the] sandy depression dld’¹³⁸

Each inscription may better be interpreted by reading *byt* as a personal name instead of as a verb.¹³⁹ While it is part of the basic formula of Safaitic inscriptions to begin the verbal phrase following the genealogy at the beginning of an inscription with the conjunction *w-*, this is not part of the common structure of the Dadanitic inscriptions where the verb usually follows the personal names directly. There are several examples in the Dadanitic inscriptions, however, where multiple persons are mentioned at the beginning of an inscription, separated by the conjunction *w-*.

JSLih 121 y’d/bn ṣqw//w ’bs’lm/bn tly
 ‘y’d son of ṣqw and ’bs’lm son of tly’¹⁴⁰

In Graf Abū al-Ḍibā‘ 1 it is problematic to read *byt* as a verb, as it seems to follow at least two personal names and we would expect a plural form *byt*w.

4.3.2.2 Personal names

There is only one attestation of a personal name that may contain a triphthong with the glide *y*. Note that this is not the only possible vocalization.

r’n qny (AH 345)

4.4 Final short vowels

There is no direct evidence to determine whether word-final short vowels were present in Dadanitic. The spelling of *rḏy-h* clearly shows that there was a vowel present between the *y* and the enclitic *-h*, since there is no other evidence that word internal diphthongs were represented (see § 4.5 Diphthongs). It is not unlikely, therefore, that the final short vowel obtained on 3MS verbs in the SC /raḏḏaya/, but the short vowel may also only have been lost in word final position while it obtained before the enclitic pronoun. The consistent spelling of the final weak root consonants also supports the presence of final triphthongs at the time when the orthography was established (before they collapsed and *-y* came to represent *-ē*).¹⁴¹

4.4.1 Personal names

In the personal names there are several examples of word boundary spellings. For these to occur there cannot have been a word final short vowel on the first element of the name.

tmnt < /taym manāt/ U 063 and AH 303; JSLih 256

n’mnt < /na’m manāt/ JSLih 238

¹³⁸ I would like to thank Ahmad Al-Jallad for suggesting this translation of *lwh* to me.

¹³⁹ *byt* is not attested as a personal names in other Dadanitic inscriptions, but clearly occurs as such in two Safaitic inscriptions (AAEK 74 and RWQ 45).

¹⁴⁰ Note that the *w* at the beginning of the second line is placed a little away from both lines and is written at a height more or less between both lines (the trace of the inscription is available at the OCIANA website, <http://krccm.orient.ox.ac.uk/fmi/webd/ociana>). http://krc.orient.ox.ac.uk/ociana/corpus/pages/OCIANA_0034920.html (accessed 3–11–2017).

¹⁴¹ There are no examples of word boundary spellings in the text of the inscriptions. However, the use of word dividers means that scribes were aware of word boundaries. Therefore the absence word boundary spellings in the language of the inscriptions cannot tell us much about the phonological reality of these forms.

If the interpretation of the following name is correct it may represent another example of word boundary spelling, but since both attestations represent female names, it might also represent /tamlik/.¹⁴²

tmlk < /taym malk/ AH 064; Al-‘Uḏayb 088

There is one example of the assimilation of *l* to a following sibilant.

‘mtb ‘s‘mn < /‘amat ba‘l samīn/ U 053

There is one example of the assimilation of the voiced dento-alveolar stop to a following sibilant.

‘bs²m{n/s¹} < /‘abd šams / AH 259

4.5 Diphthongs

It is common for ANA scripts not to represent diphthongs orthographically. The lack of representation of diphthongs does not necessarily mean that they had collapsed phonologically. In Safaitic, for example, this is clearly demonstrated by the Safaitic/Greek bilingual texts. In an inscription from Jordan, for instance, a man writing his name as *ḡt* in Safaitic wrote it as Γᾶντος in Greek, clearly showing that the diphthong was pronounced, but simply not represented in the Safaitic script (Al-Jallad and al-Manaser 2016, 58–59). Unfortunately we do not have such transcribed texts of Dadanitic.¹⁴³

4.5.1 *w*

There are several I-*w* verbs with the initial *w*- represented in the *h*-causative form.

**AH 288; Al-Ḥuraybah 13;
Al-Ḥuraybah 14**

hwdq

JSLih 049

*hwdqw*¹⁴⁴

Al-Ḥuraybah 12

hwd‘t

However, there are also attestations of I-*w* verbs in the causative form without the diphthong represented:

Al-Sa‘īd 1419/1999: 4–24, no. 1, side 1–2 *hdq*

JSLih 062

hdqt

¹⁴² I would like to thank Ahmad Al-Jallad for pointing out this alternative reading to me.

