

ANALOGY AND THE -AN DATIVES OF HIEROGLYPHIC LUWIAN

By ANNA MORPURGO DAVIES

1. The basic morphology of Hittite is now relatively well known – for the classical period at least; that of the minor Anatolian languages still calls for continuous reassessment whenever new data become available. The need is particularly great in the case of the languages of the Luwian group: Cuneiform Luwian, Hieroglyphic Luwian and Lycian. In what follows I shall try to collect some data which concern the nominal inflection of Hieroglyphic Luwian.¹ This can only be a small return for all that I owe to Oliver Gurney, to his teaching and to his unrestrainable kindness and generosity; it is good to know that I share this debt with all those who have worked in this country on the Indo-European languages of Anatolia – and with innumerable others.

2. In 1963 Hermann Mittelberger pointed out that in Hieroglyphic Luwian there were at least three examples of a dative singular in *-an*. He also suggested that one example of the same phenomenon occurred in Cuneiform Luwian, but did not offer a full explanation of this peculiar termination;² at the time, the data on which he based his observation were too scanty to warrant any further discussion. The examples he mentioned were (in our transliteration): (a) *za-à-ti-i-* ‘CAELUM’-*sa-na* (DEUS) TONITRUS-*hu-ti* ‘to this Tarhunzas of the Sky’ (see citation 9 below); (b) LITUUS. CAELUM-*na* (DEUS) TONITRUS-*ti-i* ‘to Tarhunzas of the Sky’ (see citation 8 below); (c) *á-pa-sa-na* DOMUS-*ni-i* ‘on/to his house’ (see citation 5 below). More tentatively he also referred to *mu-ka-sa-sa-na* DOMUS-*ní-i* ‘(under) Moksos’ house’ of KARATEPE (cf. citation 12 below). Finally he pointed out that in all instances we were dealing with *-asi-* adjectives (*tipasasi-*, *apasi-*) and that they always agreed with nouns or names in the dative singular so that the interpretation could not be disputed. The *-an* ending obviously contrasted with the expected form of dative singular: in Hieroglyphic Luwian the normal ending is *-i*; less frequent alternants are *-iya*, *-a* and *-aya*.

If the *-an* forms are not due to a scribal error, to a false reading or to a misinterpretation of the evidence, we ought to try to explain their origin. However, at the moment the first question concerns the validity of Mittelberger’s observation: does Hieroglyphic Luwian have a dative singular in *-an*, and, if so, what is its distribution and to what stem classes does it belong?

3. Since 1963 the data at our disposal have considerably increased. In what follows I shall give a list, as complete as possible, of the *-an* datives I have found in the Hieroglyphic Luwian texts of the First Millennium. I have not considered the Empire texts because they still present too many problems of reading and interpretation. The conclusion is that the examples now available are not 3 but 44 or perhaps 46 and that they all belong to *-a/isi-* adjectives derived from nouns

¹For the abbreviations used see J. D. Hawkins, A. Morpurgo Davies, G. Neumann, ‘Hittite Hieroglyphs and Luwian: new evidence for the connection’, *Nachrichten Ak. Wiss. Göttingen*, Phil.-Hist. Kl. 1973, Nr. 6, pp. 143–97 [HHL], at p. 145 note. The transliteration follows the values tabulated in *An. St.* 25 (1975), 53–55. In preparing this paper I have been able to use Mr. Hawkins’ collation of most of the Hieroglyphic texts; I am deeply indebted to him for this and for frequent and protracted discussions over all points of reading and interpretation.

²*Die Sprache* 9 (1963), 90 f.; cf. also *ibid.*, 8 (1962), 285.

(*tipasasi-* from *tipas* “sky”), pronouns (*apasi-* “his, her, its” from *apa-* “he, she, it”), personal names (*muksasi-* from *muksas* “Moksos”), geographical names (*tunasi-* from *tuna-*). As usual, the *-a/isi-* adjectives indicate a general relationship with the noun or name from which they are derived; in the case of adjectives derived from a personal name they may have a possessive value (*Muksasan parni* “(under) Moksos’ house”) or may be used as patronymics (*Niyasi-* “Nis’ son”) – by far the most frequent use in our list – or may indicate some other form of relationship (*Kiyakisan FRATER-lai* “to Kiyakis’ brother”). In the case of adjectives derived from geographical names, the *-a/isi-* forms are used as ethnics and compete with the more frequent *-wani-* and *-a/iza-* adjectives.

In my list I have included two forms which end in *-Ca-sa-* (*C* = any consonant) and not in *-Ca-sa-na*. Both of them are followed by the enclitic *-ha* ‘and’. If *-Ca-sa-na* is to be understood as [*-Casan*], which seems intuitively correct, rather than as [*-Casana*], we expect the final nasal not to be written before an enclitic which begins with a consonant; it is possible, in other words, to read *á-pa-sa-há-* of citation 7 as *apasan-ha*, and *mu-ka-sa-sá-há-* of citation 13 as *muksasan-ha*. Some ambiguity remains, since Hier. Luwian has an *-as* genitive as well as an *-asi* genitive and an *-asi-* genitival adjective. In theory *mu-ka-sa-sá-há-* could stand for *Muksas-ha* “and of Muksas”. However, an alternation which occurs in the same text and in the same phrase, such as that between *mu-ka-sa-sá-há-* DOMUS-*ní-i* of KARATEPE LVIII (citation 13) and *mu-ka-sa-sa-na* DOMUS-*ní-i* of KARATEPE XXI (citation 12), seems to speak for the phonological identity of *mu-ka-sa-sa-na* and *mu-ka-sa-sá(-há-)* and at the same time gives weight to the *-san* (rather than *-sana*) interpretation of our datives.

3.1. In the First Millennium texts it is possible to identify the following *-an* datives; there may be other instances which so far have not been recognized.

(a) (*a*)*pasan* “his”, etc. (cf. (*a*)*pas* “he”, etc.)

(1) BOYBEYPINARI, Text 1, I B-C:

à-wa/i sù-[ki-] ta-za-sá(URBS) REL-sa | AQUA.DOMINUS-sá
wa/i-tà pa-sa-na X-na-ti-i PONERE-wa/i-ha

“Who(ever) (was) the ‘River Lord’ of the city Sukiti,
 I put them on/for his -NATI.”

For the text see Hawkins, *An. St.* 20 (1970), 83 ff.

(2) TELL AHMAR 1, 3:

à-wa/i | ku-ma-na [(á-)mi-(i)s] a-' [(AVUS)] hu-ha[-?] -sa [REX-ti] -i-sá [sa-tá] -'
*[wa/i-sa] -' pa-[sa-] na-' | (*274)u-pa-ti-ti | DOMINUS-na-ni-i-sa sa-tá-'*

“when [my great-] grandfather (?) [was king (?)]
 he was lord to/for his UPATIT-.”

Collation, readings and restoration by Hawkins (see p. 140 ff. of this volume).

