

THE REDUCTION OF CASE MARKING IN PLURAL CONJUNCT (ADVERBIAL)
AND PREDICATIVE PARTICIPLES IN NEO-HITTITE*

Michael FROTSCHER

Abstract: It is now the *communis opinio* in the field of Anatolian studies that there is in Neo-Hittite no longer a formal distinction between the nominative and the accusative plural *communis* as there was in the older language (Old and Middle Hittite). Instead, a syncretic case form (*Einheitskasus*) with two allomorphs, either *-eš* (former nom.pl.c.) or *-uš* (former acc.pl.c.), is used for both functions. The two allomorphs are distributed with regard to the respective stem class. This system applies to ordinary nouns and to pronominal stems but not to participles. In this article it will be shown that there is a different system applying to participles: In the domain of verbal usage (predicative or adverbial function [= conjunct participle]) the participle only exhibits the syncretic desinence *-ant-eš*, whereas in the nominal domain (attributive or substantival function) there is still a distinction between *-ant-eš*, for the nominative, and *-and-uš*, for the accusative.

Keywords: adverbials, case agreement, case marking, case syncretism, conjunct participle, depictives, Hittite, morphosyntax, participle, predication.

§ 1. In an article on the Neo-Hittite nominal inflexion Craig MELCHERT (1995) was able to show that in Neo-Hittite there exists a strong tendency towards a syncretic case form comprising the nominative and accusative func-

* The groundwork for this study was first laid out in my as yet unpublished doctoral thesis, FROTSCHER 2013. Further results were achieved through my collaboration on the project *La struttura della frase nelle lingue indo-europee antiche: la sintassi del participio* (Università di Verona, 2013–2014) and on the ERC-project *EVALISA – The Evolution of Case Alignment and Argument Structure in Indo-European* (Universiteit Gent, 2013–2018; grant number: 313461). Those results will also form part of the upcoming syntax part of the *Indogermanische Grammatik* (published by the Universitätsverlag Winter) and of my research in connexion with the related project *Konkurrierende Ausdrucksformen in der indogermanischen Syntax: Die Syntax des Partizips nach seiner Morphologie, die Syntax des Satzes nach seinen Konstituenten* (funded by the Fritz Thyssen Stiftung) under the supervision of Velizar Sadovski (Vienna) and Paola Cotticelli (Verona), whom I would like to thank for her constant support throughout these projects. I am furthermore grateful to Felicitas Erhard, Federico Giusfredi, and Alfredo Rizza for their aid in providing me with bibliographical items otherwise unavailable to me during my scientific stay at Ghent University, as well as to Craig Melchert for extensive discussions, helpful advice and several corrections. All possibly remaining errors are of course mine own.

tion in the plural – a phenomenon which in the German tradition is sometimes referred to as *Einheitskasus*. According to MELCHERT (1995: 270) this nominative-accusative-*Einheitskasus* for most stem classes continues the form of the earlier non-syncretic accusative plural in *-uš* with the nominative-accusative of ablauting *-u*-stems ending in *-aueš* (instead of the morphologically less transparent older form *-amuš*¹) and the respective form of the relative pronoun *kuiēš* (instead of older *kuiuš*) being exceptions generalising the earlier non-syncretic nominative ending *-eš*. Still another exception is *-(^o)t*-stems, which also exhibit a nominative-accusative in *-eš*, the form of the earlier nominative plural. Here also belong *-nt*-stems and therefore *-ant*-participles, for which MELCHERT (1995: 270) also claims a nominative-accusative desinence in *-nt-eš* for Neo-Hittite, although he admits that “[...] there are some examples of *-uš* following the general pattern” (*op.cit.* 272), i.e. the former non-syncretic accusative ending *-uš* is still used with accusative force in Neo-Hittite. Basically the same results were reached by MCINTYRE 1986 in her unpublished M.A. thesis.²

The purpose of this article is to show that a mechanism different from the one described by MELCHERT has to be reckoned with in order to account for the inflexional behaviour of *-ant*-participles with accusative force. It will be shown that the use of the syncretic nominative-accusative case ending *-eš* is dependent on the syntactic function of the participle and not simply due to its affinity to a certain stem class. It is therefore different in nature from the general tendency towards an *Einheitskasus*. In order to achieve the clearest results and to avoid the possibility of influence from an underlying older original, MELCHERT based his study on texts whose date of composition clearly belongs to the Neo-Hittite period and which can be linked to a certain Hittite king post-Šuppiluliuma I (ca. 1355–1320 BCE). His claims regarding the distribution of *-eš* vs. *-uš* for the nominative-accusative plural are therefore, strictly speaking, only valid for Neo-Hittite original texts, although this does not rule out the possibility that Neo-Hittite copies of older texts exhibit the same linguistic features that MELCHERT attributed to the Neo-Hittite of the post-Šuppiluliuma I period. The present study will not follow these chronological restrictions and so will not exclude examples from Neo-Hittite copies of older texts. Another important finding of MCINTYRE’s thesis is that

¹ By regular sound law from a pre-Hittite **-amuš*, with *u > m / _ u*.

² I wish to thank Craig Melchert again for sending me a scanned copy of her unpublished thesis.

texts of the time of Muršili II (ca. 1318–1290 BCE) are transitional insofar as they still exhibit non-syncretic forms next to *Einheitskasus*-forms.³ It is reasonable to assume that the rule to be put forth in this article for participial forms of the later language also underwent a similar or the same transitional period. Some exceptions to be discussed in § 5 below could indeed be due to the fact that the rule was not yet fully functional at the time of composition of these texts.

Examples of participles with accusative force with the ending *-eš* instead of expected *-uš* all stem from Neo-Hittite (NH) originals or copies of older compositions (Old Hittite [OH] or Middle Hittite [MH]) in Neo-Hittite (NS) or late Neo-Hittite script (late-NS)⁴. They are given here in alphabetical order followed by the number of the example in which they will be discussed in the course of the present article:⁵

³ E.g. nom.pl.c. *antuḫšeš* (NH [Murš. II] KUB 19.37 iii 25, NH [Murš. II] KUB 19.50 iv 19); see MCINTYRE (1986: 40). It is not only the *Einheitskasus*-system which is still in a state of transition in the texts of the period of Muršili II. Another transitional trait in those texts is the replacement – be it analogical or phonological – of *-je-* by *-ja-* in the verbal paradigm of *-je/a*-stems. In Muršili II texts we still find several forms in *-je-* such as *ti-i-ez-zi*, *i-e-ez-zi*. In the period of Muwatalli we find merely two *-je-* forms, and by the time of Ḫattušili III none at all; cf. the list of forms in MELCHERT (1977: 33–34).

⁴ The palaeographic datings are taken from the online database *Konkordanz der hethitischen Keilschrifttafeln* (<http://www.hethport.uni-wuerzburg.de/hetkonk/>). The datings of the composition are in most cases those given by the authors of the *Chicago Hittite Dictionary (CHD: passim)*. Examples and instances of participial forms cited or referred to in this article are taken from the data collection compiled for my doctoral thesis (FROTSCHER 2013). The corpus consists of the data provided by the relevant dictionaries (*CHD*, *HED*, *HEG*, *HIL*, *HW*², *MLHH*, and *CRG*), supplemented with occasional additional findings. Although one can be fairly confident that most of the *types* are included, the corpus does not comprise all *tokens*. It is therefore not exhaustive, yet arbitrary and large enough to allow extensive postulates and assumptions regarding the linguistic behaviour of the Hittite *-ant*-participle. Translations are mine throughout, unless otherwise indicated.

⁵ Here and in the following, I shall adhere to the practice (established by KLOEKHORST in several of his publications; cf. e.g. KLOEKHORST 2007, 2014 and *HIL passim*) of indicating the membership of a given verb to the *mi-* or *hi-*conjugation by using the upper-case 3rd sg.prs.act. ending ^o.*zi* and ^o.*i*, respectively, instead of the 1st sg.prs.act. endings ^o.*mi* or ^o.*(b)hi*. Although the latter notation is in line with the respective labels *mi-* and *hi-*conjugation, of which the former looks back on a long history within the field of Indo-European studies, one should refrain from it for practical reasons, as it does not allow for the possibly important distinction between *-a* and *-ta* middles, which is only visible in the 3rd sg., nor for the distinction between *mi-* and *hi-*conjugation in Luwian, where the 3rd sg.

- ar-kán-te-eš* (OH/NS KBo 2.12 v 13) ← *ār-k-* / *ark-* ‘to mount (sexually), to tup’ (4)
a-aš-ši-ja-an-te-eš (OH/late-NS KUB 20.92 i 12) ← *āšš(i)e/a-* ^{(r)a(r)} ‘to be loved’ (11)
ḥa-aš-ša-an-te-eš (NH KUB 21.38 i 61) ← *ḥāšš-* / *ḥašš-* ‘to give birth (to)’ (2)
ḥu-u-i-iš-ya-an-te-iš (MH⁷/late-NS KUB 39.7 ii 12) ← *ḥu(i)šye/a-* ^{zi} ‘to live, to be alive’ (10)
ša-ra-ku-ya-an-te-eš (OH/NS KUB 35.148 iii 39) ← *šara(k)kuye/a-* ^{zi} ‘to water (animals)’ (3)
ši-ja-an-te-eš (NS IBoT 2.131 obv. 21) ← *šai-* / *ši-* ‘to impress, to seal, to shoot’ (12)
šu-u-(ya)-an-te-eš (NH KUB 55.38 ii 10; OH⁷/late-NS KBo 4.9 i 17) ← *šūye/a-* ^{zi} ‘to fill’ (7)
↳tar-uh-ḥa-te-eš (NH KUB 19.55+ l.e. 2) ← *tarḥu-* ^{zi} ‘to defeat, to overcome’ (1)
te-ja-an-te-eš (NH/late-NS KUB 10.91 iii 16) ← *dai-* / *ti-* ‘to put, to set, to lay’ (9)
ú-nu-ya-an-te-eš (NS KBo 15.12: 8) ← *unu-* ^{zi} ‘to adorn, to decorate, to deck’ (5)

There is one example found in a copy of an OS original that is possibly written in Middle Hittite (MS) script. The palaeographical dating, however, is not secure:

- ḥu¹-iš-ya-an-te-eš* (OH/MS⁸ KUB 11.1 iv 16) ← *ḥu(i)šye/a-* ^{zi} ‘to live, to be alive’ (6)

§ 2. It is remarkable that instances of *-ant*-participles with accusative force but with the ending *-eš* instead of expected *-uš* are, almost without exception, conjunct participles or predicative participles, never attributive or substantival participles. Instead of the very common but uninformative term *conjunct participle* (*participium coniunctum*), which was coined in opposition to the term *absolute participle* (*participium absolutum*), I shall rather use the term *adverbial participle*⁶, which better captures the syntactic function of this kind of usage: Adverbial participles constitute an independent ad-

verbial clause within the sentence, providing additional information with regard to the verbal action expressed by the predicate, although they still exhibit grammatical concord with one of the arguments (usually subject or object) of the sentence, whereas the attributive participle is part of a noun phrase only, providing information with respect only to its head noun.

There are three examples of predicative participles with accusative force showing the desinence *-anteš* (1–3):

- (1) NH⁷ KUB 19.55+ l.e. 1–2⁸
[nu⁷=uš⁷/šmas⁷=kan⁷] (2) [IŠT]’U’^{GIŠ}TUKUL <⁷taruḥḥa⁷teš ŪL anda uḥḥu[n]
 ‘[And⁷] (2) I did not consid[er] (1) [them⁷/you⁷] (2) defeated [b]y weapons.’
- (2) NH (Puduḥepa / Ḥattušili III) KUB 21.38 i 60–62⁹
[DU]MU.MUNUS^{MEŠ} LUGAL kuiēš ŠÀ É^{7I} uemijanun nu=m[u=za=ka]n ŠU’-i’ ḥāšer n=aš=za ammuḥ (61) [šalanun]un ‘ka’rū=ma kuiēš ḥaššanteš [u]emijanun nu apūšš=a (62) [šalanun] n]=aš { ^{MEŠ} }
EN^{MEŠ} KARAS^{HI.A} ijan[u]n
 ‘The [pri]ncesses, whom I found inside the palace, gave birth under m[y] supervision (lit. in m[y] hand) and I (61) [rais]ed them (i.e. the newborns). And also those whom I [f]ound already born (62) [I raised], and I made them { (erasure) } commanders of the troops.’
- (3) OH/NS KUB 35.148 iii 36–39¹⁰
nu=ššan U[R].TUR IGI^{HI.A}-ūait ēpmi x[] (37) nu kišan memaḥḥi (38) ijanza ijanza dakkudakuḥan[teš⁷] (39) ijanzi šarakuḥanteš ijan[zi] (40) GU₄-uš ^{HI}kizzumija dakkudaku’uāer’ (41) ‘UDU’-un ḥīlaš dakuḥuāer UR.GI₇ ḥarpi K[I.MIN] (42) [ŠA]Ḥ ḥūmmi K.I.MIN
 ‘And I (i.e. Zuwi, the sorceress) catch the little d[og] with the eyes. (37) And I speak thus: (38) “A sheep (is) made. They impound (?)”¹¹

is, in fact, the only diagnostic paradigmatic form (on the latter see FROTSCHER 2012 [2013]: 139¹, 157⁽³⁸⁾). The signs < and < are taken directly from the cuneiform writing and stand for the single and double gloss-wedge, respectively.