¹⁴³ A possible exception to this might be two Minaic inscriptions from Dadan (JSMIn 145 and JSMIn 166), both written by the same author. If my interpretation is correct these may contain the Dadanitic verb *‘dq* ‘to dedicate’ written as *‘wdq*. Note that so far, in Dadanitic no *‘*-causatives are attested with the first weak root letter represented, suggesting the first syllable contained either a vowel or a diphthong. Minaic, however, does represent word internal diphthongs. It may therefore be very tentatively suggested that the spelling of this word in the Minaic script shows that the Dadanitic form was /‘awdaq/ (Kootstra 2018a). Alternatively this could be the first attestation of a *‘*-causative form of a CD-stem.

¹⁴⁴ There are 4 attestations with *w* represented in *h*-causative form; 2 without the *w* represented in the *h*-causative form (Al-Sa‘īd 1419/1999: 4-24, no. 1, side 1-2; JSLih 062). There are 6 attestations without the *w* represented in *‘*-causative form; There are no attestations of ***‘wdq*.

Our understanding of this variation depends on whether we want to interpret this as variation in the orthography or as grammatical variation. Note that both forms seem to be used with a similar meaning, to indicate the dedication of an object.¹⁴⁵

If we want to explain this as a change in writing conventions, the forms with the *w* represented would be the more innovative form, based on the innovation of the representation of word internal diphthongs. Based on the spelling of nouns which certainly contain an (etymological) diphthong, there is no evidence to suggest that at some point word internal diphthongs started to be represented. Compare for example the consistent spelling of *bt* ‘temple’ (e.g. JaL 006 and JSLih 042); *ym* ‘day’ (Al-Sa‘īd 1420/1999: 3–14, no. 1);¹⁴⁶ *qnt* ‘female servant’ (AH 186; 303; JSLih 282; 302).

Another option is to consider the two as different stem formations: the forms with the *w* represented as CD-stems /hawaCCaCa/; and the forms without the *w* represented as C-stems /(h')awCaCa/ (see also § 5.3.3 CD-stem). While initially both stems were productive, over time the CD-stem was lost. Such a development would not be surprising given the strong overlap in meaning of the two stem formations. This scenario seems to be supported by the distribution of *w*-spellings across the different causative types. While both CD and C-stems occur with the *h*-causative (with a higher number of the rare CD-stems (4), than the more common C-stem (1) in the relatively rare *h*-causative), there are no attestations of CD stems in ʾ-causative forms, even though ʾ-causatives are much more common than *h*-causatives (214 ʾ-causatives; 13 *h*-causatives). For example, the root WDQ occurs both with and without the *w* represented in the *h*-causative, but only as ʾdq¹⁴⁷ in the ʾ-causative (see examples above); the verb ʾfy¹⁴⁸ never occurs with the initial *w*, but it is only attested in ʾ-causative form.

U 035 *brqh/s¹/lh/dġbt//ʾfy/h-zll/l-dġbt*
 ‘*brqh* priest of *dġbt* accomplished the *zll* for *dġbt*’

U 037 *ʾrs²/bn//zdlh/w //bn-h/gffh //ʾfyw/[z][l][l] h-nq/l-dġbt*
 ‘ʾrs² son of *zdlh* and his son *gffh* accomplished the [zll] of the *nq* for *dġbt*’

This either means that we have no attestations of CD-forms of the ʾ-causative forms of I-weak roots, or that there are no forms with the diphthong represented in the ʾ-causative. If this is to be understood as purely orthographic variation it seems puzzling then that a more innovative spelling of the diphthong is always found in combination with the more archaic form of the causative verb in these cases. This could suggest that at the time when the CD-stem was still productive, the ʾ-causative form was not available yet (see Chapter 7 - A quantitative approach to variation for a more complete discussion of the correlation between different variable features).

Unfortunately the *hwdq* forms never co-occur with another verbal or nominal form with an (etymological) diphthong in the same inscription. There are two inscriptions that contain relevant personal names.

¹⁴⁵ Note that *hwdq* and *hdq* are mostly used in combination with *h-slm* as the dedicated object, except for two *hwdq* forms which dedicate *h-mġlt*. There is one *hwqd* with *h-slm* (Al-Ḥuraybah 13) and two *hdq* with *h-slm* (JSLih 062 and Al-Sa‘īd 1419/1999: 4–24, no. 1, side 1-2). The dedicated object is lost in two of the three ʾdq inscriptions, in Private collection 2, the dedicated object is an incense burner *h-mgrmt*.

¹⁴⁶ Also possibly *s¹t* (U 063; Al-‘Udayb 075) if it should be interpreted as a noun from the root S¹WT, but its interpretation is very unsure.

¹⁴⁷ ʾdq occurs six times in total (e.g. AH 087; JSLih 061); ʾdqw occurs once (Al-Ḥuraybah 09).