(3) IZGIN, d XVI–XIX:

wa/i-ti-ta-' á-ta₅-ma-[z]a [. . .] -sa [X]-X[-X]-X || VAS-tara/i-i-na (PES)
u-pa-i pa-sa-na-' DOMINUS-na-ni«-ri+i?» PRAE-na

à-wa/i pa-sa-ha² -' ¹ á-za-mi-sa i-zi-ia-na-zi || i-zi-i-tú pa-sa-na-' DOMINUS-na-ni CUM-ni

“For himself the name . . . (and) the image he shall bring before (?) his lord and let that Azamis too perform *rituals* for his lord.”

Collation by J. D. Hawkins. At the end of l. XVI it is not clear whether

near the DOMINUS logogram there is a *ri+i* sign, but in connection with PRAE-*na* we expect a dative rather than an ablative; if the noun were in the ablative, *pasan* ought to be an ablative too (cf. below citation 44).

The translation of *iziyananzi izitu* is tentative but is based on the parallelism with Hittite *aniur aniya-*. Instead of *iziyananzi* we might expect an *-i-* stem **iziyaninzi* (cf. *upanin* and *upaninzi*, from *upa-*, in CARCHEMISH A 1 a, 2 and A 11 b, 4) but the *na* sign is clear. The alternative would be a Nom.-Acc. neuter sing. ending in *-anza*, but the final sign seems to be *zi* rather than *za*.

(4) CEKKE A, 1–4:

EGO-*mī* DOMINUS.SOL||-*wa/i+ra/i-sá* *sa-sa-tù+ra/i-sá* *wà/i-sa*||-*mī-sa mī-ta₅*
à-wa/i || *za* *382[X]-*pa[?]-ma-za* DOMINUS.SOL-*wa/i+ra/i-sá* *sa-sa-tù*[+*ra/i*]-*ia*
 | DOMINUS-*nī á-pa-sa-na* PONERE-*tá*

“I am X-tiwaras the favoured servant of Sasturas.

And X-tiwaras put up this]PAMANZA for Sasturas his lord.”

Collation by J. D. Hawkins; see *An. St.* 29 (1979), p. 162 fn. 63.

(5) KULULU 2, C 1–2:

| *wa/i-ru-ta* || |*á-pa-sá-'* | (“SCALPRUM.SIGILLUM”) *sa-¹sa¹-za-'* | *tu-wa/i-tu-u*
 | *á-pa-sa-na* DOMUS-*nī-i*

“let them (the gods) for (against) him set their seal on his house”.

(6) CARCHEMISH A 27 e 3, 2–3:

] (SCALPRUM) [*ku*]-*ta-sa₅+ra/i-zi* | *za[?]-ri+i* *pa-sa-na* TERRA-*ta₄-ti*[. . .]
 || REL-*sa* MALLEUS-*i*

“] the walls *here* in/to his place [
 who hammers away”

The text is too fragmentary to allow a full interpretation but TERRA-*ta₄-ti* is attested elsewhere as a dative (e.g. in CARCHEMISH A 6, 4, 7; cf. Hawkins and Morpurgo Davies, *JRAS* 1975, 130), and *pasan* must agree with it; *zari* could be used adverbially (“here”) or could be a dative in agreement with the adjective and noun which follow: “in/to this, his place”.

(7) KARATEPE, XVI, 81–84 (Ho; Hu has the same wording):

|*á-pa-sa-há-wa/i-ta-'* | *tá-ti-i* (“THRONUS”) *i-sà-tara/i-ti-i* | (“SOLIUM”) *i-sà-nu-wá/i-há-'*

“And I caused it/them to sit upon its/their father’s throne.”

Cf. Hawkins and Morpurgo Davies, *An. St.* 28 (1978), 107; for the possible ambiguity of *á-pa-sa-há-* see above p. 124.

(b) Adjectives derived from nouns: *tipasasan* “of the sky” (*tipas* “sky”), *atalasan* (?) “of the brother” (*atalas* (?) “brother”), *utnisan* (?) “of the country” (*utni-* (?) “country”).

(8) BABYLON Cup 1, 1:

| *za-ia-wa/i* “SCALPRUM”(-)*ka-ti-na mī-ta₅-à-sa* LITUUS.CAELUM-*na* (DEUS)
 TONITRUS-*ti-i i-zi-i-tà*

“Midas made these KATINA for Tarhunzas of the Sky (*tipasasan*).”³

³ For the transliteration LITUUS. CAELUM-*na* and in general for the value of the LITUUS logogram see Hawkins, “The logogram “LITUUS” and the verbs “to see” in Hieroglyphic Luwian”, *Kadmos* 19 (1980), 123 ff.

(9) TELL AHMAR 1, 6:

|m[u]-pa-wa/i-' | za-'à-? 'ti-i-' '“CAELUM”¹-sa-na [(DEUS)] TONITRUS-hu-ti | ' (“MANUS”) ¹i-s[a-tara/i-X]-X SUP[ER+RA/I-'] | [

“But I [raised] up (my) han[d(s)] to this Tarhunzas of the Sky (*tipasasan*).”

Collation and restoration by J. D. Hawkins; cf. p. 140 ff. of the present volume.

(10) CARCHEMISH A 4 a, 1:

ka-ma-ni-sa-pa-wa/i PRAE-ri+i-SARMA-ma-ia-' | FRATER-la-sa-na | INFANS (-)ni-za-' pa-pi-SARMA-sá-na-' | NEPOS CUM-ni ARHA (*344) DARE-ta

“And Kamanis sold to Parisarmas, the brother’s child (*atalasan*), Papisarmas’ grandson (*Papisarmasan*).”

Readings by J. D. Hawkins.

FRATER-la-sa-na: here and elsewhere I have assumed that the word for brother is *atalas* and the genitival adjective (in the dative) *atalasan* (see Laroche, *HH* p. 32, no. 45), but a full discussion of this kinship term is still needed. For “brother’s son” see TELL AHMAR 2, 8: FRATER-la-sa INFANS-ni-sá.

(11) KURÇOĞLU, 1–2:

à-wa/i za-' CAPUT.VAS-ru-sà (DEUS)REGIO-ni-sa-na MAGNUS.FEMINA -sa₅ +ra/i-i || ARHA (“PES”)u-pa-ha

“And I dedicated this statue to the divine queen of the country (*utnisan*).”

See Meriggi, *Manuale* II/2, no. 289, p. 222. The reading proposed here involves the logogram for queen instead of Meriggi’s *hu-*; the sign which precedes is a clear -na, the final sign of the genitival adjective (dat.) REGIO-ni-sa-na (probable reading: *utnisan*). The “divine queen of the country” is also found in MEHARDE A, 2–3: (DEUS) REGIO-ni-sa | (MAGNUS.DOMINA)ha-su-sa₅ +ra/i-sa; ibid. B, 2–4, and C, 1–2: |(DEUS) REGIO-ni-si | (MAGNUS.DOMINA)ha-su-sa₅ +ra/i-sa, and in SHEIZAR, 6: (DEUS) REGIO-ni-i-si (DOMINA)ha-su-sa₅ +ra/i-sa. In all instances we have the Nominative *hasusara/is* preceded by the genitive REGIO-nis or REGIO-nisi; see Hawkins in *Florilegium Anatolicum. Mélanges Laroche*, Paris 1979, 145 ff., but in all passages read (DEUS) instead of *292, following M. Kalaç in *Orientalia*, NS 34 (1965), 414; cf. also J. D. Hawkins, “Late Hittite Funerary Stelae”, in *Death in Mesopotamia*, ed. B. Alster, p. 219, Copenhagen, 1980.