⁶ Throughout the present study the term *adverbial* will be used for this kind of syntactic usage. For an explanation and extensive discussion of this term see HEINE 1972 (with further references). Another term often found in the literature for this syntactic usage is *appositive participle*, which is especially common in the field of Germanic studies (cf. e.g. DAL 1952 or the eponymous study by CALLAWAY 1901), but seems to have taken its origin in linguistic descriptions of Greek, the earliest attestation known to me of this term being found in KRÜGER 1843 (notably pp. 198–199). A more recent term is *depictive participle*, which rather refers to its overall pragmatic function than to its syntactic behaviour; see on this term e.g. SCHULTZE-BERNDT / HIMMELMANN 2004 and HIMMELMANN / SCHULTZE-BERNDT 2005 (with further references).

⁷ This text, known as the Milawata-letter, dates probably from the time after Muršili II.; cf. HEINHOLD-KRAHMER (1983: 94–95⁽⁷⁴⁾ with further references).

⁸ Ed. HOFFNER (2009: 320); trans. BECKMAN (1999: 146).

⁹ Ed. EDEL (1994: 1220–221), HOFFNER, *op.cit.* 287; trans. BECKMAN, *op.cit.* 134.

¹⁰ Ed. HAAS (2003: 578⁽¹⁰¹⁾).

them (lit. make them **impound[ed]**), (39) they water them (lit. mak[e] them **watered**). (40) They impounded the ox in the shed. (41) They impounded the sheep in the pens. The dog in the kennel (?) *d[itto]*. (42) The [pi]g in the sty *ditto*.⁷

In examples (1) and (2) above it is a *verbum videndi* – either *sensu stricto* (*anda au(š)-i(zī) / u-* ‘to consider, to regard’) or in the broader sense (*yemi-je/a-zī* ‘to find’) – that is used with a predicative participle.

In (3) the two predicative participles form part of a very rare periphrastic causative construction consisting of the light verb *ijē/a-zī* ‘to do, to make’ + the main verb as a participle. This construction is, to my knowledge, only attested once more in a treaty of Tudḫaliya IV (KBo 4.14 iii 23–24): *tuk=ma karū kuit kē INIM^{MES} peran GAM tijan* (24) DÜ-nun ‘But I have already put (lit. made put) these words down for you’. Alternatively, one could interpret example (3) differently by taking *ijanzi* as the 3rd pl. act. of *i-zī* ‘to go’, thus avoiding the assumption of a very rare periphrastic construction. This interpretation would lead to a translation ‘they go impounded, they go watered’ with the participles being adverbial participles. This alternative interpretation is, however, unlikely for two reasons: Firstly, active forms of the verb ‘to go’ are restricted to the older language (mostly OS, sometimes MH/MS texts) and are therefore not expected in a Neo-Hittite copy. Secondly, the context is clear about the fact that the animals are figurines, which are naturally incapable of walking. Besides, they are described as being figuratively impounded. In any event, this alternative interpretation would also be in line with our claim that predicative as well as adverbial participles exhibit a nominative-accusative desinence *-anteš* instead of *-anduš*.¹²

Other instances of participles with accusative force showing the desinence *-anteš* include adverbial participles. It is not always easy to make a distinction between attributive and adverbial usage. From a formal point of view only preposed participles can be safely identified as attributive

participles, whereas postposed participles could either be attributive or adverbial.¹³ In such cases, whether a participle is to be considered attributive or adverbial largely depends on the interpretation of the sentence and of the semantics provided by the participle in question. An attributive participle is restrictive and provides semantic information only for its head noun, whereas an adverbial participle provides additional information, regarding the noun phrase it is agreeing with, within the general context of the verbal action expressed by the predicate. In contrast to attributive participles, adverbial participles therefore very often only express a temporary quality of the noun phrase they are agreeing with – a quality which is only valid within the time frame covered by the main predicate, of which the participle is an adverbial argument. Based on these considerations, the participles in the following seven instances (4–10), are to be classified with a high degree of certainty as adverbial rather than as attributive participles:

(4) OH/NS KBo 2.12 v 9–14¹⁴

I UDU *šuppištuḫaran* (10) *natta arkantan* (11) MUNUS *išpunnalaš dāi* (12)
X UDU^{HLA} *šuppištuḫaruš* (13) *natta arkanteš* (14) LÚ^{MES} URU *Zippalanda danzi*

‘One sheep, pure, (10) not tuppéd, (11) the *išpunnala*-woman takes. (12) Ten sheep, pure, (13) not **tuppéd**, (14) the men of Zippalanda take.’

(5) NS KBo 15.12: 7–8¹⁵

*nu TI-anduš [tarpallius? namma?]*¹⁶ (8) [LÚŠU.DA]B MUNUS^{TUM} *ja unuanteš šarā uḫadanz[i]*

¹³ Cf. HOFFNER / MELCHERT (2008: 339) regarding the position of attributive participles within the noun phrase in Hittite, which less often than regular adjectives precede their head noun. It must, however, be stressed that the prepositive position of participles is not at all rare, as claimed in HOFFNER / MELCHERT, *loc.cit.* In my data collection 258 (21.8%) – i.e. more than a fifth – of the attributive participles are preposed, whereas 927 (78.2%) are postposed to their head noun.

¹⁴ Ed. POPKO (1994: 106–107), who, however, translates *arkant-* as an attributive participle with the meaning ‘zerlegt’ as if belonging to the homophonous verb *ārḫ-ⁱ / ark-*, which designates a certain action of the slaughter procedure: ‘Ein hellschimmerndes, nicht zerlegtes Schaf nimmt die išpunnala-Frau. Zehn hellschimmernde, nicht zerlegte Schafe nehmen die Leute von Zippalanda’ (boldfacing mine).

¹⁵ Ed. KÜMMEL (1967: 126–127), who also translates *unuanteš* as an adverbial participle: ‘[...] sobald man damit fertig ist, führt man lebende [Substitute,] [einen Gefange]nen und eine Frau **geschmückt** herauf’ (boldfacing mine).

¹¹ The translation of *dakkudakuḫan[teš]* as ‘impounded’ (Germ. ‘eingepfercht’) is only tentative; cf. TISCHLER’s brief overview of all occurrences of this verb in *HEG* III, 52. TISCHLER restores the broken form in question as a 3rd sg.prs.act. *da-ak-ku-da-ku-ḫa-a[n-zī]*, which is, however, extremely unlikely in consideration of the fact that there is a finite form, *ijanzi*, immediately following.

¹² HAAS, *loc.cit.* in his edition of the passage regards the first participle as substantival, the second not as a participle at all, and translates: ‘[...] man verfertigt die **ingesperreten** (Tiere als Figuren); [man fertig]t sie an als **šarakuwant-Figuren**’ (boldfacing mine).

'And [moreover²] living [substitutes²], (8) [a capti]ve and a woman, they bring up adorned.'

- (6) OH/MS² KUB 11.1 iv 16–17¹⁷ (|| OH/NS KBo 3.67 iv 3–4)
 [(m)]ān=aš 'att' iš¹⁸ **hu'išūanteš**¹⁹ šarrana[š šer ...] (17) [kuu]atqa ue-
 rizzi
 '[(I)]f he, [because of] the shar[e ...], (17) [som]ehow summons (16)
 the fathers, **alive / living** (i.e. whilst they are (still) alive / living) ...'

¹⁶ Amended after the parallel text KUB 17.18 ii 17–18 (ed. KÜMMEL, *op.cit.* 127–128), which reads *nu hūišūanduš na[mm]a tarpalliuš LÚ MUNUS=ja š[arā]* (18) *uṣadanzi* 'And more[ove]r living substitutes, a man and a woman, (18) they bring (17) u[p]'.
¹⁷ Ed. HOFFMANN (1984: 52–53).
¹⁸ The nom.-acc.pl. 'at-ti'-iš (dupl. at-te[-eš]) instead of expected *attuš* (non-syncretic acc. or syncretic nom.-acc. of a stem other than a *t*-stem) of the *a*-stem *atta* 'father' is remarkable. It seems as if the word was treated as a *t*-stem instead of as an *a*-stem and was then also subject to MELCHERT's rule regarding its syncretic form. This would prove a Neo-Hittite date of the copy. Alternatively, *attiš* could also represent the plural of a luwoid stem with *i*-mutation **atta/i*-. The nom.(-acc.) of an *i*-stem in Neo-Hittite is occasionally -iš < *-ieš (see on this development MELCHERT 1995: 271–272) instead of the regular -ēš < *-ejes. Especially with kinship terms we frequently encounter nom.(-acc.) plural forms in -iš, which indirectly suggest luwoid *i*-mutation: e.g. *ha-an-ni-iš* (7) *at-ti-eš an-ni-iš* (nom.) 'grandmothers, (7) fathers, (and) mothers' (NS KUB 17.29 ii 6–7), *ha-an-ni-iš hu-uh-ḫi-iš* (acc.) 'grandmothers (and) grandfathers' (MH/NS KUB 30.24 ii 23), *šeš^{MEŠ}-iš* (nom.) 'brothers' (OH²/MS² KUB 36.106 rev. 8), although no unambiguous *i*-stem variants of these kinship terms are attested; but cf. also acc.pl. *anniuš* 'mothers' (OH/NS KBo 22.5 obv. 8), which points towards a luwoid *i*-stem and is treated in the same manner as e.g. the luwoid acc.pl. *išpantiuš* (NH [Murš. II] KBo 4.4 iii 31) of the consonant stem *išpant-* c. 'night' or the acc.pl. *tarpalliuš* (NH [Murš. II] KBo 4.6 obv. 28 [cf. example (21) below], NS KUB 17.18 ii 17 [cf. footnote 16 above]) of the luwoid agent noun in -*alli-* (LÚ) (𐎠) *tarpalli-* '(ritual) substitute'. Note that the non-syncretic accusative form in -*i-uš* of luwoid stems with *i*-mutation has survived well into Neo-Hittite (cf. *tarpalliuš* [Murš. II]), where it stands right next to syncretic forms in -iš < *-ieš (*huḫhiš* etc.) or to forms with the regular Hittite, i.e. non-luwoid, ending -ēš.

¹⁹ Written *TI-iš-ya-an-te-eš* which could represent a sumerographic spelling followed by a rather long phonetic complement with only the first phoneme /h/ being omitted. Such a spelling would, however, be entirely unparalleled in the Hittite corpus, where sumerographic writings of this lexeme always exhibit a much shorter phonetic complement covering only the participial suffix and the ending: *TI-an-t/d^o*. Therefore, *TI* (𐎠) is probably an error for intended *HU* (𐎠). This spelling error occurs frequently; see footnote 41 for another example.

- (7) OH²/late-NS KBo 4.9 i 16–19²⁰
 II *ḫuppar* KÜ.BABBAR *išpantuziaš* (17) GEŠTIN-*it šūūanteš šuppaš*
 (18) ZAG-*naz GÜB-lazz=iṣa* (19) *tianzi*
 'Two silver libation vessels, (17) **filled** with wine, (19) they place (18)
 left and right (17) of the sacrificial meat.'
- (8) NH KUB 55.38 ii 9–11²¹
 IV ^{URUDU} *kantašuy[a]lliš IŠTU* GEŠTIN KAŠ (10) *marnuit ual^h[ḫi]t*
šūūanteš (11) ANA PANI DINGIR^{LIM} *tianzi*
 'Four *kantašuy[a]lliš*-vessels, (10) **filled** (9) with wine, beer, (10) barley
 beer, (and) *ual[ḫi]-*, (11) they put before the deity.'
- (9) NH/late-NS KUB 10.91 iii 15–16²²
nu=kan III ^{NINDA} *ijattiuš IŠTU INBI* (16) GA.KIN.AG *tejanteš I*
^{NINDA} *pulliššā=ia* ME-*i*
 'Three *ijatti*-breads – (16) **covered** (15) with fruits (16) (and) cheese –,
 and one *pullišša*-bread (s)he takes.'
- (10) MH²/late-NS²³ KUB 39.7 ii 12–13²⁴
*hūišūante/išš=a*²⁵ *naššu* V *lahḫanza* (13) *našma* VI¹ *la(ḫ)hanza*^{MUSEN}
appanzi

²⁰ Ed. BADALI / ZINKO (1994: 22–23); trans. KLINGER (2008: 198).