¹⁴⁸ Forms of this verb occur 9 times: AH 015; U 005; AH 087.1 (unp.); Private collection 1; U 004; U 031; U 035; U 026; U 037

JSLih 049/ 1–9 *'bdwd//fkl/w//d/w bn-h//s^llm/w z//dwd/hw//dqw/h-ġ//lm/s^llm/h-//[m]tlt/l-//dġbt*
*'bdwd priest of Wadd and his son s^llm and **zdwd** dedicated the boy s^llm, the substitute to dġbt'*

Al-Ḥuraybah 13 *zd//bn//ws^l//{l}/d- y//hdf//m/hw//dq/h-//{s}lm*
'zd son of 'ws^l{l} of the lineage of yhdfm dedicated the statue'

Both inscriptions contain forms of *zd* without the (etymological) diphthong represented, which seems to support the interpretation of the *w* in *hwdq* as a consonant. Note, however, that in Al-Ḥuraybah 13 the name *'ws^l{l}* also occurs. In this spelling the name should probably be interpreted as representing the diminutive form /'uways/, but it cannot be completely ruled out that /aw/ was represented with *w* here. It is unclear at the moment what the seemingly inconsistent spelling of diphthongs in the personal names in contrast to what seems to be consistent lack of representation of diphthongs in nouns means. It could be interpreted as evidence for the collapse of diphthongs in Dadanitic, after which they went unwritten. In the case of *'ws^ll*, this could be interpreted as an archaic or borrowed form with the diphthong still intact phonologically and therefore represented in writing. It is problematic, however, to imagine how the author of the inscription knew how to represent the diphthong if there had never been an environment in Dadanitic in which such a spelling could develop, unless we assume an *ad hoc* innovation to represent a foreign sound, or possibly borrowing of the orthography of the name from another writing tradition.¹⁴⁹

If we assume the existence of a CD-stem verb, this could also be argued to explain the alternation of geminate roots with and without all root consonants represented (C-stem /'azalla/ and CD-stem /'azallala/ and /hazallala/) (See § 5.3.3 CD-stem). Note that if these should be interpreted as CD-stems, there are attestations of CD-stems of the '-causative in the geminate roots, which seems to contradict the distribution we see in the I-w verbs. Given the high frequency of the verb 'zll and its centrality to the cultural practice at the oasis, it is possible that the archaic CD-stem continued to be productive in this environment after it fell out of use in other less common verbs. If we do assume it is an archaic form, it is striking, however, that the '-causative form became the norm and not the *h*-causative (for a complete discussion on the distribution of these linguistic variables across the corpus see Chapter 7 - A quantitative approach to variation).

AH 080 *dn^l/bn//bdh/'zll/b'd/ml-h/b-//bdr/l-dġbt//f rđ-h/w 'tb-h*
'dn^l son of 'bdh performed the zll on behalf of his property at bdr for dġbt so may he favor him and reward him'

AH 067 *[n]fy/bn/'bdh/zny/[m]n '[d]r^l/'zll/h- zll/l- dġbt*
'nfy son of 'bdh zny mn 'dr^l performed the zll ceremony for dġbt'

U 116 *'bd'tbl//h'zll/l-dġ//bt/f rđy-h*
'bd'tbl performed the zll for dġbt so may he favor him'

Given the differences in distribution of the *hwdq* and 'zll forms, it seems more likely that they are two unrelated developments. In this case the alternation between 'zl and 'zll could be interpreted as a form with metathesis /'azalla/ as opposed to a form that was treated like a strong verb /'azlala/, in which case the latter should probably be interpreted as the more archaic one.

¹⁴⁹ Note that Taymanitic sporadically represents word internal diphthongs (Kootstra 2016, 70).

4.5.1.1 *w* Diphthongs in personal names

Despite the absence of clear examples of the representation of word internal diphthongs in nouns (see § 4.5.1), it is not uncommon to find it represented in personal names, especially in names containing the element *'ws'*. However, these forms are more commonly attested without the glide represented.¹⁵⁰ The difference in spelling of diphthongs between the content of the inscriptions and the personal names may be explained as a difference in phonology, showing that diphthongs had collapsed in the language, but not in all of the personal names. If this is the case, the PNs with diphthongs preserved caused some confusion as how to represent the diphthong, comparable to the inconsistency in writing diphthongs we see in Taymanitic. Note that the vocalization of most names is uncertain, and different vocalizations may be suggested, *'ws'* could for example be a diminutive /*'uways*/ or a verbal form in *'ws'l* /*'awas*/. The only forms in which the diphthong can be fairly certainly assumed are the *qws'* names.