(c) Adjectives derived from personal names, including patronymics, “adelphonymics” and “papponymics”.

(12) KARATEPE, XXI 108–113 (Hu and Ho):

NEG₂-wa/i REL-zi | SUB-na-na PUGNUS.¹PUGNUS¹-ta₄-ta (Ho. tà-tà-ta) mu-ka-sa-sa-na (Ho. mu-ka-sá-sá-na) DOMUS-ni-i

“who had not lived under Muksas’ house” (*Muksasan*).

For text and interpretation see J. D. Hawkins, *An. St.* 25 (1975), 132 and A. Morpurgo Davies, *KZ* 94 (1980), LI 102.

(13) KARATEPE LVIII, 324–30 (Hu followed by Ho):

Hu: ma-pa-wa/i (*309)pa+ra/i-na-wa/i-tu-u (LITUUS)á-za-ti-wa/i-tà-ia mu-ka-sa-sá-há-' DOMUS-ni-i (DEUS)TONITRUS-hu-ta[-ti] DEUS-na-ti-há

Ho: ma-pa-wà/i (DOMUS. “*309”)pa+ra/i-na-wa/i-tu₄ (OCULUS)á-za-ti-wà/i +ra/i-ia mu-ka-sá-sa-há (DOMUS)pa+ra/i-ni

“And much let them be in service to Azatiwatas and to Muksas’ house (*Muksasan*) (by Tarhunzas and the gods).”

For text and interpretation see Hawkins and Morpurgo Davies, *An. St.* 28 (1978), 113 f.;⁴ for the value and transliteration of LITUUS and OCULUS see Hawkins, *Kadmos* 19 (1980), 123 ff. The possible ambiguity of *mu-ka-sá-sa-há* is mentioned above, p. 124.

(14) KARABURUN, 1–2:

si-pi-sa-pa-wa/i REX-*sa* REL-*ti si-pi-ia ni-ia-sa-na* MALUS-*za* CUM-*ni za+ra/i-ti-ti-i ni-mu-wa/i-zi ni-pa-wa/i ha-ma-si* . . .

“If King Sipis shall *contrive* evil for Sipis, Nis’ son (*Niyasan*), for (his) son, or for (his) grandson . . .”

Cf. Hawkins, *An. St.* 25 (1975), 148. See (15) below.

(15) KARABURUN, 2–3:

si-pi-sa-pa-wa/i ni-ia-sa REL-*ti si-pi-ia* REX-*ti* MALUS-*za* CUM-*ni* || *za+ra/i-ti-ti ni-mu-wa/i-zi ni-pa-wa/i ha-ma-si*

si-pi-ia-pa-wa/i-ta ni-ia-sa-na hà+ra/i-na-wa/i-ni-sa(URBS) (DEUS)*ku-AVIS-ia ku-ma-pi ta-wa/i* SUB-*ta á-za-tu*

“If Sipis, (the son) of Nis, shall *contrive* evil for Sipis the King, (his) son or (his) grandson,

then for Sipis, Nis’ son (*Niyasan*), let the Haranean (Moon God?) together with (??) Kubaba swallow down (his) eyes.”

Notice the contrast between *Sipis Niyas*, where the father’s name is indicated by a simple genitive, and *Sipiya Niyasan*, where an *-asi-* adjective is used as a patronymic and agrees in the dative with *Sipiya*. For the name Nis, see the KULULU strips 1, 1, 2, 3 (twice); 2, 1 (dat. ¹*ni-ia*); perhaps cf. also the Nom. ¹*na-i-sá* in KULULU strip fragment 1, 2; rev. 2.

The second clause offers numerous problems of interpretation. I follow Meriggi (*Manuale* II/1, p. 104 f.) in assuming that the god of Harran cannot be Kubaba and in referring the ethnic to the Moon God in spite of the absence of the divine determinative. I also follow Meriggi in attributing a meaning “together with” or the like to *ku-ma-pi*.

á-za-tu can be compared with Cun. Luwian *azza-*, the iterative of *ad-* “to eat” (cf. *HHL*, 184 f.).⁵ If so, *tawa* (cf. also the parallel clause in line (2)) will be the object and can be compared with Cun. Luwian *da-a-u-wa* (Nom.-Acc. neuter plural) “eyes” (see Laroche, *DLL*, p. 96). We already knew from KULULU 1, 6 the full spelling *ta-wa/i-ia-na* corresponding to the logographic writing VERSUS-*wa/i-na*; Hier. *tawiyān* is obviously the same word as Cun. Luwian *dawiyān* (cf. Laroche, loc. cit.), and it is likely that the adverb is related to the word for “eye”. Given this, the presence of *tawa* “eyes” in Hieroglyphic as well as in Cuneiform Luwian does not cause surprise.

⁴ In KARATEPE LVIII (Ho) I have transliterated with *tu*₄ the sign Laroche, HH., no. 230, since *tu*, *tú*, and *tù* have been reserved for Laroche, HH. nos. 89, 325 and 326 respectively and there is no clear syllabic use of Laroche HH no. 65 (Laroche’s *tù*).

⁵ The interpretation of *aza-* does not rest only on the comparison with Cun. Luwian. Sentences such as CARCHEMISH A 6, 9:

á-pa-pa-wa/i-’ (DEUS)*ni-ka+ra/i-wa/i-sá* CANIS-*ni-i-zi á-pa-si-na* | CAPUT-*hi-na* | ARHA EDERE-*tu*

“and let the dogs of Nikarawas eat him (and) his head.”

compare well with KULULU 1, 5:

| *à-wa/i* | *á-pa-si-na* | *ha-sa-mi-na* | *pá?* *+ra/i-ta-mi-na* | ARHA | *á-za-tu á-pa-si-ha* | *á-tara/i-i-na*

“let them (*viz.* the AMURAS of Tuwatis and the race (?) of the dogs of Kubaba) devour his accursed (?) race and his image.”

(16) CEKKE, B 4:

DOMINUS-*ti-wa/i+ra/i-ia-pa-wa/i á-ha-li-sa-na* PRAE-*ti* *179. *347 4(-)*sà-pa-sá*
1 SCALPRUM-*sa* *33(-)*mi+ra/i-sa₅+ra/i-zi* DARE-*mi-na*

“and we give before X-tiwaras, Ahalis’ son (*Ahalisan*) . . .”