²¹ Ed. GRODDEK (2002: 63).

²² Ed. HOFFNER (1974: 165), STARKE (1990: 512¹⁸⁸⁸).

²³ For the dating of the Hittite Death Ritual cf. KASSIAN / KOROLĚV / SIDEL'TSEV (2002: 12–13), who reckon with an original Old Hittite composition appurtenant to the Hattic cult layer, which was later subject to revision under Hurrian influence during Middle Hittite times. Since there is no clear evidence that the surviving Neo-Hittite copies of the Death Ritual were directly taken from an Old Hittite original, I tentatively assume that the ultimate exemplar underlying the Neo-Hittite copy was a Middle Hittite one, whence the notation 'MH²/(late-)NS' for texts of the Death Ritual.

²⁴ KASSIAN / KOROLĚV / SIDEL'TSEV, *op.cit.* 492–493.

²⁵ The desinence is written with the signs TE-IŠ, which can be read either -*te-eš*₁₅ or -*ti*₇-*iš*. The latter would be an instance of an occasional sandhi phenomenon (-*eš* > -*iš* before clitic elements) attested from Middle Hittite on and described by SIDEL'TSEV (2002) and FROTSCHER (forthcoming a). The duplicate of KUB 39.7 probably also shows the same nominative-accusative form in -*anteš*, even though the crucial part of the word is damaged:

‘Also living / alive (13) they catch (12) either five ducks (13) or six²⁶ ducks.’

In all of the above examples (4–10) the semantic information provided by the postposed participle is only temporary within the context of the verbal action. In (10) it is also the peculiar fronted position of the participle that excludes an attributive interpretation.

An entirely different syntactic interpretation of (10) is given by KAPELUŠ in the online edition of the Death Ritual²⁷. She apparently considers *hūš-ante/iš=a* the predication of a nominal sentence, whose first part would be the preceding passage *n=aš XXX lahhanza*, and thus translates: “And thirty *lahhanza*-ducks are living”. Under this interpretation the presence of the enclitic conjunction *=(i)a* is, however, left unexplained. Furthermore, it is extremely unlikely that *n=aš XXX* is anything but the conclusion of an enumeration of different groups of ducks in the preceding lines (ii 8–12), where exactly thirty ducks (in three groups of ten) are listed: *nu ŠA GIŠ^{HIA} X lahhanza^{MUSEN} ijanza* (9) *n=uš IŠTU KÙ.BABBAR hališšijanzi nu ANA V lahhanzani{a}* (10) *SAG.DU^{MEŠ}-ŠUNU GUŠKIN GAR.RA^{SIG} ijanzaš=a X lahhanza^{MUSEN} (11) ijanza išnaš=a X lahhanza^{MUSEN.HIA} ijanza n=aš XXX* (12)

hu-u-i-iš-ya-an-t[e-eš] (MH²/NS KUB 39.8 i 5). The remaining parts of the broken sign just before the lacuna (cf. the handcopy: ) are unmistakably that of the sign TE (). A reading *-d[u-uš]* with the sign DU () yielding a non-syncretic accusative plural form in *-anduš*, is excluded. The remains could theoretically also match those of the sign TU () thus allowing for a reading *-t[u-uš]* of a non-syncretic accusative plural form. However, accusative plural forms of the *-ant*-participle spelled *-an-tu-uš* instead of *-an-du-uš* are scarce. I know of only six examples all stemming from Old Hittite originals or later copies of Old Hittite compositions: *hu-ga-an-tu-uš* (OS HHT 73 i 6), *lu-uk-kán-tu-uš* (OS HHT 75: 6), *ú-i-ta-an-tu-uš* (OH²/MS [Zidanta I/II] KUB 36.108 obv. 6, 8), *a-am-mi-ja-an-tu-uš* (OH/NS KBo 3.34 ii 28), *iš-kal-la-an-ni-an-tu-uš* (OH/NS KUB 58.63 ii 2). This suggests an Old Hittite spelling practice. It is therefore unlikely to appear in a Neo-Hittite copy of a Middle Hittite original such as KUB 39.8 (for the dating of the Death Ritual see also footnote 23).

²⁶ The second numeral appears to be v, but it features a faint additional stroke, which must be interpreted as the sixth stroke of the numeral vi (so already the reading in OTTEN 1958: 36) as attested in the duplicate KUB 39.8 i 6. Otherwise the disjunctive syntax (*naššu ... našma ...* ‘either ... or ...’) would be hard to justify. Alternatively, one could also emend the first numeral to iv¹ as done in KASSIAN / KOROLĚV / SIDEL’TSEV, *op.cit.* 492⁽ⁱ⁾ with regard to the duplicate KUB 39.8 i 6, where the numeral indeed seems to be iv, but is found before a lacuna (handcopy: )

²⁷ Cf. <http://www.hethiter.net/CTH 450.1.1.4> [2011] (last access: 21/08/2015).

lahhanza ‘And of wood **ten** ducks are made. (9) And they plate them with silver. And of five ducks (i.e. out of these ten wooden ducks) (10) the heads are studded with gold. And of *ijan*-wool **ten** ducks (11) are made, and of dough **ten** ducks are made: These (are) **thirty** (12) ducks.’ It now immediately follows example (10) beginning with the additive conjunction *=(i)a* and thus introducing into the discourse a new type of duck (the live ones) different from the previously mentioned ducks (wooden, woolen, and of dough).

§ 3. There is only one assured case of a participle with accusative force showing the desinence *-anteš* that is neither predicative nor adverbial but rather attributive:

(11) OH/late-NS KUB 20.92 i 12–14²⁸

LUGAL-*uš* GUB-*aš* HUR.SAG^{MEŠ} *aššijanteš* (13) ŠA^{DINGIRU} URU^{URU} Zippalanda (14) ^{DINGIRU} URU^{URU} Zippalanda=*ja* II-ŠU *e[kuzi]*

‘Standing the king (14) d[rinks] twice (12) the **beloved** mountains (13) of the storm god of Zippalanda (14), and the storm god of Zippalanda.’

Here it is not the word order that demands an attributive interpretation but the semantics conveyed by the participle within the general context. At first sight the word order of the noun phrase indeed already seems to indicate an attributive syntax, with the participle standing in between the head noun and the genitive attribute ŠA^{DINGIRU} ‘of the storm god’. In fact, it is only the logographic writing with an Akkadian *ša*-genitive that on the surface results in this word order. The linguistic reality, and thus the genuine Hittite word order behind this half-logographic writing is a different one: the genitive attribute in Hittite regularly precedes its head noun²⁹, so that the participle in this example actually follows the whole noun phrase just like in most of the foregoing examples, where the participle was predicative or adverbial. It is still not very likely that in (11) the participle is adverbial. The semantic quality expressed by the participle is not a temporary one as in the examples above. The fact that the mountains are beloved by the storm god certainly is meant

²⁸ Ed. POPKO (1994: 200–201), GRODDEK (2004: 159).

²⁹ Cf. HOFFNER / MELCHERT (2008: 254) for the regular position of a genitive attribute within a noun phrase and the aberrant surface (i.e. only graphic) word order when a logogramme is involved.

as a permanent feature, and the participle is, therefore, to be regarded as attributive.

Also in the following example, (12), which is comparable regarding the word order of the noun phrase and spelling practice to (11), the participle could be attributive, although an adverbial interpretation is also possible:

(12) NS IBoT 2.131 obv. 21³⁰

HUR.SAG *Lihšaš* GĪŠ HUR *šijanteš* ŠA DINGIR *Pi'r'ua* *harzi*

'Mount *Lihša* keeps (lit. holds) the **sealed** wooden tablets of the deity *Pirwa* (attributive)

— or —

'Mount *Lihša* keeps (lit. holds) the wooden tablets of the deity *Pirwa* **sealed** (i.e. whilst they are sealed, in sealed condition).' (adverbial)

We can therefore conclude that out of twelve examples of animate plural participles with accusative force that show the desinence *-anteš* ten (examples 1–10) are either predicative or adverbial. Only one example (11) certainly shows an attributive participle in *-anteš*. The participle of the twelfth example (12) could either be attributive or adverbial.

§ 4. There are several examples of a plural participle with accusative force in Neo-Hittite texts or NS copies that still show the earlier non-syncretic ending *-anduš*. In those cases the participle is almost always attributive or substantival (for rare exceptions see below; § 5, examples 18–21). Three examples of certainly NH composition may suffice³¹ to illustrate

³⁰ Ed. IMPARATI (2004: 359).

³¹ All other instances known to me and not further discussed in the present study of the participial desinence *-anduš* in NS or NH texts follow the same pattern and show the participle in question in attributive or substantival function (in the following list indicated by superscript ^a for attributive (⁺ = preposed position within the noun phrase relative to its head) and ^s for substantival use): *ānduš* ← *ai-ari* 'be hot' (OH/NS KUB 33.49 ii 6^{at}, NS KUB 17.23 ii 13^a, 17^a, NS VBoT 134: 2^{at}), *akkanduš* ← *akk-^l* / *akk-* 'die' (NH KBo 3.3 i 16^s, 24^s), *aranduš* ← *ar-^{ta(ri)}* 'stand' (OH/NS frgm. KUB 33.13 ii 17^s), *appanduš* ← *epp-^{z1}* / *app-* 'take, seize' (NH frgm. KUB 23.42 obv. 7^{at}), *SI×SÁ-anduš* ← *hantae-^{z1}* 'put in order, joint, repair, determine' (NH KUB 22.65 viii 29^{at}), *harpanduš* ← *harp-^{ta(ri)}*; *harp-^{z1}*, *harpae-^{z1}* 'join one side; heap up' (MH/NS KUB 27.16 iv 26^a), *hattanduš* ← *hatt-^{a(ri)}* 'pierce, stab' (NS KBo 26.88 i 5^{at}), *hūkanduš* ← *huk-^{z1}* / *huk-* 'invoke' (NS KUB 25.27 ii 23^s), *hū(ī)šūanduš* / *TI-anduš* ← *hu(i)šue/a-^{z1}* 'live, be alive' (OH/NS

this morphosyntactic behaviour: Examples (13) and (14) are found in the same text, the deposition of Ukkura, which should likely be attributed to the time of Puduḫepa / Ḫattušili III. The two participles *SIG₅-anduš* (**lāz-zijanduš*)³² ← *lāzizje/a-^{z1/ta(ri)}* 'to set straight, to rectify (active); to be good (middle)' and *duḫarnanduš* ← *duḫarni-^{z1}* / *duḫarn-* 'to break sth. (transitive-active), to break (apart) (intransitive-middle)' are not used adverbially or predicatively but nominally, i.e. substantivally as in (13) or attributively as in (14).

(13) NH (Puduḫepa / Ḫattušili III) KUB 13.35 ii 6–8³³

tamēdani=ma=ua kuedani ANŠE.GĪR.NUN.NA (7) *šarnikzilaš* EGIR-
pa peḫḫi (8) *nu=ua=šmaš* *SIG₅-anduš* *UL=pat peḫḫi*

'But to someone else, whom (7) I give back as compensation (6) the mules, (8) I certainly (=pat) do not give **good ones**.'

[Murš. I.] KBo 3.55 obv. 8[?], NH KUB 17.18 ii 17^{at}, iii 10^a, NH KUB 46.46 ii 16^s), *hūp-panduš* ← *hūppae-^{z1}* 'heap up' (MH/NS VBoT 24 ii 20^{at}), *irḫā(n)duš* ← *irḫae-^{z1}* 'perform sacrifice for a deity (obj.)' (late-NS frgm. KBo 45.25 iv 7^{at}, NS frgm. KBo 45.160: 6^{at}, NS frgm. KUB 25.37 iv 15[?], NS IBoT 2.19: 5^{at}), *karšanduš* ← *karš-^{z1}* 'cut (off), neglect' (NH KUB 22.57 obv. 2^a, 4^a), *[k]inanduš* ← *kinae-^{z1}* 'sift, sieve, sort out' (NH frgm. KBo 21.20 i 17^{at}), *[l]ukkanduš* ← *lukk-^{z1}* 'set fire to, ignite' (OH/NS KUB 33.49 iii 6^a), *nejanduš* ← *nai-^l* / *ni-* 'turn, send' (NS frgm. KUB 17.23 i 29^{at}), *pianduš* ← *pai-^l* / *pi-* 'give' (NH frgm. KBo 13.54: 11[?]), *pānduš* ← *paj-^{z1}* / *paj-* 'go, walk' (NS KBo 10.16 i 7^{at}), *parši(ḫ)anduš* ← *paršije/a-^{z1}* 'break' (OH/NS KUB 2.13 i 24^a, iv 5^a, MH/NS KUB 7.5 ii 9^{at}, MH/NS VBoT 24 ii 33^a, NS KBo 23.15 ii 19^a, NS KBo 24.57 i 5^a, NS KBo 35.76 obv. 5^a, NS KUB 10.52 vi 13^a, NS[?] KUB 12.11 iii 20^a, NS frgm. KUB 25.46 ii 6[?]), *šakkanduš* ← *šakk-^l* / *šakk-* 'know' (NS frgm. KUB 43.69 ii 9[?]), *šakuḫanduš* ← *šakuḫe/a-^{z1}* 'irrigate' (late-NS KUB 51.50 iii[?] 14^{at}), *šammenanduš* ← *šammae-^{z1}* 'create' (OH/NS KBo 10.37 ii 10^a), *šūḫanduš* ← *šūḫe/a-^{z1}* 'fill (up)' (MH/NS KBo 21.34 i 25^a), *dammenanduš* ← *tame(n)k-^{z1}* 'attach, stick, pin' (NH KUB 24.7 iii 70^{at}), *unuḫanduš* ← *unu-^{z1}* 'adorn, decorate' (MH/NS frgm. KUB 60.33 rev. 7[?], NH KBo 26.83: 13^a).