<i>yṯbqws'</i>	Al-Sa'īd 1419/1999: 28–30, no. 5
<i>qws'br</i>	JSLih 334
<i>qws'mlk</i>	JSLih 331
<i>'ws'</i>	AH 197
<i>r'n'ws'</i>	JaL 157 b
<i>'ws'l</i>	al-Ḥuraybah 13
<i>h'ws't</i>	JSLih 344
<i>'wd</i>	AH 001
<i>ḡwṯ</i>	e.g. JaL 12 b

4.5.2 *y*

4.5.2.1 *'ly*

The variation in spelling of *'ly* (and *'l*) seems to indicate that only word final (and possibly stressed) diphthongs were orthographically represented. Apart from three *'l* forms that are followed by a relative (AH 070; AH 125; U 073) and one that is followed by a word divider and damage (Nasif 1988: 99, pl. CLVII), the six other attestations have an enclitic personal pronoun attached to them¹⁵¹, while there are no occurrences of *'ly*¹⁵² with a following enclitic pronoun (Lundberg 2015, 125).

AH 070 *'zll//t'Vd-k[n]/l-h//b-bdr*
 'She performed the *zll* **on behalf of** that which belonged to her at *bdr*'

JSLih 073 *hmd nd//rt 'l-h/'m-h*
 'In accordance with what her mother vowed **on her behalf**'

The spelling of *'ly* seems to suggest that word internally the diphthong /ay/ is left unrepresented. This is supported by the spelling of, for example *bt* /bayt/ 'temple'.

e.g. JaL 006 ----[b]ny/**h-bt**/dḡbt //----[s'][[]{d}/w 'hrt
 '... he built **the temple** for *dḡbt*... aid him and his posterity'

¹⁵⁰ *hn's'* (e.g. AH 202; AH 222; JSLih 053); *'mt's'* (AH 094); *'s'* (e.g. JaL 111 f; JSLih 071; AH 201); *'s'mnt* (JSLih 250; AH 062); *mltq s'* (JSLih 083); *qs'* (AH 271); *'bdqs'* (JSLih 363).

¹⁵¹ AH 206; AH 233; AH 237; JSLih 073; JSLih 077; JSLih 078

¹⁵² *'ly* is attested 23 times (e.g. AH 069; JSLih 063; U 125)

There are two examples of *byt*.

Graf Abū al-Ḍibā^ʿ 1 *ʿgr/w-hn`l //byt/b-lwh/dld*
 ‘*gr and hn`l* spent the night at [the] sandy depression *dld*’¹⁵³

AH 291 *n`m//`kl`//w byt*
 ‘*n`m`kl`* and he spent the night’

The above translations follow that proposed in OCIANA.¹⁵⁴ However, *byt* may better be understood as a personal name in each inscription (see § 4.3.2 /aya/ for a discussion of these inscriptions and the interpretation of *byt*).

There are several other forms with word internal *y* represented. Unfortunately the exact interpretation of these forms remains uncertain, making it problematic to draw any firm conclusions on their vocalization.

<i>s²ym</i>	field?	AH 100; AH 138; U 118
<i>hqymh</i>	?	Müller, D.H. 1889: 63–64, no. 8/ 1–2; JSLih 054
<i>nyt</i>	? (dedicated object)	JSLih 312

4.5.2.2 *y* Diphthongs in personal names

The theonym *dġbt* may be attested as *dġybt* in two inscriptions. The photographs available of both inscriptions are very low resolution unfortunately, making it difficult to confirm the presence of the *y*. In both inscriptions it is clear, however, that there is either a gap between the *ġ* and the *b* (AH 207) or an extra letter (AH 229). Despite the issues with the reading, it seems clear that the name of *dġbt* was intended in each inscription.¹⁵⁵

<i>dġ{y}bt</i>	AH 207
<i>d{ġ}{y}b{t}</i>	AH 229

There are several personal names with etymological *y* represented word internally and word finally (see the *lhy* /luḥay/ names). Given the uncertainty surrounding the vocalization of personal names, not all *y*’s may represent a diphthong.

<i>zyd</i>	AH 199, 252; JSLih 249 vs <i>Zd</i> AH 009, 164; Al-Ḥuraybah 05.
<i>zydḥrg</i>	JaL 161b
<i>tym</i>	e.g. AH 272; AH 313; Al-Ḥuraybah 05
<i>qynh</i>	U 046; JSLih 128; Al-‘Uḍayb 073
<i>qys^ʿr</i>	Nasif 1988: 58, pl. LVII/e
<i>ʿykdn</i>	JaL 010 b

¹⁵³ I would like to thank Ahmad Al-Jallad for suggesting this translation of *lwh* to me.

¹⁵⁴ Accessed 18–10–2017.

¹⁵⁵ If these (very uncertain) readings are correct, this confirms that the name of the deity comes from the root √ĠYB /ḡu gaybat/.