The verb and the two datives are easily recognizable. For the first name cf. the nominative DOMINUS.SOL-*wa/i+ra/i-sá* in CEKKE, A 1–2; for the derived adjective *ahalisi-* cf. the basic name ¹*á-ha-li-ia* (dative) in CEKKE, B 3 (see J. D. Hawkins, *An. St.* 29 (1979), p. 162 note 63). The reading *179. *347 4 is based on Hawkins’ collation.

For DARE-*min* see A. Morpurgo Davies, *KZ* 94 (1980), 93 ff.

(17) CARCHEMISH A 4 a, 1:

Cf. citation (10) above for the dative *Papisarmasan*, our only instance of “papponymic”.

(18) TÜNP, 1–2:

]ara/i-FRATER-*la-ia* CUM-*ni* *sà-ta-ti-wa/i+ra/i-sa-na* (“TERRA”)ta-sà-REL+*ra/i-na* CUM-*ni* || “*344”(-)*i-ia-sa-ta*

“they/he bought (?) the land from]ariatallas, Santatiwaras’ son (*Santatiwarasan*)”

The clause is parallel to CEKKE B, 1–2 (cf. Meriggi, *Manuale* II/2, 102): 102):

. . . *ka-ma-na-na*(URBS) URBS+*MI-ni-na* *ka-na||-pu-wa/i-na-za*(URBS) CUM-*ni*
“*344”(-)*i-sa-ta á-pa-sa-ti* *314(-)*sa-tá-na-ti*

“the city of Kamana from the Kanapuweans they bought (?) by their . . .” (see also Hawkins, *An. St.* 29 (1979), p. 161, note 59). This makes it likely that in TÜNP the first (perhaps incomplete) word is a personal name followed by a patronymic adjective in the dative. For names which have FRATER-*la-* as a second element in the compound cf. e.g. *Musatala-* in citation 21 below and ¹REL-*za-FRATER-la-ia* in KULULU strip 1, 2; for the word order Name – Postposition – Patronymic see the numerous examples offered by the KULULU strips (citations 19 ff. below).

Historians of Indo-European syntax will notice with interest the double occurrence of CUM-*ni* in the same clause, once as a postposition and once as a preverb, matched by the single occurrence of CUM-*ni* in the parallel sentence of CEKKE.

(19) KULULU strip 1, 1:

100 “*179”-*za* ¹*ha-pi¹-ia¹-mi-ia* ¹[CUM¹-*ni* [¹X]-*ru-sa-¹sá-¹na* | *hu-wa/i-sá-na* (URBS)

“100 . . . with/for Hapiyamis, [X]rusis’ son (]*rusasan*), the Huwean (*Huwasan*).”

The KULULU lead strips have not yet been fully edited, but clear photographs are available in T. Özgüç, *Kultepe and its Vicinity in the Iron Age*, Ankara 1971 (No. 1 : pl. L; no. 2, pl. LI; no. 3 : pl. LII; fragm. 2 : plates XLVII and XLVIII, 1) together with a short commentary by E. Laroche (ibid. 115 ff.). Drawings and photographs of another fragment (fragm. 1) were published by T. Özgüç in *Anadolu* 17 (1973), figs. 5–6; pls. XII–XIII. In addition to these texts, I have also used Hawkins’ collation of strips 1 and 2.

Of the complete texts, the first is rich in -*an* datives. It is a lead strip written on both sides. It obviously deals with some sort of economic transaction and is divided into sections, most of which start with a geographical indication. In each section all clauses begin with a variable number (ranging from 7 to 400) and a

logogram with its phonetic complement. The value of the logogram is unknown, but the sign must be identified with Laroche, *HH*, no. 179. The other strips deal with sheep and do not offer much help for an interpretation. In strip 1, the logogram is followed by a personal name in the dative (sometimes two names are linked by *-ha* “and”), and by the postposition CUM-*ni*, which I have tentatively translated “with/for”. Rarely we have instead of CUM-*ni* a verb DARE-*mi-na* “we give”.⁶ The name in the dative may be accompanied either by an *-a/isan* patronymic adjective or by an *-a/isan* ethnic adjective (which alternates with the genitive or locative or ablative of the town’s name) or by both. Neither of the two elements need be present; moreover, we sometimes find a dative noun which may perhaps indicate a professional qualification. In two instances the genitival adjective is followed by the dative FRATER-*la-i*, which seems to indicate that someone is defined as “X’s brother” rather than as “X’s son”.

Patronymics and ethnics may have the same form. It is possible to distinguish between them because the URBS determinative solves the ambiguity, but notice that in citations 38 and 41 below *Uramuwasan* and PUGNUS-*rimisan* are both preceded by the personal determinative and followed by the URBS determinative. On the other hand *Uramuwasan* is followed by URBS and not preceded by the personal determinative in citations 39 and 40; in citation 32 the genitive *Uramuwas* which follows a regular patronymic must refer to a place but has once again both the personal and the geographical determinative. In the same texts (cf. e.g. citation 38) ¹*Uramuwas* is clearly a personal name. Similarly PUGNUS-*rimis* is clearly attested as a personal name in strip 1, 2 and rev. 6 (citation 34 below) – and elsewhere. Presumably in all these instances the ethnic derives from a village or town name which in its turn is based on a personal name.

(20) KULULU strip 1, 1:

50 “*179” ¹*hu-li-ia-ia-* | CUM-*ni* | *ku-ku-wa/i-sa-na* | *tu-na-sá*(URBS)

“50 . . . with/for Huliyas, Kukuwa/is’ son (*Kukuwasan*), of the city of Tunas.”

See citation 33 below. Cf. the dative ¹*ku-ku-wa/i-ia* in strip 1, 2 (twice), 3 (= citation 25 below), 6.

(21) KULULU strip 1, 2:

22 “*179” ¹*tu-wa/i-ia* | CUM-*ni* ¹*mu-sa*-FRATER-*la-sá-na*

“22 . . . with/for Tuwa/is, Musatalas’ son (*Musatalasan*).”

(22) KULULU strip 1, 2:

22 “*179” ¹*na-na-ia-* | CUM-*ni* ¹*hu-li-ia-sá-na*

“22 . . . with/for Nanas, Huliyas’ son (*Huliyasan*).”

See citation 29 below. Cf. the dative ¹*hu-li-ia-ia(-)* in strip 1, 1 (= citation 20), 3 (= citation 24), 4 (three times; cf. citations 30 and 31), 5 (= citation 32).

(23) KULULU strip 1,2:

60 “*179” ¹*la-ia* | CUM-*ni* ¹*ha-ni-sa-na*

“60 . . . with/for Las, Hanis’ son (*Hanisan*).”

See citation 35 below.

⁶I have argued for the meaning “we give”, rather than “we gave”, in KZ 94 (1980), 93 ff. One of the reasons is that in KULULU strip 2 we find in entirely parallel contexts *pi-ia-i* “he gives”, *pi-ia-ti* “they give”, and DARE-*mi-na* “we give”.