³² The reading behind *SIG₅-ant-* is not entirely certain. Instances of *SIG₅-ant-* could in theory also belong to the adjective *āššūant-* 'good', a form enlarged by the suffix *-(a)nt-* or *-yant-* of the adjective *āššu-* / *āššay-* 'good', in which case the example would not contain a participle but an adjective. Longer phonetic complementations, such as in *SIG₅-zi-ja-mi* (OH/NS KUB 33.24 i 44, 45) or *SIG₅-ja-at-ta-at* (NH KBo 4.8 ii 21), affirm, however, that *SIG₅* was indeed the sumerogramme at least for *lāzizje/a-^{z1/ta(ri)}*. Nonetheless, it is still possible that *lāzizjant-* is not a participle of the verb *lāzizje/a-^{z1/ta(ri)}* but an *-(a)nt-*adjective of its derivational basis *lāzzi-* 'good', which may also be the lexeme underlying the writing *SIG₅-in* (**lāzzin*), for which see HEG II, 49.

³³ Ed. WERNER (1967: 6–7); trans. HOFFNER (2002: 58), WEITENBERG (1983: 183).

(14) *ibid.* (+ KBo 16.62) iv 11–12³⁴

našma=ua ^{GIŠ}DUBBIN LUGAL SIG₅-*andan* (12) *pāi ku'e'danikki*
EGIR-*pa=ma=ua duḫarnanduš* III *dāi*

'Or (if) (12) he gives someone (11) a good wheel of the king, (12) but afterwards he takes three **broken ones** (lit. broken three [attributive]) ...'

Also the following example (15) from a NH original, an oracle inquiry for the Hittite king Urḫi-Teššub, i.e. Mušili III, contains a participial form in *-anduš* (*šekkanduš* ← *šākk-*¹ / *šakk-* (NH also *šekk-*) 'to know') in attributive function (preceding its head noun):

(15) NH (Mušili III [Urḫi-Teššub]) KBo 23.114 obv.[?] 23³⁵

[^{DINGIR}Zaḫa]lliš ^mUrḫi-^{DINGIR}U-^{ub} *šekkanduš=pat* *uāškuš* *šer*
TUKU.T[UKU-(u)anza SIxSÁ²-at²]

'[(If) the Zawa]lli-deity of Urḫi-Teššub [(is) / has been[?] determined[?]] ang[ry] because of the **known** offenses only (=pat) ...'³⁶

The same phrase is also attested in another oracle inquiry (late-NS KUB 16.17 ii 1–2) within a rather unclear and fragmentary context: '*kī kuit*' NU.'SIG₅-*ta*' nu ANA DINGIR^{LIM} *ku[iš/t²]* (2) *šekkanduš uāškuš n=aš=kan* [...]³⁷ Despite the unclear interpretation of this passage, the attributive function of the participle is ascertained by the word order (*šekkanduš* preceding its head noun *uāškuš*).

According to MELCHERT's rule, one would expect the *Einheitskasus* in *-anteš* in those cases, because SIG₅-*ant-*, *duḫarnant-* and *šekkant-* are -(^o)*t*-stems found in a clearly Neo-Hittite text. The fact that one still finds the distinction between *-anduš* (accusative) and *-anteš* (nominative) in nominal participles (attributive or substantival) in Neo-Hittite shows that MELCHERT's rule does not apply to *-ant*-participles.

Even more informative are the following two examples, (16) and (17), from the Death Ritual, even though they do not come from Neo-Hittite orig-

inal compositions. Here we find two participles that are clearly attributive (preceding their head nouns) and which show the desinence *-anduš* in the same text (cf. example (10) above) where the respective adverbial participle shows the desinence *-anteš*. It is, however, not only their position within the noun phrase which proves that these participles are attributive. The ducks, which were described as having been caught alive (by the adverbial participle *ḫuišḫanteš*) in *ibid.* ii 13 (example 10), have now become an established referent within the discourse with the quality expressed by the participles now being a permanent one:

(16) MH[?]/late-NS KUB 39.7 ii 18–19³⁸ (I MH[?]/NS KUB 39.8 i 14–16)

ḫuišḫanduš=ma=ššan laḫḫan[zamuš ... (ḫališš)ijan]daš (19) *laḫ-ḫanzamuš*^{MUŠEN.HIA} *anda ḫamenkan[zi]*

'But the **living** du[cks] (19) they ti[e] to ducks (18) [(pla)t]ed [with ...].'

(17) *ibid.* ii 33–34³⁹

ḫuišḫanduš=a=kan laḫḫ'a'n'z'uš (34) [...]x ALAM *ḫarnū-yan*<<{zi}>>zi

'But the **living** ducks (34) [they ...]x. The statues they burn.'

The same morphosyntactic distinction between attributive *-anduš* and adverbial *-anteš* within one and the same NS text is also made in the passage given in example (5) above, where the preposed and therefore certainly attributive participle TI-*anduš* 'living' is found right next to the adverbial participle *umuḫanteš* 'adorned'.

This clearly shows that in Neo-Hittite there is still no syncretic *Einheitskasus* for the nominative-accusative in plural participles, where we would – according to MELCHERT's rule – expect *-anteš* throughout. Instead, the distinction between nominative *-anteš* and accusative *-anduš* is still made in attributive and substantival participles (nominal usage), whereas in participles with predicative and adverbial function (verbal usage) the case distinction is eliminated, resulting in a nominative-accusative desinence *-anteš*. In other words, the accusative is not marked as such anymore but the former

³⁴ Ed. WERNER, *op.cit.* 12–13; trans. HOFFNER, *op.cit.* 59, WEITENBERG, *op.cit.* 184.

³⁵ Ed. VAN DEN HOUT (1998: 148–149), *CHD* § 27b.

³⁶ The same construction with an attributive participle (*šekkanduš uāškuš*) is also found in more fragmentary context in lines 21 and 25 of the same text.

³⁷ For the rest of the column see the edition by LEBRUN (1976: 194 [N^o 27]) beginning in the middle of line 2.

³⁸ Ed. KASSIAN / KOROLĚV / SIDEL'TSEV (2002: 492–493).

³⁹ Ed. KASSIAN / KOROLĚV / SIDEL'TSEV, *op.cit.* 496–497.

nominative ending *-anteš* is used throughout when the participle is predicative or adverbial, regardless of whether it be semantically nominative or accusative.

§ 5. There are, however, some rare exceptions to this rule. Apart from the one or two exceptional cases discussed above (example (11) and possibly also 12), where an attributive participle with accusative force shows the desinence *-anteš* instead of expected *-anduš*, there are four cases where participial forms with accusative force ending in *-anduš* are used in predicative (example 18) or adverbial function (examples (19) and (20) in NS texts or even in a NH original composition (example (21) with adverbial function), where one would expect *-anteš*:

- (18) NS KUB 59.47 iv¹ 10–11⁴⁰ (I NS KUB 7.46 iv 7–8)
*namma GI^{HLA} šarā hu¹ittijan[*i*]⁴¹ (11) [(n=aš IGI^{HLA})]^A -*ya katta uahnuuanduš tarnanzi*
 ‘Then they pull out (lit. up) the arrows. (11) [(And)] they let [(them)] hang down (lit. turned down) with regard to their [(hea)]ds (lit. eyes).’⁴²*
- (19) MH/NS KBo 3.5 iii 32–33⁴³
INA VI⁴⁴ MUŠI=ma (33) ānduš arḫa aruizzi n=aš tūrijanzi
 ‘But on the sixth night (33) he washes them (i.e. the horses) warm (i.e. whilst they are warmed up), and one harnesses them.’

⁴⁰ Ed. POPKO (1991: 49, 51), GRODDEK (2004: 84).

⁴¹ Written with TI (𐎠𐎵) instead of with HU (𐎠𐎺). For another instance of the same spelling error see footnote 19.

⁴² Here interpreted as a periphrastic causative (admissive) construction with *tarn(a)-i* ‘to let (go)’ as a light verb. For a similar construction employing a different light verb, viz. *iie/a-zi* ‘to do, to make’ + participle, cf. example (3) above. But cf. the alternative interpretation in POPKO, *op.cit.* 51, who translates the participle not as a predicative participle within a causative-like construction with *tarn(a)-* as a light verb, but as an adverbial participle with *tarnanzi* being a full verb: “Dann zückt man die Pfeile und läßt sie mit den Spitzen nach unten **gedreht** hinab” (boldfacing mine). In any event, IGI^{HLA}-*ya* /*sakuu* (acc.pl.n.) is certainly to be analysed as an *accusativus graecus* in this sentence.

⁴³ Ed. KAMMENHUBER (1961: 95–96).

⁴⁴ Differently KAMMENHUBER, *op.cit.* 95⁽¹⁰¹⁾, who emends the numeral VI to v¹ “[...] da andernfalls keine Verrichtung für die 5. Nacht angegeben wäre.”

- (20) NS KUB 17.18 iii 17–18⁴⁵
 ...]x *taknaš* DINGIR^UUTU-aš ANA ÉSAG ʾUDU DINGIR^{MES} LÚ^{MES} ANA ÉSAG MĀŠ.GA[L] (18) [... *app*]anduš⁴⁶ *huiš¹uanduš⁴⁶ anda ḫārijanzi*
 ‘...]x in the pit of the Sun Goddess of the Earth (18) one buries (17) a sheep, in the pit of the Male Deities a ra[m] (18) – [... *cap*]ture<d> (and) living / alive.’
- (21) NH (Muršili II) KBo 4.6 obv. 27–31⁴⁷ (I KBo 55.23: 2–5)
kinuna kāša tuk ANA DINGIR^{LIM} Gaššulawiaš (28) [*tuēl* GEME^{TUM} A]NA GIG *šer apēl tarpalliuš* (29) [I GU⁴ĀB.NIGA I UD(U.“SÍG+MUNUS”.NIG)]A=*ja IŠTU* TUG^{NÍG}.LĀM^{MES} *uāššanduš* (30) [... S]AG.DU-*i kuiēš ḫandanteš* (31) [... *u(arnuū)anz*]i *uppiešta*
 ‘Now, to you, o goddess, Gaššulawiya, (28) [your female servant], because of her disease, (31) has sent her substitutes, (30) [...], which (are) determined for her [p]erson, (31) [... i(n order for them to be burn)e]d: (29) [one fattened cow] and [one (fatten)]ed [e(we)] – clad in festive garments.’
- In (18), (19) and (20) the participial forms in *-anduš*, which would be regular in the older language, where there is no syncretistic tendency towards an *Einheitskasus* whatsoever, could simply represent the original forms of an hypothetic older original. This is certainly possible for (19), a passage of the so-called Kikkuli-text, an originally Middle Hittite composition. There is, however, no clear indication that the two NS texts of examples (18) and (20) are copies of an older original composition. KUB 59.47 belongs to the text

⁴⁵ Ed. GÖRKE, <http://www.hethiter.net/>: CTH 448.2.1.1 [2012] (last access: 21/08/2015).

⁴⁶ Written HU-UŠ- instead of HU-IŠ-, which is probably to be regarded as a simple spelling error (𐎠𐎺 for correct 𐎠𐎺), given that in the same text the word is also written *hu-u-iš-ya-an-du-uš* (ii 17) and *hu-i-iš-ya-an-du-uš* (iii 10). Moreover, participial forms with the original zero grade *huš^o* of the verb *huišue/a-zi* are restricted to OS originals and later copies of Old Hittite texts: *hu-šu-ya-an-za* (OS KBo 25.112 ii 4), *hu-šu-ya-an-da-an* (OS KBo 17.4 ii 14), *hu-šu-ya-an-ta-an* (OH/MS KBo 22.2 rev. 9 | OH/NS KBo 3.38 rev. 25 *hu-u-i-iš-ya-an-da-an*), *hu-uš-ya-an-da-an* (OH/NS [Murš. I] KUB 31.64 iii 14), *hu-uš-ya-an-du-uš* (OH/NS [Murš. I] KBo 3.55 obv. 8), the only exception being the unclear form *hu-šu-ya-an-da* found in a NH vocabulary (KUB 3.110: 4), where the Akkadian and Sumerian columns are broken off. Or could the form *hu-uš-ya-an-du-uš* in KUB 17.18 iii 18 be a vestige of an underlying older original of this NS text?