<i>ʿylh</i>	JSLih 206
<i>ʿdyl</i>	JaL 145 r
<i>lhylh</i>	JaL 102b
<i>krblhy</i>	JaL 062c
<i>lhy</i>	AH 209
<i>tlmy</i>	e.g. AH 245

4.6 Sound changes

4.6.1 *n*-assimilation

The consonant *n* generally seems to assimilate to any directly following consonant. There are two examples of *bt* ‘daughter’ instead of the common form *bnt* (JaL 008 c and JaL 168 f). Both inscriptions are short graffiti. These two examples are far outnumbered by the occurrences of *bnt* however (70 attestations, e.g. U 048; JSLih 076; AH 222). There are several other (possible) examples of assimilation of *n* to a following consonant, while there are no clear examples in which *n* does not assimilate apart from the noun *bnt*.

ʿtt ‘wife’ (< **nʿtt*) is always written without the *n* (JSLih 067; U 023; U 115).

If *ʿgy* comes from *ngw*, as has been suggested by Drewes (1985, 172) and taken over by Sima (1999, 93),¹⁵⁶ this verb forms another example of *n*-assimilation in Dadanitic. However, it might also be a causative form of the root GWY ‘to come’.¹⁵⁷

4.6.2 Dissimilation of *t*

There is one attestation of the form *ʿtl* ‘three’ (JSLih 068 (see § 6.11.4 Variation) from the root *ʿTLʿ*, in which the second *t* dissimilated. Slightly more common is the original form *ʿtlʿ* however.¹⁵⁸

4.6.3 *z* > *t*

There are several examples in which etymological **z* is written with *t* in Dadanitic. There are 25 examples of *ʿtl* instead of **zll*. OCIANA identified the two examples below. For the other 23 attestations see § 2.1 Glyphs and their variant forms.

AH 009.1 *bs²klbt---[ʿ]ʿtlʿ/h-ʿtlʿ ----b-khl/l-dḡbt/bʿd/d-kn/b-bdr/f rd[-h]/w [ʿ]h[r]t-h*
‘*bs²klbt* ... performed the *ʿtl* ceremony... at *khl* for *dḡbt* on behalf of that which is at *bdr* so may he favor him and his posterity’

¹⁵⁶ Drewes (1985, 172) does not offer an explicit translation. Sima (Sima 1999, 93) compares the verb to CAR. ‘to save oneself, to become free’ and takes the causative stem to mean ‘to clear (the subterranean water canal)’ in the Dadanitic texts. Macdonald (Macdonald 2014, 154) proposed to connect the verb *ngy* in Safaitic with Sabaic *ngw* ‘to announce’, but does not propose any connection to the Dadanitic *ʿgy*.

¹⁵⁷ Suggested by Ahmad Al-Jallad pc.

¹⁵⁸ *ʿtlʿ* is attested four times (JSLih 071; AH 239; AH 197; Al-Saʿīd 1420/1999: 26–36, no. 3), *ʿtl* is attested twice (U 050 and U 032).

U 048 *ḥmtlh/bnt//wḥlḥtll//l-dḡbt/b //d/ml-h/b-tqmm//f rd-h/w sḥ d-h*
 ‘ḥmtlh daughter of wḥl performed the ḥtll for dḡbt on behalf of her property at tqmm so
 may he favor her and aid her’

Since ḥzll h-zll ‘he performed the zll ceremony’ is one of the most frequently occurring formulae in the Dadanitic inscriptions, these aberrant spellings are striking. There are less than 250 zll inscriptions in total. Therefore, 25 deviating spellings are a relatively high number of mistakes, suggesting this sound change was quite common in the language of the authors of the inscriptions.¹⁵⁹

There is also variation in the spelling of *nḥr.¹⁶⁰

AH 313 *tm/bn zbdḥ/nḥr/mt ḥl/w ddn*
 ‘tm son of zbdḥ guarded mt ḥl and Dadān’

AH 332 *{g} ḥr nḥr ddn*
 ‘{g} ḥr guarded Dadān’

Since most of these inscriptions refer to guarding Dadān, nḥr may reflect Aramaic influence at the Dadanitic courts, rather than a local sound change (Kootstra 2018b, 207). Aramaic became a prestigious language at Taymāḥ after Nabonidus brought it with him as the language of his court during his stay at the oasis (552–543 BCE)¹⁶¹ (Macdonald 2010, 18). It seems that Aramaic did not enjoy the same status at Dadān as it did at Taymāḥ,¹⁶² although in recent excavations one long Aramaic inscription was discovered at the site of ancient Dadān.¹⁶³

On top of that, there are several personal names with etymological ḥ that are represented with ḥ.¹⁶⁴

nḥr (JSLih 079) < *nḥr ‘to guard’; ḥn (JaL 064f) < *ḥnm(?) ‘thought, belief’; ḥrbn (JaL 029d) < *ḥrbn(?)

While we cannot draw any conclusions about the language of a person based on the name he bears (Macdonald 1999, 254–57), the complete absence of names spelled with ḥ for ḥ would have made it doubtful that such a sound change occurred in the language (or part of it) of Dadān.