(24) KULULU strip 1, 3:

50 “*179” ¹ *hu-li-ia-ia-* | CUM-*ni* ¹ *i-ia+ra/i-sà-sa-na* | *pa+ra/i-ZU?-mi-na-sa* (URBS)

“50 . . . with/for Huliyas, Iyarasis’ son (*Iyarasasan*), of the city of Parzu?minas.”⁷

(25) KULULU strip 1, 3:

112 “*179” ¹ *ku-ku-wa/i-ia-* | CUM-*ni* ¹ *la-lâ/î/u-wa/i-sâ-na* | *wa+ra/i-tu+ra/i-si*(URBS)

“112 . . . with/for Kukuwa/is, Lalu?wa/is’ son (*Lalu?wasan*), of the city of Waratura/is.”

See citation 26 below.

(26) KULULU strip 1, 3:

100 “*179” ¹ REL+*ra/i-mu-wa/i-ia-* | CUM-*ni* ¹ *mu-wa/i-sâ-na* | *wa/i+ra/i-tu+ra/i-si*(URBS)

“100 . . . with/for K/Hwarimuwas, Muwas’ son (*Muwasan*), of the city of Waratura/is.”

The name Muwas (Laroche, *Noms des Hittites*, p. 122) is also found in CARCHEMISH A 4 a, 2, and occurs more frequently in compounds.

In theory *Waraturasi* could be the dative of an *-asis* adjective derived from *Waratura-*. If so, it would be a unique example of *-i* dative of *-asis* forms; consequently I have preferred to take it as a genitive.

(27) KULULU strip 1, rev. 4:

10 “*179”-*za* | *za+ra/i-wa/i-ia-za-mu-wa/i-ia-* | CUM-*ni* ¹ *ki-ia-ki-sâ-na* | FRATER-*la-i* | *hu_x+ra/i-na-li* | *â-na-tara/i* | *tu-na-sa*(URBS)

“10 . . . with/for Zarawiyazamuwas, Kiyakiyas’ brother (*Kiyakisan*), the hunter (?), of lower Tunas.”

I have treated *za+ra/i-wa/i-ia-za-mu-wa/i-ia-* as one word rather than two, because there is no (preserved?) word divider, no personal determinative, and no connective; it is possible that we are dealing with two words both in the dative: *zarawiyaza Muwaya*.

The Nominative *Kiyakiyas* is probably attested in TOPADA, 2 (see Hawkins, *An. St.* 29 (1979), p. 165 f.) and the dative *Kiyakiyaya* is found in AKSARAY, 4 (cf. Mustafa Kalaç, *KZ* 92 (1978), 117 ff.).

FRATER-*la-i*, presumably *atalai* (see note after citation 10), also occurs below (citation 30); the two forms are rare examples of *-a-i* (rather than *-a* or *-a-ia*) datives of *-a-* stems; contrast e.g. the compound ¹ REL-*za*-FRATER-*la-ia(-ha)* of KULULU strip 2, 2, but cf. *mî-ta₅-i* of SULTANHAN, 4.

hu_x+ra/i-na-li may be compared with 2 *hu_x+ra/i-na-la-za* in KULULU strip 2, rev. 3, which must be a dative plural. Mustafa Kalaç (*KZ* 92 (1978), 121 ff.) has established the value of the first sign (Laroche, *HH*, no. 347) and has compared the word with Hitt. *ḫurna-* “to hunt”.

For Lower and Upper Tunas cf. Morpurgo Davies and Hawkins in *Studia mediterranea P. Meriggi*, forthcoming. In this text 1.1 and 1.2 SUPER+*RA/I-sa tu-na-sa* (URBS) and *â-na-tara/i-sâ-* *tu-na-sa*(URBS) show the adjectives *sar(r)a*lis and *ana(n)taris* which agree with the name of the town; here it is surprising not to find an ending for the adjective, but the same phenomenon occurs in rev., 6: SUPER+*RA/I-li tu-na-sa*.

⁷ I have transcribed with *ZU?* the sign Laroche, *HH*, no. 462. This value is established for an Empire sign of similar shape, but so far we have no clear evidence for the value of the First Millennium sign.

(28) KULULU strip 1, rev. 4:

10 “*179”-za [l]ru-wa/i-ti-ia | DARE-mi-na ¹á-pa-ni-sa-na u-ha-zi+ra/i-sá (URBS)

“10 . . . we give to Ruwatis, Apanis’ son (*Apanisan*), of the city of Uhaziras.”

(29) KULULU strip 1, rev. 4:

40 “*179” ¹nu-nu-ia | CUM-ni ¹hu-li-ia-sá-na-’ | ta-sà-ku-sa-na (URBS)

“40 . . . with/for Nunus, Huliyas’ son (*Huliyasan*), the Tas(a)kuwean (*Tas(a)kusan*).”

For the patronymic adjective see above citation 22. The -san ethnic adjectives are collected in citations 37 ff.

(30) KULULU strip 1, rev. 4:

50 “*179” ¹h[u]-li-ia-ia | CUM-ni ¹na-ni-mu-ta-sa-na ta-pa-ia (URBS)

“50 . . . with/for Huliyas, Nanimuta/is’ son (*Nanimutasan*), in the city of Tapas.”

(31) KULULU strip 1, rev. 4:

50 “*179” [l]hu-li-ia-ia | CUM-ni ¹TONITRUS-hu-na-za-sá-na | FRATER-la-i

“50 . . . with/for Huliyas, Tarhunazas’ brother (*Tarhunazasan*).”

Cf. the Dat. ¹TONITRUS-hu-na-za-ia in this text 11. 1, 2, rev. 4. The name Tarhunazas is also attested outside the KULULU strips; cf. the Nom. TONITRUS-hu-na-(LITUUS)á-za-sá in BULKARMADEN, 1, and the dative plural of the -asi-adjective *ibid.*, 4: TONITRUS-hu-na-(LITUUS)á-za-sa-za-’. The name is obviously a compound of the name of the Storm God and the verb “to love” (cf. *HHL*, 186). It is interesting to find here a spelling -na-za- rather than -na-(LITUUS)á-za-; this proves what was suggested in *HHL*, viz. that the LITUUS has no consonantal value, and consequently brings further support to the reading of *HH*, no. 377 as *za* rather than †*t* (cf. the equivalence Phoenician ’*ztwd*, Hier. (LITUUS)á-*377-ti-wa/i-ta-). For further conclusions about the LITUUS see now Hawkins, “The logogram “LITUUS” and the verbs “to see” in Hieroglyphic Luwian”, *Kadmos* 19 (1980), 123 ff.

For FRATER-la-i see above citation 27.

(32) KULULU strip 1, rev. 5:

[.] “*179”-za [l]hu-li-ia-ia | CUM-ni ¹su-na-ti-ia-mi-sa-na | MAGNUS+RA/I-mu-wa/i-sa (URBS)

“ . . . with/for Huliyas, Sunatiyamis’ son (*Sunatiyamisan*), of the city of Uramuwas.”