⁴⁷ Ed. TISCHLER (1981: 14–15); trans. SINGER (2002: 72 [N^o 15]).

group of CTH 418, which only consists of NS texts. There are also no evident linguistic features appurtenant to the older language in the texts of this group that would suggest an older date of composition. KUB 17.18, on the other hand, belongs to CTH 448, which also includes texts in Middle Hittite script, so that influence from an older (MH) original is, at least, possible. Whereas influence from an older original is possible for (18–20), the text of (21) is clearly Neo-Hittite and is probably to be dated to Muršili II, at least if one accepts the view, widespread among Hittitologists, that the Gaššul(iy)awiya of this text, on whose behalf the prayer is performed, was indeed his wife. Therefore the occurrence of an adverbial participial form in *-anduš* is contradictory to the morphosyntactic behaviour described on the basis of examples (4–10) above for the later language. Note that *yaššanduš* of (21) is not in accordance with MELCHERT's rule established on the basis of NH compositions either. The example (21) must, for the time being, be regarded as an – as yet – unexplained exception. One should note, however, that example (21) stems from a text of the period of Muršili II. As mentioned above (§ 1 and footnote 3) texts of this period are transitional in several respects. It is conceivable that the form *yaššanduš* is still a vestige of the older language, where an accusative form in *-uš* is morphosyntactically justified.

§ 6. Finally, there are also some exceptional occurrences of participial forms that can be neither reconciled with MELCHERT's rule nor with the morphosyntactic rule established in this study. In three cases, examples (22–24), we find a participle (or lexicalised participle) with the desinence *-anduš* with nominative force. According to MELCHERT's rule one would expect *-anteš* instead, because the regular *Einheitskasus* for $-(^{\circ})t$ -stems is *-eš*. According to the rule postulated here, one would still expect a form in *-anteš* regardless of the syntactic function of the participle. The first two examples, (22) and (23), are found in NH original compositions:

(22) NH (Muwatalli II) KBo 11.1 obv. 33⁴⁸

URU^{DIDL.HIA} *ašanduš* *kuiēš kuēdaš* ANA URU^{DIDL.HIA} *šinapši ēšzi*
n=at uehanzi n=[at EGIR-pa SIG₅-ahhanzi]

'Which towns (are) **inhabited** (lit. settled), for which towns there is a *šinapši*, they inspect them and [restore them].'⁴⁹

⁴⁸ Ed. LEBRUN (1980: 297, 301); trans. SINGER (2002: 84 [N° 19]), DE ROOS (1983: 226).

(23) NH (Muršili II) KUB 24.2 rev. 17⁵⁰ (|| KUB 24.1 iv 16)
 [(*nu šē*)]ššauyaš *hūyaduš* (dupl. IM^{HIA}-*uš*)⁵¹ *ijantar[u]*
 '[(And)] the **winds** [(of pro)]sperity shall blo[w] (lit. go).'

It is conceivable that the syntax of (22) is corrupt and that the form of the participle *ašanduš* ($\leftarrow eš$ -^{a(r)zi} / *aš*- 'to sit (intr.); to settle (trans.>') is to be explained as the result of case attraction, such that the syntagm URU^{DIDL.HIA} *ašanduš* 'the inhabited cities' would constitute an independent nominal phrase, which is the object of *uehanzi*, consisting of the head URU^{DIDL.HIA} and its attribute (attributive participle) *ašanduš*, in which case the form *ašanduš* instead of *ašanteš* is expected. There is, however, no feasible explanation for the form *hūyaduš* 'winds' in (23), a form of *hūyant-* 'wind' showing nasal-reduction. One should keep in mind, however, that *hūyant-* < **h₂uh₁-(o)nt-*, just like its thematised variant **h₂ueh₁-n/nt-o-* in the other Indo-European languages (Lat. *ventus*, Welsh *gwynt*, Goth. *winds* < **h₂ueh₁-nt-ó*⁵²; Ved. *vāta-*, GAv. *vāta-* < Proto-Indo-Iranian **H₂vāH-at-a-* < **h₂ueh₁-nt-o-*), is probably synchronically nothing but a substantive in Hittite, although historically it is the old lexicalised, substantivised *-nt*-participle **h₂uh₁-ónt-* / **h₂uh₁-nt-* 'blowing > wind' of a verb **h₂ueh₁-* / **h₂uh₁-* 'to blow' (cf. Ved. *vāti*, Gr. ἄρει 'blows'). It may therefore lie outside the scope of this study, which postulates a morphosyntactic rule only for regular *-ant*-participles.

Another instance of a participle with nominative force that shows the desinence *-anduš* instead of the expected *-anteš* is found in several almost identical parallel passages from one version of the horse training instructions, the so-called Kikkuli-text, a NS copy of a MH original. In these passages the

⁴⁹ The exact interpretation of *uehanzi* is unclear. Usually, *ueh*-^{zi} / *uah*- / *ueh*-^{a(r)zi} is used intransitively 'to turn (around)'. Here it seems to be used as a transitivum with the object being the enclitic pronoun *=at*. Cf. the translations of SINGER and DE ROOS, who envisage a meaning 'survey, inspect' within the given context: "Those towns that are inhabited and have a *šinapši*-sanctuary, they shall be surveyed and [shall be set right]" (SINGER, *loc.cit.*), "De steden die bevolkt zijn (en) een *šinapši* hebben, zullen die inspecteren en [zij zullen die weer in orde brengen]" (DE ROOS, *loc.cit.*). The *tertium* between 'turn' and 'inspect' could be a meaning 'turn towards, sich etw. zuwenden'.

⁵⁰ Ed. KASSIAN / YAKUBOVICH (2007: 432, 434), SINGER (2002: 56 [N° 9]).

⁵¹ Cf. the parallel in KUB 24.3 iii 39–40: *nu šešduya[š]* (40) IM-*anteš ijandaru*, with the correct and expected form in *-anteš*.

⁵² The shortening is due to Osthoff's law; cf. MEISER (1998: 75), RINGE (2006: 75–78).

participle is probably adverbial; cf. the following example, which is given as a representative for this frequent construction of the Kikkuli-text:⁵³

- (24) MH/NS KBo 3.2 rev.¹ 34⁵⁴
 EGIR-*pa=ja* URU-*ri anda parhanduš uyanzi*
 ‘And they (the horses) come back **rushing** into the city.’

These exceptional forms of the Kikkuli-text can be explained in two ways. Since it is known that Kikkuli was not a native speaker of Hittite and that the text is notorious for errors, one could take the form *parhanduš* as a mere mistake induced by Kikkuli’s misunderstanding of the rule that adverbial plural participles show no case distinction between accusative and nominative. But instead of using the correct desinence *-anteš*, Kikkuli would have used *-anduš*, which in “correct” Hittite would have been used in nominal (attributive or substantival) participles with accusative force only. In other words, Kikkuli would have generalised a different form, namely the old accusative desinence *-anduš*, for the verbal (adverbial and predicative) usage. This scenario would imply, however, that the rule of reduction of case distinction in predicative and adverbial participles was already a Middle Hittite phenomenon (the time of the original composition of the Kikkuli-text), for which our examples presented above do not provide direct evidence, even though a pre-Neo-Hittite dating of this morphosyntactic mechanism is not excluded. Alternatively, *uyanzi* could be regarded as the 3rd pl. act. not of *uue/a-zi* ‘to come’ but of *au(š)-i(zi) / u-* ‘to see’, yielding a translation ‘and back into the city they saw them (the horses) rushing’ with a predicative participle with accusative force. Given that the text is a Neo-Hittite copy of a Middle Hittite original composition and that most of the evidence provided above for the reduction of case distinction in plural predicative and adverbial participles comes from NH texts, one could then regard the form *parhanduš* as a relic of a grammatical system (pre-Neo-Hittite) in which the distinction between *-anduš* (accusative) vs. *-anteš* (nominative) was still being made in predicate participles as well. However, the occurrence of a verb for ‘to see’

⁵³ The same construction is found in MH/NS KBo 3.2 obv.¹ 23–24 (*namma=aš parhanduš* (24) URU-*ja uyanzi*), *ibid.* lower edge 3 (‘EGIR-*pa* [UR]U-*ri parhanduš uyanzi*’), MH/NS KUB 1.13 ii 15 ([E]GIR-*pa=ma=at* | DANNA XX=*ja parhanduš* ‘*u*’*yanzi*), and – with a different verb – MH KUB 1.11 iv 21–22 (*n=aš* | DANNA XX IKU^{H1.A} (22) *parhanduš pānzi* [for a translation of this passage see also the top of p. 83 of this article]).

⁵⁴ Ed. KAMMENHUBER (1961: 140–141).

is very unlikely within the context of an instruction. Furthermore, the deviating parallel passage, which exhibits a different verb, *n=aš* | DANNA XX IKU^{H1.A} (22) *parhanduš pānzi* (KUB 1.11 iv 21–22) ‘and one mile and twenty field (22) they go rushing’ indeed suggests that we are dealing with an intransitive verb of movement in the case of *uyanzi* as well. It is therefore safer to assume an error in the Kikkuli-text, which was perhaps induced by a misunderstanding of the morphosyntactic rule presented in this article.

§ 7. Yet another potential exception to the rule, like those presented in the previous paragraph § 6, namely a nom.pl.c. form in *-anduš*, will be treated here in the manner of an excursus as it does probably not constitute an assured counter-example, since the form in question can only be obtained by restoration. In what follows a novel interpretation of the passage in question, which does not involve a nom.pl. form in *-anduš*, will be presented in example (26).

The damaged form *iš-h[u-u]z-zi-ja-x[...]x* is found in a report by Hattušili III of the campaigns of Šuppiliuma I, in a very vivid battle description. It runs over the break between the two joining fragments (KUB 31.20 and KBo 16.36) and is broken near its end, where there is a lacuna in the middle of the second fragment (KBo 16.36): (~~⋯~~ + ~~⋯~~). MCINTYRE (1986: 28) restores this broken form as *išh[u]zzija[nd]uš* and reckons with a nom.pl.c. in *-anduš* of an adverbial participle *išhuzzijant-* ‘girded’ ← *išhuzzije/a-zi* ‘to gird’:⁵⁵

- (25) NH (Hattušili III) HHT 82 + KUB 31.20 + KBo 16.36 iii 1–10⁵⁶
^{ID}Zulijaš=*ma=kan uyanza* (2) *ēšta n[u]=šši* ^{DINGIR}IŠTAR ^{URU}Šamuha (3) *peran hūuāiš* (4) *nu* ^{ID}Zulijan *uandan* (5) *parā* [*p*]arhiat ‘*n*’=*an=za=an=kan* A-az (6) *išh[u]zzija[ndu]š* šarā (7) *ēpper*’ *n=an[=kan]* ID-i (8) *anda* IŠTU ^{GIŠB}[AN ^{GIŠG}]AG.Ú.TAG.GA IŠTU NA₄ (9) *uālⁿhhihišker nu=šši* ^{DINGIR}IŠTAR ^{URU}Šamuha (10) GAŠAN-*IA palahšan šer ēpta*

⁵⁵ The text is cited here as it is presented in MELCHERT’s Neo-Hittite corpus (available from the author upon personal request) with a tentative translation as would directly follow from his edition. MCINTYRE (1986) does not discuss the passage in detail but merely lists the form – restored as *išh[u]zzija[ndu]š* – under the examples for nom.pl.c. forms in *-uš* of the time of Hattušili III. A new transcription and translation of the text, more in line with the context, is given below in example (26).

⁵⁶ Ed. RIEMSCHEIDER (1962: 111–112), ALP (1977: 644–645), *id.* (1991: 33–35); trans. ÜNAL (1984: 75).

'The Zuliya river (2) was (1) swollen (lit. had come⁵⁷). An[d] Ištar of Šamuḫa (3) supported (lit. went before) (2) him (i.e. the commander). (4) And the swollen Zuliya river (5) she [d]rove away. And (7) they, (6) g[i]rd[e]d, (7) took (5) him (6) up (5) from the water. (7) And (8) in (7) the river (9) they attacked (lit. beat) (7) him (8) with b[ow (and) ar]row (and) with stone(s). (9) And Ištar of Šamuḫa, (10) my mistress, held (her) *palahša*- (a kind of protective garment) over (10) him.'