¹⁵⁹ For a more elaborate discussion of the implications of the variation in ḥ and ḥ in the zll inscriptions see Kootstra 2018. Note that in this paper only the two ḥ spellings in the zll inscriptions that were identified by OCIANA were taken into account.

¹⁶⁰ The form nḥr is attested 3 times, nḥr 17 times, both in what seems to be the same formula.

¹⁶¹ For a more detailed discussion of Nabonidus’ stay at Taymāḥ see (Beaulieu 1989; D’Agostino 1994; Lambert 1972).

¹⁶² Note that the rulers of Dadan left their inscriptions in Dadanitic at Dadan, but close to Taymāḥ inscriptions in Aramaic have been found of someone calling himself ‘king of Liḥyān’ (JSNab 334, 335, 337), further suggesting a difference in status between the two languages at each oasis.

¹⁶³ The inscription is being prepared for publication by S. Theeb (Ahmad Al-Jallad, pc.).

¹⁶⁴ In addition to this ḥḥ could be from the root √ḤZ ‘to be in favor with so.’, but the name could also come from the root √ḤTT ‘to place, to put’ (Lane 1863, 592a). The names ḥḥ and ḥḥḥ are attested in Safaitic as well (e.g. C654; KRS 2889). The name ḥby (JaL 022c, JaL 063f) could come from *ḥby ‘gazelle’, but may also be related to Aram./Heb. ḥūbiyā, modern Tobias (Ahmad Al-Jallad, pc.).

4.6.4 *d* > *z*

In most inscriptions *d* and *z* are consistently kept apart in Dadanic. It has been suggested that there are two examples of *d* realized as *z* in the relative/demonstrative **d* (Hayajneh 2016, 162 and 165). Both of these Dadanic inscriptions were found in the vicinity of Taymā'.¹⁶⁵

Esk. 74 *mznz//t<</>qt*
'*mzn*, who incised / wrote (the inscription)'¹⁶⁶

Esk. 253 *s^lln / s^lyt z*
'*s^lln* placed this (inscription)'¹⁶⁷

The reading of both *z*'s as **d* of the relative and demonstrative is slightly problematic however. First of all the demonstrative in Dadanic is *dh*, not *d* (e.g. U 038; JSLih 079), which means that just assuming the loss of interdental in Esk. 253 is not enough to arrive at this form of the demonstrative. In addition we must assume the author of the inscription used a different form of the demonstrative all together. The main context, in which the relative form *d* is attested in the Dadanic inscriptions, is to indicate kinship (e.g. AH 197) (See § 6.5 Relative pronoun). While the verb *tqt* is quite common in the Dadanic inscriptions (84 attestations in OCIANA¹⁶⁸), the inscriptions containing it usually follow the formula 'Personal Name *tqt*' or, less frequently 'tqt Personal Name' (e.g. JaL 159 a; JaL 061 k). There are no other attestations in which the dedicant of the inscription is referenced with a relative pronoun. Finally there is a word divider in the middle of what would be the verb *tqt* which Hayajneh assumes was a writing error (Hayajneh 2016, 162). While there are other examples of word dividers that are clearly in the wrong place (e.g. U 018, see § 4.1 Word dividers), it should be noted that the form *qt* 'to cut, inscribe' occurs once in JaL 152. Interpreting the verb as *qt* would leave us with an unattested personal name *mznzt*, but the common formula PN (*t*)*qt*.

There is one inscription in which the form *zkr* appears, likely from the root **DKR*. The beginning and ending of all lines of the inscription are damaged, however, making it difficult to determine the exact meaning of the form.

JSLih 053 [----]//----[h]n^{s^l}/bn/s²hr ---- //---- [m]lk{t}/lhyn^s{f}---- //---- gbl/s²mt/zkr/n----//----l/
w rtm/w brlh/{w}----//[----]

4.6.4.1 *d* > *z* in personal names

*'lzk*r JaL 033 s

4.6.5 Merging of *t* and *s^l*

Based on the last word of JSLih 081, Winnett proposed a possible merger of *s^l* and *t* in this inscription, reading *trqh* as CAr. *saraqah* 'thieve or theft' (Winnett and Reed 1970, 124).

JSLih 081 *l-ntnb V//bn/wny/hn//qbr/dh/{h}{m}//ly/yln//w ly/s²m[l]//mn/trqr*
'this grave belongs to *ntnb* 'l son of *wny* {*hm*} from the south and from the north from *trqr*(?)'

¹⁶⁵ Note that in Taymanitic, *z* and *d* did merge (Kootstra 2016, 75).

¹⁶⁶ Translation by Hayajneh (Hayajneh 2016, 162).

¹⁶⁷ Translation by Hayajneh (Hayajneh 2016, 165).