(33) KULULU strip 1, rev. 6:

20 “*179”-za ¹nu-nu-ia | CUM-ni ¹ku-ku-wa/i-sá-na | tu-na-sá (URBS)

“20 . . . with/for Nunus, Kukuwa/is’ son (*Kukuwasan*), of Tunas.”

For the patronymic adjective see citation 20 above.

(34) KULULU strip 1, rev. 6:

10 “*179”-za ¹za+ra/i-ma-ia-ni-ia | CUM-ni ¹PUGNUS-ri+i-mi-sá-na

“10 . . . with/for Zaramayanis, . . . rimis’ son (*PUGNUS-rimisan*).”

Here we may have a double name *Zar(a)maya* (dat.) *Niya* (dat.) (cf. *Ni-ia* in strip 1, 1, 2, 3 [twice], strip 2, 1).

The name PUGNUS-ri+i-mi-sa (obviously connected with the verb PUGNUS-ri+i-) occurs in CEKKE B, 6, 9 (cf. also G. Neumann, *KZ* 92 (1978), 128 f.); in the KULULU strips cf. the dative PUGNUS-ri+i-mi-ia in strip 1, 2 and see citation 41 below for the ethnic adjective identical to the patronymic attested here; cf. also Hawkins in this periodical, p. 156.

- (35) KULULU strip 1, rev. 6:

10 “*179”-za ¹la-ia | CUM-ni ¹ha-ni-sa-na“10 . . . with/for Las, Hanis’ son (*Hanisan*).”

See citation 23 above.

- (36) KULULU strip 1, rev. 6:

20 “*179”-za ¹TONITRUS-hu-na-za-ia | CUM-ni ¹ta-ta-sa-na“20 . . . with/for Tarhunazas, Tatas’ son (*Tatasan*).”For Tarhunazas see above citation 31. A dat. ¹ta-ta-ia is attested in strip 1, rev. 5.

(d) Ethnic adjectives.

- (37) Cf. citation 19: hu-wa/i-sá-na(URBS)

- (38) KULULU strip 1, 1:

100 “*179” ¹MAGNUS+RA/I-mu-wa/i-ia | CUM-ni ¹MAGNUS+RA/I-mu-wa/i-sá-na(URBS)“100 . . . with/for Uramuwas, the Uramuwean (*Uramuwasan*).”

For the ethnic, obviously related to the personal name Uramuwas, also attested in this passage, see above p. 129, and cf. below citations 39 and 40. The genitive MAGNUS+RA/I-mu-wa/i-sá(URBS) occurs in strip 1, 1 and rev. 5.

- (39) KULULU strip 1, 1:

100 “*179” ¹REL-sà-i-ia | CUM-ni | MAGNUS+RA/I-mu-wa/i-sá-na(URBS)“100 . . . with/for K/Hwisas, the Uramuwean (*Uramuwasan*).”

See above citation 38 and below citation 40.

- (40) KULULU strip 1, rev. 4:

10 “*179”-za ¹tu-wa/i-ni-ia | CUM-ni | MAGNUS+RA/I-mu-wa/i-sá-na(URBS)“10 . . . with/for Tuwanis, the Uramuwean (*Uramuwasan*).”

See citations 38 and 39 above.

- (41) KULULU strip 1, 3:

20 [“1 *179”] ¹nu-i[a] | CUM ¹PUGNUS-ri+i-mi-sa-na(URBS)“20 . . . with/for Nus, the -rimian (-*rimisan*).”For the personal name PUGNUS-*rimis* see above citation 34; for the identity of patronymic adjective and ethnic see above p. 129 and cf. *Uramuwasan* of citations 38, 39, and 40.

- (42) Cf. citation 29: ta-sà-ku-sa-na(URBS)

- (43) KULULU strip 1, rev. 6:

80 “*179” | tu-na-sa-na(URBS) | á-na-ia | DARE-mi-na

“We give 80 . . . to the ANA, the Tunean (*Tunasan*).”The word order is unexpected, but there is little doubt that *Tunasan* is an ethnic (cf. the basic name *Tuna-*, e.g. in citations 27 and 33); *á-na-ia* is not preceded by the personal determinative but by the word divider, which points to a common noun. Yet, we expect a reference to an individual. A dative ¹á-na-ia is attested in CARCHEMISH A 11 a, 5 and A 11 c, 6 as the name of Katuwas’ wife — but it is difficult to see whether this is relevant here. J. D. Hawkins suggests that *tunasan anaya* means “to the mother of Tunas”. However, because of Cun. Luwian *anni-* we would expect the word for “mother” to be an *-i-* stem, which would then give a dative **á-ni-ia* or **á-ni*.

(e) Two difficult instances of *pasan*.

(44) CARCHEMISH A 1 a, 3:

- (i) *ARHA-pa-wa/i REL-i PES-wa/i-i-ha-'*
- (ii) *wa/i-mu-' za-à-zi DEUS-ni-zi | ta-ni-mi-zi | CUM-ni ARHA PES-wa/i-ta*
- (iii) *wa/i-ta-' REL-i-ha pa-sa-na-' "PODIUM"-ta-ti PRAE-i | *464(-)sù-ni-ha*
- (iv) *REL-i-ha-wa/i-ta pa-sa-na-' | "PODIUM"-ta-ti PRAE-i | *464(-)sù-ni-ha*

J. D. Hawkins, to whom we owe a full edition of this text (*An. St.* 22 (1972), 87 ff.), tentatively translates:

- (i) "When I came forth,
- (ii) these gods all came forth with me.
- (iii) Sometimes I --ed (the image??) of one from the podium,
- (iv) and sometimes I --ed (the image??) of another from the podium."

The translation of (iii) and (iv) is determined by the need to treat "PODIUM"-*ta-ti* as an ablative in contrast with the dative ("PODIUM")*hu-ma-ti* of CARCHEMISH A 11 b, 6. Yet it involves three assumptions which it is difficult to accept. First, *REL-i-ha* is taken as meaning "sometimes", for which we have no evidence; secondly, *pasan* is taken as an accusative of (*a*)*pasi* (at the time the transliteration did not distinguish *sa* from *si*); thirdly, an object with which *pasan* agrees, is understood. The second point is the most tiresome. All accusatives singular (common gender) of *-a/isi*s adjectives end in *-in*. The one exception occurs in TOPADA 8 (*à-pa-sa-na*), but the spelling of that inscription is so freakish that it cannot be given much weight.⁸

It is difficult to separate *pasan* from "PODIUM"-*ta-ti*; the latter *could* be a dative if we thought of an *-att-* or *-ant-* extension of *hum(a)ti-*, but at present we have no evidence for such a form. The alternative is that *pasan* is ablative in function; it could be argued that this double use matches the double use (Dat. and Abl.) of (*a*)*pati*. This too cannot be supported by any other evidence (but cf. above citation 3). The problem is not solved by the presence of *PRAE-i*, though it is normally stated that this postposition is construed with the ablative; here *PRAE-i* could be a preverb. Yet another problem is caused by *REL-i-ha*; the obvious suggestion is that this is a conjunction with the meaning "whenever", but conceivably it could be taken as an indefinite pronoun Acc. sing., though it is not clear how this would contribute to our understanding of the clauses. Finally, an object for the verb could be found in *-ata* "them" which is found after *-wa-*, but it would also be possible to recognize here Hier. *-ta*, the equivalent of Hitt. *-kan*.