MCINTYRES restoration is indeed compatible with the remains of the last sign of the word, which could belong to an UŠ (𒍪). This interpretation requires, however, a plural predicate *e-ep-per* 'they took'. It is disputable as to whether the remains of the signs allow for such a restoration of the finite verb. The EP (𒂗) is fully preserved in KUB 31.20 iii 4 (𒂗𒂗𒂗...), followed by a small part of the next sign, whose last section is found on the joining fragment KBo 16.36 iii 7 (... 𒂗). The latter could indeed be a fully preserved PE/IR (𒂗). But the question is whether the gap between the two joining fragments is too big for such a reading, in which case the remains on the first fragment could rather belong to the first part of a TA (𒂗), of which the rest is found on the second fragment. This interpretation would result in a singular predicate *ēp[ra]* '(s)he took'. A singular predicate is in fact what is expected regarding the overall context. It is Ištar who shelters the commander of the Hittite troops with her *palahša*-garment in lines 10-11. Therefore, it is only logical that Ištar is also the one who pulled him out of the water, thereby saving him. A plural form of the predicate and thus also a nom.pl.c. form *išh[u]zzija[ndu]š*, on the other hand, is highly unlikely.

How then can the damaged form *iš-h[u-u]z-zi-ja-x[...]*x be restored instead? The syntactically and contextually conceivable acc.sg.c. form *išh[u]z-zija[nda]n* cannot be reconciled with the remnants of the sign at the end of the word in question. ALP's (1991: 33) restoration in his edition of the text, *iš-hu-uz-zi-ja-a[n-d]a*, a nom.-acc.pl.n. form of the participle, is also unlikely, although the rest of the last sign could indeed be identified with a DA (𒂗).

⁵⁷ Cf. CHD P, 146a: "[...] swollen(?) / flooding(?) (*uwanza*, lit. 'coming') [...]", but *pace* CHD the participle is not contemporary but must be resultative since *=kan uye/a-zi* 'to come' is a telic verb (for the telicising function of *=kan* see COTTICELLI KURRAS 2014 with further literature), whence 'had come' > 'was swollen' referring to the water mass (cf. ÜNAL, *op.cit.* 76: "[...] war gestiegen"); cf. also [¹⁰Zulijaš=*ma=kan*] *mekki uwanza ēšta* (NH [Hatt. III] KUB 19.9 iv 4-5) '[The Zuliya river] had come on in great quantity' > '... was very swollen'.

He translates 'an seinem Gürtel'; but under this interpretation a nom.-acc.pl. of a participle is out of place. One could theoretically assume a fossilised (nom.-)acc.pl.-adverb, such as *munanda* 'secretly' ← *munnae-zi* 'to conceal'. Such adverbs are, however, extremely rare and limited to specific idiomatic usage, which would not be the case with an hypothetical participial adverb *išhuzzija* 'girded'. The most likely account of the passage and of the form in question has recently been presented by the editors of the *HW*² (IV: 1, 166b): *n=an=za=an* (sic! =*kan* erroneously omitted!) *A-az* (6) *iš-h[u-u]z-zi-ja-a[š] ped[i] šarā ēp[ra]* 'And (6) she to[o]k him up (5) from the water (6) at the belt (lit. **at the place of the belt** [*HW*²: "am [Or]t² de[s] Gü[rt]els")]). The remains of the last sign of the word are interpreted as those of a DI (𒂗).⁵⁸ The construction *išhuzzijaš pedi* 'at the place of the belt' is possibly a fixed expression, which is attested a second time in the Ullikummi myth KUB 33.92 + KUB 36.10+ iii 14-15 (I KUB 33.93+ iv 24-25): [(*nu=šši=kan*)] *arunaš* [(15) *išhuzzijaš pedi TÚ*[(*G-aš mān anda pēdan*)]*zi* '[(And)] the sea (15) [(reached)] (14) him (15) [(unto)] the place of his belt [(like)] a garme[(nt)]'.

If we are indeed dealing with an idiom it is likely that *išhuzzijaš pedi* in KUB 31.20+ is also referring to the water level as in the passage from the Ullikummi myth. If so, then *A-az* 'the water', just like *arunaš* 'the sea' in the Ullikummi text, would be the subject of the sentence. It is then the water (*A-az*) of the now swollen Zuliya river which seized (*=za=ēpta*) him (*=an*⁵⁹), the commander, up unto his belt (*išh[u]zzija[š] ped[i] šarā*), instead of Ištar pulling him out of the water (ablative *A-az* /*ūiten(a)t^s*). Under this interpretation *A-az* /*ūiten(a)t^s* is the "ergative" of *ūatar* / *ūitēn-* 'water' with a relatively short phonetic complement exhibiting nasal-reduction.⁶⁰ This interpre-

⁵⁸ Similarly already RIEMSCHEIDER, *op.cit.* 112, who was, however, at the time unaware of the join with KUB 31.20, and who tentatively restores [*tu²-u]z²-zi-ja-aš*] [*pe²-d*], translating "am Plat[ze?] des Heer]lagers?" and adding in a footnote, *op.cit.* 113⁵²: "[...] das Zeichen DI ist nach Foto sicher."

⁵⁹ Or rather *=an=...=an=* with reduplication of the clitic pronoun; on this widespread phenomenon of the later language see the excellent overview in YAKUBOVICH (2010: 357-367).

⁶⁰ For such short complements cf. e.g. "erg."sg. UN^{III.A}-*za* (NH KBo 2.13 obv. 18, 28), UN^{MEŠ}-*za* (NH [Tudh. IV] KUB 44.42 rev. 20) vs. longer complements in UN^{MEŠ}-*an-za* (NS KUB 14.2 i 4), UN^{MEŠ}-*an-na-an-za* (NH [Hatt. III] KBo 3.6 i 26) /*antušannant^s* ← *antušātar-* / *antušann-* n. 'humankind, population'. For the spelling of the nom.sg.c. of *-nt*-stems exhibiting nasal-reduction using the sign *-az* (instead of the commoner *-za* of the non-reduced form) cf. e.g. *li-li-ya-az* (OH/NS KUB 33.24 i 26) /*lilija^{nt^s}* / 'swift', as well as the *-ant*-derivatives *li-in-ki-ja-az* (MH/NS KUB 30.34 iv 7) /*linkija^{nt^s}* ← *ling(a)-c.* 'oath', *tu-uz-zi-ja-az* (MH/NS [Tudh. I] KUB 23.11 ii 9) /*tutti^{nt^s}* ← *tuzzi-* c. 'host'.

tation also fits better within the given context, as the commander is still described as standing in the river when being attacked by the enemy with distant weapons (arrow and bow, stones) in the following lines. Only then Ištar, previously merely briefly mentioned in connexion with her dispelling the river, enters the scene again sheltering the commander, who is still standing belt deep in the river, with her *palahša*-garment from the projectiles hurled at him. Having Ištar pull him out of the water before the attack would be out of context. The local particle *=kan* is then due to the presence of the local expression *išhuzziāš pedi*. The passage can now be translated thus:

- (26) NH (Ḫattušili III) HHT 82 + KUB 31.20 + KBo 16.36 iii 1–10
^{ID}Zulijaš=*mā=kan uyanza* (2) *ēšta n[u]=šši* ^{DINGIR}IŠTAR ^{URU}Šamuḫa (3)
peran ḫūūāiš (4) *nu* ^{ID}Zulijan *uandan* (5) *parā* [p]arḫijāt 'n^z=an=za=
an=kan A-az (6) *išḫ[u]zzija[š pedi]i šarā* (7) *ēp[ḫ]a n=an[=kan]* ^{ID}-i (8)
anda IŠTU ^{GISB}[AN ^{GISG}]AG.Ú.TAG.GA *IŠTU NA* (9) *uā^lḫiḫiškēr*
nu=šši ^{DINGIR}IŠTAR ^{URU}Šamuḫa (10) GAŠAN-IA *palahšan šer ēpta*
 'The Zuliya river (2) was (1) swollen (lit. had come). An[d] Ištar of Šamuḫa (3) supported (lit. went before) (2) him (i.e. the commander). (4) And the swollen Zuliya river (5) she [d]rove away. And the water (7) reach[e]d (5) him (6) (lit. seized him) up unto the b[e]ll[t] (lit. [the plac]e [of the] b[e]ll[t]). (7) And (8) in (7) the river (9) they attacked (lit. beat) (7) him (8) with b[ow (and) ar]row (and) with stone(s). (9) And Ištar of Šamuḫa, (10) my mistress, held (her) *palahša*-garment over (10) him.'

In any event, the passage containing *iš-ḫ[u-u]zi-ia-x[...]*x does in all likelihood not exhibit a morphosyntactically aberrant participial nom.pl.c. form in *-anduš* and is therefore not to be regarded as an assured piece of counter-evidence to the morphosyntactic rule presented in this article nor to MELCHERT's rule.

§ 8. Conclusions: According to the rule formulated by MELCHERT (1995) on the basis of Neo-Hittite original compositions (post-Šuppiliuma I) there is, in Neo-Hittite, no longer a distinction between nominative and accusative in the plural as in the older language. Instead either the accusative form in *-uš* or the nominative form in *-eš* has been generalised for both subject and object function, resulting in an allomorphic *Einheitskasus*. The distribution between *-eš* and *-uš* for this *Einheitskasus* is conditioned only by

the respective stem class: *-t*-stems, apophonic *-u*-stems and the relative pronoun *kui-* take *-eš*, whilst all other (pro)nominal stems, notably thematic nouns as well as the demonstratives *ka/i-* 'this' and *apa-* 'that', take *-uš*. MELCHERT claims that *-ant*-participles behave exactly like other *-t*-stems, generalising *-eš* for subject and object function as shown in table 1 below.⁶¹

(PRO-)NOMINAL STEMS INCLUDING PARTICIPLES		other	<i>-t</i> -stems + ptc.	<i>-u</i> -stems	relative
OLDER LANGUAGE	Subj.	<i>-eš</i>	<i>-(n)(t)teš</i>	<i>-ayeš</i>	<i>kuiēš</i>
	Obj.	<i>-uš</i>	<i>-(n)(d)duš</i>	<i>-amuš</i>	<i>kuiuš</i>
NEO-HITTITE	Subj.	<i>-uš</i>	<i>-(n)(t)teš</i>	<i>-ayeš</i>	<i>kuiēš</i>
	Obj.	<i>-uš</i>	<i>-(n)(d)duš</i>	<i>-amuš</i>	<i>kuiuš</i>

(Tab. 1: NH case syncretisms according to MELCHERT's rule comprising (pro-)nouns and ptc.)

As far as *-ant*-participles are concerned MELCHERT is, however, compelled to admit to several exceptions to his rule, i.e. cases where the desinence of a form with accusative force is still *-anduš*. In a great number of instances we do indeed find a form in *-anteš* with accusative force in NH or NS texts (see the list at the end of § 1). Yet it is very conspicuous that, as shown in § 2, almost all of those passages, 13 cases altogether, feature the participle in either predicative (exx. 1–3) or adverbial (exx. 4–10) function (*participium coniunctum*). There is only one (possibly two) example(s), discussed in § 3, where a form in *-anteš* does not have predicative or adverbial but attributive function (ex. 11, possibly also 12). On the other hand, participles in *-anduš* stemming from NH or NS texts, which would also count as exceptions to MELCHERT's rule, all exhibit attributive or substantival usage (see § 4 with exx. 13–17 and footnote 31 for a complete list of all NH and NS *-anduš*-forms known to me). We must therefore conclude that the syncretism of *-eš* and *-uš* resulting in an allomorphic *Einheitskasus* in *-eš/-uš*, as described by MELCHERT's rule, does not apply to the *-ant*-participle. Instead Hittite, in its later stage, features a twofold system in which a syncretism according to MELCHERT's proposition exists only in 'regular' nouns, as shown in table 2. In the participial system a syncretism under the form *-anteš* (former nominative) is only present in the domain of verbal usage (adverbial and predicative function), whereas the distinction pertaining to the older lan-

⁶¹ In the following tables case syncretisms are indicated by **bold lines**; (former) nominative desinences are shaded grey (*°-eš*), (former) accusative desinences are left white (*°-uš*).

guage between nominative *-anteš* and accusative *-anduš* was still being made in the domain of nominal usage (attributive and substantival function), as shown in table 3:

(PRO-)NOMINAL STEMS		other	-t-stems	-u-stems	relative
OLDER LANGUAGE	Subj.	<i>-eš</i>	<i>-teš</i>	<i>-aueš</i>	<i>kuišš</i>
	Obj.	<i>-uš</i>	<i>-dduš</i>	<i>-amuš</i>	<i>kuiuš</i>
NEO-HITTITE	Subj.				
	Obj.	<i>-uš</i>	<i>-teš</i>	<i>-aueš</i>	<i>kuišš</i>

(Tab. 2: Neo-Hittite case syncretisms according to MELCHERT's rule excluding participles)

PARTICIPIAL STEMS		NOMINAL USAGE		VERBAL USAGE	
		attributive	substantival	predicative	adverbial
OLDER LANGUAGE	Subj.	<i>-anteš</i>	<i>-anteš</i>	<i>-anteš</i>	<i>-anteš</i>
	Obj.	<i>-anduš</i>	<i>-anduš</i>	<i>-anduš</i>	<i>-anduš</i>
LATER (NH?) LANGUAGE	Subj.	<i>-anteš</i>	<i>-anteš</i>	<i>-anteš</i>	
	Obj.	<i>-anduš</i>	<i>-anduš</i>		

(Tab. 3: Morphosyntactic features of the participle as opposed to those of other nominal stems)

In other words, the reduction of case marking towards Neo-Hittite resulting in a system with only three distinct cases in the plural (nominative-accusative, genitive-dative-locative, ablative-instrumental) is not shared by the nominal participle, which still has four distinct cases (nominative, accusative, genitive-dative-locative, ablative-instrumental) when used nominally.