¹⁶⁸ Accessed 19–10–2017.

There are several issues with this interpretation, however. First of all it seems unlikely that the last letter of this word was *h*, if we compare it to the shape of the *h* in lines 2 and 3 of the same inscription. The original interpretation of Jaussen and Savignac (Jaussen and Savignac 1909, 452) who read *trqr* seems to fit the photograph better.



Figure 16 JSLih 081 (Jaussen and Savignac 1909-1912 pl. LXXXV) available on OCIANA

In addition to that, it seems that Dadanic did not undergo the *-at > -ah* shift (see § 4.6.9 *-at > -ah* below), meaning we would need to presume another sound change unique to this inscription to arrive at the proposed interpretation of *saraqah*. Unfortunately the form *trqr* does not yield anything meaningful at present and is taken as a personal name or theonym in the OCIANA database.¹⁶⁹

4.6.6 Interchange of *w* and *y*

There seems to be some degree of alternation between *w* and *y*, mostly attested in III-weak roots in Dadanic. Such alternation is attested in other Semitic languages as well. Compare, for example, the tendency in the Sabaic inscriptions from south of the central region to change *w > y* in III-weak roots (Stein 2003, 3:33–34) and the sound change *w > y / V_(a)#* effectively merging *w* and *y* in II and III-weak verbs in Safaitic, with only some attestations of the preservation of *w* in this environment, which seems to point to dialectal variation (Al-Jallad 2015, 50).

4.6.6.1 III-weak roots

The verb *'gy* occurs once (JSLih 177), with the exact same meaning as the more frequent *'gw* ‘to dedicate’ (occurring 28 times, e.g. U 049; AH 202; AH 201), presumably from the root NGW (see § 4.6.1 *n-assimilation*). This confusion may indicate that in the language of the author of the inscription the collapse of /awa/ and /aya/ had the same result, possibly /ā/, but this does not seem to have been the case for the majority of the Dadanic inscriptions (see § 4.2.3.1 Verbs).

In addition to that, there are attestations of both *mḥrw* (Al-Ḥuraybah 06 and AH 209) and *mḥry* (AH 288) probably meaning ‘incense burner’,¹⁷⁰ from the root ḤRW or ḤRR.

¹⁶⁹ There *mn trqr* is translated as ‘by *trqr*’ OCIANA accessed 24–10–2017.

¹⁷⁰ See Hidalgo-Chacón Díez (2017) for a discussion of the word *mḥr* [sic], which she translates as ‘*mḥr* rituals (incense offerings)’ interpreting *mḥrw* as a plural form from the root MḤR (Hidalgo-Chacón Díez 2017, 60).

ʿgy (JSLih 177)	ʿgw (e.g. U 049; AH 202; AH 201)	√NGW	‘to dedicate, to offer’
mḥry (AH 288)	mḥrw (Al-Ḥuraybah 06; AH 209)	√HRW	‘incense burner’

4.6.6.2 II-weak roots

The word ṣwġ ‘smith’ is attested twice with the etymological *w* and once with a *y*.

Al-Ḥuraybah 04 ʿlḥrs²//h-ṣwġ
‘ʿlḥrs² the smith’

Al-Ḥuraybah 05 s¹ḥm/bn/t//m/h-ṣn / ʿbd//zd/h-ṣwġ
‘s¹ḥm son of *tm* the artisan, ʿbdzd the smith’

Al-Ḥuraybah 14 ---//h-ṣyġ/h//wdq/h-m//tlt/l-d//ġbt
‘...the smith dedicated the substitute to *dġbt*’

In addition to this there is the personal name *nyr*,¹⁷¹ probably from the root NWR. This was not necessarily representative of the phonology of the Dadanitic language, or that spoken by its bearer (Macdonald 1999, 254–57).

nyr (JaL 033 o) √NWR ‘light’

4.6.7 -iwa > -iya

In Dadanitic we consistently see *rḏy* from the etymological root *RDW. Since the form that occurs in Dadanitic is transitive and was therefore most likely a D-stem verb, the form *rḏy* does not represent the sound change *-iwa to -iya directly. However, for a form *rḏy* to arise in the D-stem there must have been other forms around to extend this sound change from or to reinterpret the root as *rḏy*. Compare for example the sound change -iwa > -iya which took place in Arabic. This would have affected the intransitive form of the verb *raḏiwa* (> *raḏiya*) from where it could have spread to the derived stems.

The more archaic form *rḏw* does occur in the PNs, which indicates that these names were taken from a language which did not undergo this sound change, or, if they were taken from Dadanitic stock they represent an archaic spelling and possibly pronunciation.