In view of all these uncertainties no obvious translation offers itself. Very tentatively I suggest, more than a translation, a possible construction:

- (i) When I came forth,
- (ii) these gods all came forth with/for me,
- (iii) whenever I --ed them on/from the podium of one,
- (iv) (and) whenever I--ed them on/from the podium of another."

We know that (*a*)*pas* . . . (*a*)*pas* may mean "one . . . the other"; presumably the same property applies to the genitival adjective (*a*)*pasi-*. A further doubt remains in addition to those mentioned above. Instead of translating "whenever . . . and whenever . . ." it may be possible to translate "whenever . . . then . . .". Much remains to be done for the interpretation of the Hieroglyphic Luwian

⁸Moreover in TOPADA itself we find (line 3) a form *à-pa_x-sì-na* which is the expected accusative (cf. for the reading Hawkins, *An. St.*, 25 (1975), 127).

relatives and indefinites, but it is not inconceivable that two relative or indefinite conjunctions or pronouns in adjacent clauses may call for this type of translation; the second relative could “pick up” the first, acquiring a quasi-demonstrative value. This is at least possible in e.g. SULTANHAN 3 and in BOHÇA 3–4. The suggestion, if confirmed, could provide a historical explanation for the purely connective usage of the initial relative (REL-, REL-*i*-) discussed in *An. St.* 28 (1978), 113 à propos of KARATEPE.

4. From the list in 3.1. it emerges that all instances of *-an* datives belong to *-a/isis* adjectives; to my knowledge, there is no instance of *-an* dative for other noun or adjective types and there is no instance of *-i* or *-ia* dative for the *-a/isis* adjectives (see citation 26 above).⁹

The position of Cuneiform Luwian is ambiguous. Mittelberger (loc. cit.) pointed out that there is an example of *-an* dative from an *-assis* adjective and that this alternates with an *-a* dative: cf. *immaraššan* ^dIM-*ti* (KUB XXXV 54 II 37) and *imrašša* ^dIM-*unti* (ibid. 35). This is correct, but unfortunately the evidence is limited, nor do we have other data for the dative singular of the *-aššiš* adjectives of Cuneiform Luwian. Forms such as SISKUR.SISKUR-*aššan*za EN-*ya* or *malhaššaššan*zan EN-*ya*, also quoted by Mittelberger, are no clearer and no better attested now than they were then. The point is troublesome but serves to make clear that, since the Cuneiform data are uncertain, we must concentrate on the Hieroglyphic evidence.

5. It is unlikely that the *-an* datives are archaic forms. If this were so we might expect to find them in nominal forms other than the *-a/isis* adjectives. Moreover, if so, we would expect to find larger number of certain *-an* datives in Cun. Luwian. Finally, no comparative evidence points to an *-an* ending of dative singular. Hittite had some *-an* forms but these were originally genitive plurals; later they came to be used as singular forms, but it is not clear why they should appear here as dative singular. Lydian has an *-a* ending of Gen.-Dat.-Loc. plural, but this too must have the same origin as Hittite *-an*. All in all it seems that we are dealing with an innovation which must be explained within the Luwian group.

5.1. The *-i*- stems of Hieroglyphic Luwian, to which the *-a/isis* adjectives belong, have a relatively well documented inflection. The main forms were most recently listed and exemplified in *HHL*, 169 ff. (cf. also Meriggi, *Manuale* I, 31 ff.). It may be convenient to give here a list of the terminations:

⁹It is worth noticing that we do have an *-asi* form which is certainly a Dative singular in KÖRKÜN, A 3–4:

na-na-si-pa-wa/i-ta INFANS-*ni* REL-*sa* ARHA *tà-i*
 “who takes it away from Nanasi, (or) the child”

and ibid., B–C:

za-pa-wa/i-tu-ta (VINUM)*wa/i-ni-na* REL-*sa* ARHA *la-i na-na-si* INFANS-*na-ni* (NEPOS)*ha-ma-si* (NEPOS)*ha-ma-su-ka-la*

“who takes away this vine from her, from Nanasis, (or) the child, (or) the grandchild, (or) the greatgrandchild . . .”

(For the readings see A. Morpurgo Davies and J. D. Hawkins in *Studia Mediterranea* P. Meriggi *octuagenario*, forthcoming.)

Nanasis is a personal name and synchronically speaking is *not* a genitival adjective, even if it is likely that it originated in this manner.

		Singular		Plural
Common Gender	Nom.	<i>-is</i>		<i>-inzi</i>
	Acc.	<i>-in</i>		<i>-inzi</i>
	Gen.	<i>-asi, -isi, is</i>	→	?
	Dat.	<i>-i, -iya</i>		<i>-anza, -inza</i>
	Abl.Instr.		<i>-ati, -iti</i>	
	Gen. Adj.		<i>-asi-, -isi-</i>	

The neuter has a Nom.-Acc. sing. in *-an-za* and a Nom.-Acc. plur. in *-a*.

The same terminations, obviously without the *-i-* of the stem, occur in the other inflectional types; in the *-a-* stems *-i-* is replaced by *-a-*; we do not know much about the consonantal stems, though we have good evidence for an *-as* Gen. and an *-an* Accusative singular.

5.1.1. It is likely that the contrast between the *-asi* and *-isi*, *-ati* and *-iti*, *-anza* and *-inza* terminations of the so-called *i*-stems is due to a difference in stem-type and/or to a replacement of the original endings with newly created analogical formations.¹⁰ Here it would be premature to discuss the matter in detail, but, since the problem exists and may be relevant to the explanation of the *-an* datives, it is worthwhile to consider what data we have about the inflection of the *-a/isi*-adjectives as such. For this purpose we can ignore the contrast between *-asi-* and *-isi-*, i.e. between the two derivational suffixes, since our concern is only with the inflectional endings of the adjective and not with the formation of the suffix. The attested forms are as follows:

		Singular		Plural
Common Gender	Nom.	<i>-sis</i>		<i>-sinzi</i>
	Acc.	<i>-sin</i>		<i>-sinzi</i>
	Dat.	<i>-san</i>		<i>-sanza</i>
	Abl.Instr.		<i>-sati</i>	

In the neuter the Nom.-Acc. sing. ends in *-san-za* and the Nom.-Acc. plur. in *-sa*. As expected there are no genitive forms.

The evidence is not very large, but it is striking that, as far as we know, these adjectives do not show the *-iti/-ati*, *-inza/-anza* alternations which we have noticed in the *-i-* stems in general.

5.2. We must now ask two questions. First, if *-an* is an innovation, why is it limited to the *-a/isi*-adjectives? Secondly, if *-an* is an innovation, what is its origin?