Particularly illuminating and corroborative for the just presented rule applying to participles with object function is the alternation of *-anteš* (verbal usage) and *-anduš* (nominal usage) within one and the same text, such as in KBo 15.12: 7, 8 (ex. 5): TI-*anduš* (attributive) vs. *unuanteš* (adverbial), and KUB 39.7 ii 12 (ex. 10), ii 18, 33 (exx. 16-17): *hūšyanteš* (adverbial) vs. *hūšyanduš* / *hūšyanduš* (attributive). The exact dating of this rule is, however, elusive because not only texts for which a Neo-Hittite composition is certain, but also Neo-Hittite copies of older texts had been taken into consideration. Since the phenomenon described by the rule presented in this study is systematically different from the one discovered by MELCHERT specifically for the Neo-Hittite of the period post-Šuppiliuma I, it is possible that the here presented rule is, in fact, older. In any event, they do not necessarily coincide chronologically.

The behaviour of the participle, which preserves the old case distinction in nominal usage but exhibits a syncretism in verbal usage, is peculiar insofar as it constitutes a systemic inconsistency: Whereas a syncretism or a reduced distinction in the domain of verbal usage is not at all surprising, the participle deviates from other nouns exactly in the domain of nominal usage, as shown in the synoptic depiction of the system in table 4:

		PARTICIPLE				OTHER	-t-STEM	-u-STEM	RELAT.
OLDER LANGUAGE	S	<i>-anteš</i>	<i>-anteš</i>	<i>-anteš</i>	<i>-anteš</i>	<i>-eš</i>	<i>-teš</i>	<i>-aueš</i>	<i>kuišš</i>
	O	<i>-anduš</i>	<i>-anduš</i>	<i>-anduš</i>	<i>-anduš</i>	<i>-uš</i>	<i>-dduš</i>	<i>-amuš</i>	<i>kuiuš</i>
LATER LANGUAGE	S	<i>-anteš</i>	<i>-anteš</i>	<i>-anteš</i>		<i>-uš</i>	<i>-teš</i>	<i>-aueš</i>	<i>kuišš</i>
	O	<i>-anduš</i>	<i>-anduš</i>						
		ATTR.	SUBST.	PRED.	ADV.				
		NOMINAL USE		VERBAL USE					

(Tab. 4: Partial syncretisms in the Hittite nominal system including participles and (pro)nouns)

§ 9. Typological parallels and prospects: I know of no exact typological parallel for this peculiar system, in which participles behave morphosyntactically differently from other nominal stems. There is a *quasi* parallel in French: adverbial participles are uninflected ending in *-ant* with no grammatical concord regarding gender and number, whereas attributive participles are inflected (sg.f. *-ante*, pl.m. *-ants*, pl.f. *-antes*). The diachrony which stands behind the French system is, however, entirely different from that of Hittite. In French the uninflected form of the adverbial participle is a direct continuation of the Latin gerund in the ablative in *-ndō* (*chantant* < *cantandō*) and consequently exhibits no inflexion, whilst the attributive participle continues the Latin *-nt*-participle (*chantant* < (*)*cantante(m)* < *cantantem*). By regular sound changes (viz. the loss of final vowels and subsequent final devoicing⁶² of the gerund formant) both forms have simply

⁶² Examples for the devoicing of secondary final dentals after a nasal apart from the gerund are: *dont* < *dē unde*, *souvent* < OFr. *sovent* < *sub inde*; cf. ALESSIO (1951: 302-303), SCHWAN / BEHRENS (1970: 90).

coalesced.⁶³ In Italian, for instance, both forms are still kept apart (cf. gerund *cantando* < *cantandō* vs. participle *cantante* < *cantantem*). Furthermore, other than the Hittite system, the ensuing synchronic system of French shows a reduction of morphological distinctions with regard to gender and number. The Hittite system on the other hand exhibits a reduction of case distinction. Another possible partial parallel is found in Old High German. Here, the so-called ‘uninflected’ form in *-nti* is mainly used when the participle is adverbial or predicative.⁶⁴ When the participle is attributive forms of pronominal origin such as the nom.sg.m. *-ntēr* are used. But this system is not an exact parallel either because it applies to all adjectives and not only to participles.⁶⁵

It is a task for future research to investigate, from a typological perspective, the likelihood of a system as the one presented here for the later period of Hittite. On the other hand, the rule presented draws on a large number of examples with almost no counter-evidence, whereas at the same time it is able to account for all of the exceptions to MELCHERT’s rule. It lies outside the scope of this study to examine whether the rule established here applied – at least as a tendency – also to regular adjectives. If so, the system would indeed be less peculiar and exceptional typologically. Another unresolved question is that of the exact dating of the rule. On the basis of the material used in this study, it was not possible to determine the exact dating. If adjectives could indeed be shown to exhibit a morphosyntactic behaviour similar to participles, one could hope to be able to solve this chronological question on the basis of a much larger material foundation.

⁶³ Cf. RHEINFELDER (1967: 201–202). Of the numerous studies on the functional difference between the gerund and the participle in French cf. for instance WEERENBECK 1927.

⁶⁴ The adverbial function of the participle is in all Germanic languages (save Gothic) utterly rare (with the exception of some participles derived from intransitive verbs, notably verbs of movement) and must hence be considered unidiomatic; see the comprehensive overview including earlier literature in KILLIE (2007: 150–151), but cf. also – differently (for Tatian and Otfrid) – LÜHR (2012: 422–427), who regards the adverbial usage as idiomatic and independent of Latin. In Old High German sometimes a deparicipial adverb in *-nto* (lenited *-ndo*) is used instead; see on this FROTSCHER (forthcoming b).

⁶⁵ The distribution between the ‘uninflected’ form and the pronominal forms of the adjective is not clear-cut. When used as attributes, adjectives can either show the ‘uninflected’ ending or the pronominal ending (*blint man* or *blintēr man*). In predicative usage the ‘uninflected’ forms are, however, more frequent (*der man ist blinte*; rarely *der man ist blintēr*); cf. BRAUNE / REIFFENSTEIN (2004: 219), RANHEIMSÆTER 1945, FLEISCHER 2007.

BIBLIOGRAPHY

- ALESSIO, Giovanni. 1951. *Grammatica storica francese. Parte Prima: Introduzione – Fonetica* (Collana di grammatiche storiche neolatine 3). Bari: Leonardo da Vinci – Editrice.
- ALP, Sedat. 1977. Maşat-Höyük'te Keşfedilen Hitit Tabletleri'nin Işığında Yukarı Yeşilirmak Bölgesi'nin Coğrafyası Hakkında. *Belleten* XLI/164, 637–646.
- ALP, Sedat. 1991. *Hethitische Briefe aus Maşat – Höyük* (Türk Tarih Kurumu yayınları : VI. dizi 35). Ankara: Türk Tarih Kurumu Basımevi.
- BADALI, Enrico / ZINKO, Christian. 1994. *Der 16. Tag des AN.TAḪ.ŠUM-Festes. Text, Übersetzung, Glossar*. Zweite, verbesserte Auflage unter Mitarbeit von Michaela Ofitsch (Scientia – Schriftenreihe der Innsbrucker Gesellschaft zur Pflege der Einzelwissenschaften und interdisziplinären Forschung 20). Graz.
- BECKMAN, Gary. 1990. *Hittite Diplomatic Texts*. Second Edition (Writings from the Ancient World 7). Atlanta, Georgia: Scholars Press.
- BRAUNE, Wilhelm / REIFFENSTEIN, Ingo. 2004. *Althochdeutsche Grammatik. 1. Laut und Formenlehre* (Sammlung kurzer Grammatiken germanischer Dialekte. A: Hauptreihe ; 5/1. 15). Auflage. Tübingen: Max Niemeyer Verlag.
- CALLAWAY, Morgan. 1901. *The Appositive Participle in Anglo-Saxon* ([extract from:] Publications of the Modern Language Association of America, vol. XVI, no.2). Baltimore: Modern Language Association of America.
- CHD = GÜTERBOCK, Hans G. / HOFFNER, Harry A. et al. (edd.), *The Hittite Dictionary of the Oriental Institute of the University of Chicago*. Chicago 1980–: The Oriental Institute of the University of Chicago.
- COTTICELLI KURRAS, Paola. 2014. Interaktion zwischen semantischen Verbalklassen und syntaktischen *clusters*. In: TARACHA, Piotr / KAPELUŚ, Magdalena (edd.), *Proceedings of the Eighth International Congress of Hittitology, Warsaw, 5-9 September 2011*. Warsaw: Wydawnictwo Agade, 202–215.
- CRG = JIN, Jie. *A Complete Retrograde Glossary of the Hittite Language* (Uitgaven van het Nederlands Historisch-Archaeologisch Instituut te İstanbul 71). İstanbul 1994: Nederlands Historisch-Archaeologisch Instituut te İstanbul.
- DAL, Ingerid. 1952. Zur Entstehung des englischen Participium Praesentis auf -ing. *Norsk Tidsskrift for Sprogvitenskap* 16, 5–116.
- DE MARTINO, Stefano. 1995. Die Unternehmungen des Muršili I. im südöstlichen Anatolien nach KUB XXXI 64+ (CTH 12). *Altorientalische Forschungen* 22, 282–296.
- DE ROOS, Johan. 1983. Drie hittitische gebeden. In: VEENHOF, K. R. (ed.), *Schrijvend verleden. Documenten uit het Oude Nabije Oosten vertaald en toegelicht* (Mededelingen en verhandelingen van het Vooraziatisch-Egyptisch Genootschap „Ex Oriente Lux“). Leiden: Ex Oriente Lux – Zutphen: Terra, 220–232.
- EDEL, Elmar. 1994. *Die ägyptisch-hethitische Korrespondenz aus Boghazköi in babylonischer und hethitischer Sprache. Band I: Umschriften und Übersetzung. Band II: Kommentar* (Abhandlungen der Rheinisch-Westfälischen Akademie der Wissenschaften 77,1–2). Opladen: Westdeutscher Verlag.