AH 176	<i>rḏw</i>
U 117; Nasif 1988: 56, pl. LVI(b)/d	<i>rḏwl</i>
JaL 043a	<i>rḏws²ʿn</i>
Nasif 1988: 97, pl. CXLIX/a	<i>rḏwt</i>
JaL 026b	<i>r^ʿnrḏw</i>

4.6.8 Assimilation of *w* > *y*

The realization of the plural of *ym* ‘day’ as ʿym indicates that the *w* assimilated to the preceding *y* in front of ā / ʿayyām/ < */ ʿaywām/ (compare e.g. Safaitic (Al-Jallad 2015, 51)).

¹⁷¹ This name only occurs once in Dadanitic, but is also attested in Safaitic (8 times, e.g. LP 424; WH 188).

JSLih 068	<i>ilt/ym</i>	three days
AH 244	<i>s¹b /ym</i>	seven days
JSLih 070	<i>s²r/ym</i>	ten days

4.6.9 -at > -ah

Even though there are sporadic examples in which *-at* shifted to *-ah* (e.g. JSLih 384), this rule does not seem to have been productive in Dadanitic. There are examples of *-t* in construct.

JSLih 177	<i>'gy s²rt mnhh</i> 'he dedicated ten minah ' ¹⁷²
JSLih 072	<i>'b 'lf/b[n] hyw kbr hd 't s² 't hnš</i> 'b 'lf son of <i>hyw kabīr</i> of the council of the party of <i>hnš</i> '
AH 219	<i>hgt h-mšd</i> 'the feast/pilgrimage of the temple'

But *-t* is also attested in independent forms. For example, the second line of AH 186/2 seems to only say *h-qnt*.

U 038	<i>...m ' hn- 'fkl t b-bn 'l</i> '...with(?) the priestess at <i>bn 'l</i>
U 063	<i>f rđ-hm //w rb-hm/zdlh w //qnt/t 'l</i> 'so may he favor them and their lord <i>zdlh</i> and female servant ¹⁷³ <i>t 'l</i>

There are only few final *-h*'s, most of them can be explained in other ways than as representing the feminine ending.

Müller, D.H. 1889: 63-64, no. 8//*h-qymh/mgdl/dġbt*

Since the line before *h-qymh* is broken it is impossible to tell whether it is even a noun, it could for example be a dual *h*-causative: 'they (two) erected the tower of *dġbt*', although this would need further explanation as to why the medial weak root consonant was preserved in this form and not in *kn* 'he was' (see § 4.3.1.2 II-w verbs).

AH 304	<i>md 'l qnh h-mlk</i> 'md 'l his servant, (of) the king'
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Assuming *-ah* here in construct position is problematic. The form *qnh* is attested in two other Dadanitic inscriptions as a personal name (U 075; U 088). Therefore this inscription may have to be read 'md 'l *qnh* the king', even though this name is not attested as a royal name in any other inscriptions, since it is a graffito the author may have been joking or bragging.

¹⁷² The translation and reading of *mnhh* were suggested by Ahmad Al-Jallad, during one of the reading sessions with the center.

¹⁷³ *qnt* may also be interpreted as a personal name here.

4.6.9.1 Personal names

<i>nfyh</i>	e.g. JSLih 077
<i>zkyh</i>	U 118
<i>ʿydhmnt</i>	al-Mazroo and Nasīf 1992: 4, no. 3
<i>ʿydh</i>	U 102

4.6.10 Feminine endings -t and -at

The realization of *qrt* ‘village’ suggests that the suffixes -t and -at had not all been levelled to -at in Dadanitic (as opposed to CAr.). The spelling *qrt* suggest a pronunciation /qarīt/ rather than /qariyat/ (Al-Jallad 2015, n. 15), in which we would expect the glide to be represented in the script. It could be argued that this writing is due to the collapse of the triphthong instead (see § 4.3 Triphthongs). It is unclear whether /iya/ behaved differently than /aya/ in Dadanitic.

4.6.11 Loss of intervocalic ʾ

There is no clear evidence from the language of the inscriptions for the loss of intervocalic ʾ. The form *h-zlt* in U 013 may be interpreted as a broken plural ʾzlt with loss of the glottal stop, but other interpretations are also possible, such as a singulative; or simply a writing error¹⁷⁴ (see § 6.2.4 Pattern replacement).

U 013/2-4 ʾzlt//**h-zlt**/b-khl/l-dġ//bt
‘she performed **the zll ceremony/ceremonies** at *khl* for dġbt’

4.6.11.1 Personal names

There are a few examples of the loss of the glottal stop in personal names.

<i>ʿbds^l</i>	JSLih 359
<i>hnyl</i>	Al-ʿUdayb 074

¹⁷⁴ The form may also represent an alternative plural form /zallāt/ (I would like to thank Ahmad Al-Jallad, pc. for pointing out this interpretation to me), but given the high frequency and formulaic context in which the word occurs, it seems unlikely that several plural forms were in use for it.