5.2.1. The normal dative of the *-i-* stems in Hier. Luwian ends in *-i* or *-iya*; the consonantal stems, as far as we can judge, also had an *-i* dative, and the *-a-* stems oscillated between *-a* and *-aya* forms (for the rare *-a-i* see above p. 130).¹¹ The two demonstrative pronouns *zas* and *apas* had special dative forms identical to the Abl.-Instrumental: *zati* and *apati*. There is little doubt that the *-i* ending

¹⁰ Sometimes *-i-* may arise from contraction; this must be the case for instance of an *-isi*-adjective such as *Kiyakisi-* from *Kiyakiya-* (see above citation 27).

¹¹ There are also a few instances of *-a* "datives" from *-i-* stems, but these deserve a separate study.

is inherited and that *-ya* is also old. The problem is somewhat more obscure for the *-ti* forms of the pronouns but need not concern us here. More important is that the normal dative endings are unambiguous since (a) they are immediately recognizable as dative endings and are well differentiated from the other case forms; (b) are such that, given a certain nominative, we can predict the dative and vice-versa. Yet the position of the *-a/isi-* adjectives is somewhat peculiar. For an adjective like *apasis* 'his', we might expect a dative singular **apasi*, but this would have been homonymous with the genitive singular of *apas* 'he', viz. the attested form *apasi*. *¹mu-wa/i-ta-li-si* is attested as the genitive of Muwatalis, but is also the expected form for the dative singular of the genitival adjective derived from the name. Yet, Luwian tends to treat the genitival adjectives as independent formations, well differentiated from the forms of the noun or name from which they derive, and endowed with an inflection of their own. This ambiguity of the expected **-a/isi* datives may well have been responsible for the need for a new dative ending and may have triggered off an analogical process which led to the creation of the *-an* datives. If so, it would be understandable that the innovation was limited to the *-a/isi-* adjectives and was not extended to other formations where the existing dative created no problems.

5.2.2. Where does the *-an* dative singular originate? There are other *-an* endings in Hieroglyphic Luwian; the accusative singular of the *-a-* stems and the consonantal stems ends in *-an*; the neuter Nom.-Acc. sing. ends in *-an*, to which a *-za* element is added. Yet none of these forms is functionally similar to the dative.

To explain the *-an* datives it is best to concentrate again on the inflation of the adjectives to which they belong. In its original form this must have been:

		Singular	Plural
Common Gender	Nom.	<i>-sis</i>	<i>-sinzi</i>
	Acc.	<i>-sin</i>	<i>-sinzi</i>
	Dat.	<i>*-si</i>	<i>-sanza</i>
	Abl.Instr.		<i>-sati</i>

We have seen that the Dative sing. needed replacement. An analogical proportion such as:

$$\text{Acc. pl. } -sinzi : \text{Acc. sg. } -sin = \text{Dat. pl. } -sanza : \text{Dat. sg. } X$$

may give some indication of the process which led to the creation of the *-san* Dative singular. The new form was unambiguous and could not be confused with other case endings since in the adjectives the accusative singular always ends in *-sin*¹² and the Nom.-Acc. singular neuter in *-san-za*.

If this is so, it also becomes clear why the innovation was not extended to other inflectional types. First, we have seen that the need was not there. Secondly, the conditions for the innovation did not exist in all types of inflection; some of the *-i-* stems had an *-inza* and not an *-anza* dative plural; the *-a-* stems and the consonantal stems had an *-an* and not an *-in* accusative singular. Also, in the *-a-* stems and the consonantal stems an *-an* dative would have been homonymous with the *-an* accusative. We should not be surprised if in future we were to find sporadic traces of an abortive innovation which aimed at introducing the *-an*

¹²For TOPADA see above p. 133 and note 8.

dative in some *-i-* stems, but the chances are that, even if the innovation started to spread from the genitival adjectives, it stopped relatively early for the reasons indicated.

5.3. Does this explanation fit the Cun. Luwian facts? A definite answer is not possible because we do not know for certain what the facts are. There is little evidence for an *-an* dative and we do not know much about the rest of the Luwian inflection. It is still disputed whether there was an independent genitive. Yet, on the assumption that the one example is significant, the question may still be asked. The answer is positive, even though it calls for a slightly different proportion:

Acc. pl. *-sinza* : Acc. sing. *-sin* = Dat. pl. **-sanza* : Dat. sing. X

In Hier. Luwian the Acc. plural ends like the Nominative plural in *-nzi*; in Cun. Luwian the Nom. plural ends in *-nzi*, but we have little evidence for a *-nzi* Accusative. The normal Acc. ending seems to be *-nza* (*-inza* in the *-i-* stems). There is no clear evidence for an **-asanza* dative plural but this can be postulated with confidence since, (a) the dative of the *-i-* stems ends in *-anza* (*maššananza* ‘‘to the gods’’ from *maššani-*), (b) the numerous forms of Ablative-Instrumental which end in *-aššanazati* (*hirutaššanazati* etc.) confirm the presence of *-anza-* forms in the paradigm.

The conclusion is that, if Cuneiform Luwian had an *-an* form of dative singular, this could have arisen in the same manner as it did in Hieroglyphic Luwian; any further statement or speculation is premature in the absence of the basic data.

6. A final summary is now in order. At some stage Hieroglyphic Luwian (perhaps preceded – independently or not – by Cuneiform Luwian) created a new *-an* ending for the dative singular of a restricted class of adjectives, the genitival adjectives in *-a/isi-*. The innovation must have been prompted by the need to avoid ambiguity between the inflected forms of the adjectives and the *-a/isi* genitive of the nouns from which the adjectives derived. The symmetrical relationship between the Accusative singular and the Accusative plural (*-a/isin* and *-a/isinzi* respectively) was extended to the Dative singular and plural so that near the Dative plural *-a/isanza* a new Dative singular *-a/isan* was created. This can be stated in the form of an analogical proportion:

Acc. pl. *-sinzi* : Acc. sing. *-sin* = Dat. pl. *-sanza* : Dat. sing. *-san*

The final result is the creation of a new morph for the dative singular. For anyone concerned with the theory of analogical change, the analogical creation of a new morph is uniquely interesting in that it does not fit within the traditional definition of analogy as a process of redistribution of co-allomorphs. In the particular case we have considered the explanation proposed is best stated in terms of an analogical proportion, as is often the case when new morphs are created. Once again we are pushed by this small bit of exotic evidence to ask why analogical proportions, which seem to be a naive and almost primitive device, for which no successful attempt at formalization has ever been made, are in fact such a powerful means of accounting for some types of linguistic change.¹³

¹³For other examples of proportional analogy, for the history of proportions, and for some general statements see A. Morpurgo Davies, *Studies . . . L. R. Palmer*, Innsbruck 1976, 181–97; *Étrennes . . . M. Lejeune*, Paris 1978, 157–66; *Transactions of the Philological Society* 1978. 36–60.