- FLEISCHER, Jürg. 2007. Das prädikative Adjektiv und Partizip im Althochdeutschen und Altniederdeutschen. *Sprachwissenschaft* 32, 279–348.
- FROTSCHER, Michael. 2012 [2013]. Die luwischen Entsprechungen der hethitischen Verben des Typs *dāi/tijanzi* und ein neues Lautgesetz urindogermanisch **oj* > urluwisch **ye*. *International Journal of Diachronic Linguistics and Linguistic Reconstruction* 9, 137–194.
- FROTSCHER, Michael. 2013. *Das hethitische -ant-Partizip und seine indogermanischen Grundlagen – Semantik, Morphologie, Syntax* (unpublished doctoral thesis). Verona.
- FROTSCHER, Michael. forthcoming a. Die Herleitung der Varianten *-e* des Dativ Singular und *-iš* des Nominativ Plural communis im Hethitischen – eine Sandhi-Erscheinung? (Presented at the conference *1. Indogermanistisches Forschungskolloquium*, Erlangen, 26th – 27th March 2015).
- FROTSCHER, Michael. forthcoming b. The Morphosyntax of the West Germanic Present Participle and the Origin of its *ja*-Inflection (Presented at the conference *Adjectifs verbaux e participes dans les langues indo-européennes / Verbal Adjectives and Participles in the Indo-European Languages* (Arbeitstagung of the Society for Indo-European Studies / Indogermanische Gesellschaft / Société des Études Indo-Européenne), Paris, 24th – 26th September 2014).
- GRODDEK, Detlev. 2002. *Hethitische Texte in Transkription KUB 55* (Dresdner Beiträge zur Hethitologie 4). Dresden: Verlag der TU Dresden.
- GRODDEK, Detlev. 2004. *Hethitische Texte in Transkription KUB 20* (Dresdner Beiträge zur Hethitologie 13). Dresden: Verlag der TU Dresden.
- HAAS, Volkert. 2003. *Materia Magica et Medica Hethitica: ein Beitrag zur Heilkunde im Alten Orient. Volumen I-II*. Unter Mitwirkung von Daliah Bawanypeck. Berlin – New York: Walter de Gruyter.
- HEINE, Rolf. 1972. Vermutungen zum lateinischen Partizip. *Gymnasium* 79, 209–238.
- HEINHOLD-KRAHMER, Susanne. 1983. Untersuchungen zu Piyamaradu. In: FRANTZ-SZABÓ, G. et al. (edd.), *Festschrift Annelies Kammenhuber zum 60. Geburtstag, 19. März 1982 (= Orientalia 52)*, 81–97.
- HEG = TISCHLER, Johann. *Hethitisches Etymologisches Glossar* (Innsbrucker Beiträge zur Sprachwissenschaft 20). Innsbruck 1983–: Institut für Sprachwissenschaft der Universität Innsbruck.
- HED = PUHVEL, Jaan. *Hittite Etymological Dictionary* (Trends in linguistics. Documentation 1–). Berlin – New York – Amsterdam 1984–: Mouton Publishers.
- HHT = RIEMSCHEIDER, Kaspar Klaus. *Hurritische und hethitische Texte*. München 1975 (holographed manuscript).
- HIL = KLOEKHORST, Alwin. *The Etymological Dictionary of the Hittite Inherited Lexicon* (Leiden Indo-European Dictionary Series, Volume 5). Leiden – Boston 2008: Brill.
- HIMMELMANN, Nikolaus P. / SCHULTZE-BERNDT, Eva. 2005. *Secondary Predication and Adverbial Modification. The Typology of Depictives*. Oxford: Oxford University Press.
- HOFFMANN, Inge. 1984. *Der Erlaß Telipinus* (Texte der Hethiter 11). Heidelberg: Carl Winter.
- HOFFNER, Harry A., Jr. 1974. *Alimenta Hethaeorum. Food Production in Hittite Asia Minor* (American Oriental Series 55). New Haven, Connecticut: American Oriental Society.
- HOFFNER, Harry A., Jr. 2002. Records of Testimony Given in the Trials of Suspected Thieves and Embezzlers of Royal Property. In: HALLO, William W. et al. (edd.), *The Context of*

- Scripture. Volume III. Archival Documents from the Biblical World*. Leiden – Boston – Köln: Brill, 57–60.
- HOFFNER, Harry A., Jr. 2009. *Letters from the Hittite Kingdom* (Writings from the Ancient World 15). Atlanta: Society of Biblical Literature.
- HOFFNER, Harry A., Jr. / MELCHERT, H. Craig. 2008. *A Grammar of the Hittite Language. Part 1: Reference Grammar* (Languages of the Ancient Near East 1). Winona Lake, Indiana: Eisenbrauns.
- HW² = FRIEDRICH, Johannes / KAMMENHUBER, Annelies et al. (edd.), *Hethitisches Wörterbuch*. 2. völlig neu bearbeitete Auflage auf der Grundlage der edierten hethitischen Texte (Indogermanische Bibliothek – Zweite Reihe: Wörterbücher). Heidelberg 1975–: Universitätsverlag Winter.
- IBoT = *İstanbul Arkeoloji Müzelerinde Bulunan Boğazköy Tabletleri* (Eski Eserler ve Müzeler Genel Müdürlüğü yayınlarından / Seri 3). İstanbul 1944–1988: Maarif Basımevi.
- IMPARATI, Fiorella. 2004. Obligations et manquements culturels envers la divinité Pirwa. In: ZANARDO, Aldo (ed.), *Studi sulla società e sulla religione degli Ittiti (= Eothen 12)*, 343–368.
- KAMMENHUBER, Annelies. 1961. *Hippologia Hethitica*. Wiesbaden: Otto Harrassowitz.
- KASSIAN, Alexei / KOROL'EV, Andrej / SIDEL'TSEV, Andrej. 2002. *Hittite Funerary Ritual šalliš waštaiš* (Alter Orient und Altes Testament 288). Münster: Ugarit Verlag.
- KASSIAN, Alexei / YAKUBOVICH, Ilya. 2007. Muršili II's Prayer to Telibinu. In: GRODDEK, Detlev / ZORMAN, Maria (edd.), *Tabularia Hethaeorum: Hethitologische Beiträge Silvin Košak zum 65th Geburtstag* (Dresdner Beiträge zur Hethitologie 25). Wiesbaden: Harrassowitz, 423–454.
- KBo = *Keilschrifttexte aus Boghazköy*. Leipzig 1916–1923: Hinrichs'sche Buchhandlung / Berlin 1954–: Gebr. Mann Verlag.
- KILLIE, Kristin. 2007. On the history of verbal present participle converbs in English and Norwegian and the concept of 'change from below'. In: ELSPAß, Stephan / LANGER, Niels / SCHARLOTH, Joachim / VANDENBUSSCHE, Wim (edd.), *Germanic Language Histories 'From Below' (1700–2000)* (Studia Linguistica Germanica 86). Berlin: de Gruyter, 149–162.
- KLINGER, Jörg. 2008. II. Texte der Hethiter. Rituale. In: JANOWSKI, Bernd / WILHELM, Gernot et al. (edd.), *Omina, Orakel, Rituale und Beschwörungen* (Texte aus dem Umfeld des Alten Testaments, Neue Folge 4). Gütersloh: Gütersloher Verlagshaus, 187–205.
- KLOEKHORST, Alwin. 2007. The Hittite Syllabification of PIE **CuR* and **K^wR*. In: GRODDEK, Detlev / ZORMAN, Marina (edd.), *Tabularia Hethaeorum: Hethitologische Beiträge Silvin Košak zum 65th Geburtstag* (Dresdner Beiträge zur Hethitologie 25). Wiesbaden: Harrassowitz, 455–457.
- KLOEKHORST, Alwin. 2014. *Accent in Hittite. A Study in Plene Spelling, Consonant Gradation, Clitics, and Metrics* (Studien zu den Boğazköy-Texten 56). Wiesbaden: Harrassowitz Verlag.
- KRÜGER, Karl Wilhelm. 1843. *Griechische Sprachlehre für Schulen. Erster Theil: über gewöhnliche, vorzugsweise die attische Prosa. Zweites Heft: Syntax*. Berlin (self-published).
- KUB = *Keilschrifturkunden aus Boghazköy*. Berlin 1921–1990: Akademie Verlag.

- KÜMMEL, Hans Martin. 1967. *Ersatzrituale für den hethitischen König* (Studien zu den Boğazköy-Texten 3). Wiesbaden: Otto Harrassowitz.
- LEBRUN, René. 1976. *Samuha: foyer religieux de l'empire hittite* (Publications de l'Institut orientaliste de Louvain, 11). Louvain-la-Neuve: UCL. Institut orientaliste.
- LEBRUN, René. 1980. *Hymnes et prières hittites* (Homo religiosus, 4). Louvain-la-Neuve: Centre d'Histoire des Religions.
- LÖHR, Rosemarie. 2012. Informationsstrukturelle Einheiten im Alt- und Mittelhochdeutschen. In: LEFÈVRE, Michel (ed.), *Syntaktischer Wandel in Gegenwart und Geschichte* (Berliner Sprachwissenschaftliche Studien 28). Berlin: WEIDLER Buchverlag, 415–435.
- MCINTYRE, Linda Lee. 1986. *Animate Plural in Neo-Hittite*. University of North Carolina M.A. thesis. Chapel Hill.
- MEISER, Gerhard. 1998. *Historische Laut- und Formenlehre der lateinischen Sprache*. Darmstadt: Wissenschaftliche Buchgesellschaft.
- MELCHERT, H. Craig. 1977. *Ablative and Instrumental in Hittite*. Harvard Dissertation.
- MELCHERT, H. Craig. 1995. Neo-Hittite Nominal Inflection. In: CARRUBA, Onofrio / GIORGIERI, Mauro / MORA, Clelia (edd.), *Atti del II congresso internazionale di hittologia* (= *Studia Mediterranea* 9). Pavia: Gianni Iuculano Editore, 269–274.
- MLHH = ÜNAL, Ahmet. *Multilinguales Handwörterbuch des Hethitischen / A Concise Multilingual Hittite Dictionary / Hititçe Çok Dilli El Sözlük. Hethitisches, englisches, deutsches und türkisches Wörterbuch / Hittite, German and Turkish Dictionary = Hititçe, Almanca ve İngilizce Sözlük* (PHILOLOGIA – Sprachwissenschaftliche Forschungsergebnisse, Band 108). Hamburg 2007: Verlag Dr. Kovač.
- OTTEN, Heinrich. 1958. *Hethitische Totenrituale* (Institut für Orientforschung: Veröffentlichung Nr. 37). Berlin: Akademie Verlag.
- POPKO, Maciej. 1991. Weitere Fragmente zu CTH 418. *Altorientalische Forschungen* 18, 44–53.
- POPKO, Maciej. 1994. *Zippalanda. Ein Kultzentrum im hethitischen Kleinasien* (Texte der Hethiter 21). Heidelberg: Universitätsverlag C. Winter.
- RANHEIMSÆTER, Harald. 1945. *Flektierte und unflektierte Nominativformen im deutschen Adjektivsystem bis zum Ausgang des 12. Jahrhunderts* (Skripter fra det germanistiske seminar ved Universitetet i Oslo I). Oslo: Johan Grundt Tanum.
- RHEINFELDER, Hans. 1967. *Altfranzösische Grammatik. Zweiter Teil: Formenlehre*. München: Max Hueber Verlag.
- RIEMSCHEIDER, Kaspar Klaus. 1962. Hethitische Fragmente historischen Inhalts aus der Zeit Hattušilis III. *Journal of Cuneiform Studies* 16, 110–121.
- RINGE, Don. 2006. *A Linguistic History of English. Volume I: From Proto-Indo-European to Proto-Germanic*. New York: Oxford University Press.
- SCHULTZE-BERNDT, Eva / HIMMELMANN, Nikolaus P. 2004. Depictive secondary predicates in crosslinguistic perspective. *Linguistic Typology* 8, 59–131.
- SCHWAN, Eduard / BEHRENS, Dietrich. 1970. *Grammaire de l'ancien français. Traduction française par Oscar Bloch, Docteur ès lettres. Première et deuxième parties: phonétique et morphologie*. Troisième édition, d'après la onzième édition allemande. Bruxelles: Éditions Libro-Sciences S.P.R.L.

- SIDEL'TSEV, Andrej V. 2002. A New Morphological Rule for Middle Hittite. *Studia Linguarum* 3, 21–80.
- SINGER, Itamar. 2002. *Hittite prayers* (Writings from the Ancient World 11). Atlanta, Georgia: Society of Biblical Literature.
- STARKE, Frank. 1990. *Untersuchungen zur Stammbildung des keilschrift-luwischen Nomens* (Studien zu den Boğazköy-Texten 31). Wiesbaden: Otto Harrassowitz.
- TISCHLER, Johann. 1981. *Das hethitische Gebet der Gassulijawija. Text, Übersetzung, Kommentar* (Innsbrucker Beiträge zur Sprachwissenschaft 37). Innsbruck: Institut für Sprachwissenschaft der Universität Innsbruck.
- ÜNAL, Ahmet. 1984. Studien über das hethitische Kriegswesen II: Verba delendi *harnink-/hargamu-* «vernichten, zugrunde richten». In: ARCHI, A. / PECORELLA, P. E. / SALVINI, M. (edd.), *In Memoria di Piero Meriggi (1899–1982)* (= *Studi Micenei ed Egeo-Anatolici* 24), 71–85.
- VAN DEN HOUT, Theo P. J. 1998. *The purity of kingship: an edition of CTH 569 and related Hittite oracle inquiries of Tuthaliya IV* (Documenta et monumenta Orientis antiqui 25). Leiden – Boston – Köln: Brill.
- WEERENBECK, Bernhard Herman Jozeph. 1927. *Participle présent et gérondif*. Nimègue – Utrecht: Dekker & van de Vegt en J. W. van Leeuwen / Paris: Librairie Ancienne Honoré Champion.
- WEITENBERG, J. J. S. Een hittitische rechtszaak (KUB 13, 35+). In: VEENHOF, K. R. (ed.), *Schrijvend verleden. Documenten uit het Oude Nabije Oosten vertaald en toegelicht* (Mededelingen en verhandelingen van het Vooraziatisch-Egyptisch Genootschap „Ex Oriente Lux” 24). Leiden: Ex Oriente Lux – Zutphen: Terra, 183–186.
- WERNER, Rudolf. 1967. *Hethitische Gerichtsprotokolle* (Studien zu den Boğazköy-Texten 4). Wiesbaden: Otto Harrassowitz.
- YAKUBOVICH, Ilya. 2010. *Sociolinguistics of the Luvian Language* (Brill's Studies in Indo-European Languages & Linguistics, Volume 2). Leiden – Boston: Brill.