

FROM VERB SERIALISATION TO NOUN CLASSIFICATION

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0. INTRODUCTION

Two kinds of covert noun classificatory systems are widely found in Papuan languages: nouns categorised by existential verbs and nouns classified by means of pro-verbs. Some languages display both types, e.g. Kuman, a language of the Central Family of the East New Guinea Highlands Stock. I will briefly outline these two systems in Section 1. A new and possibly unique type of noun classification has recently come to light. In Imonda, a language of the Trans-New Guinea Phylum and member of the Waris Family, reanalysis of verb serialisation has given rise to a system of noun classification. This has also happened in other languages of the same family, such as Waris. Reanalysis of serial verbs is a common phenomenon but the languages of the Waris family may well be unique in reinterpreting such verbs as classificatory affixes. At the beginning of Section 2 I will briefly illustrate some other cases of reinterpretation of serial verbs and then proceed to discuss the particular case found in Imonda.

1.1 Noun classifying existential verbs

Enga has seven existential verbs that depend on the habitual posture of the object as perceived by native speakers. For instance, *katenge* is used for NPs whose referent is tall, large, strong, such as 'men' or 'trees'; *petenge* occurs with NPs whose referent is small and weak such as 'women' or 'insects', etc. Kuman has three existential verbs, which are not shape classifiers and which seem to be conditioned by animacy (Piau 1981). Classificatory existential verbs occur in many Trans-New Guinea Phylum languages; another example is Imonda. There we have three such verbs which can be used as full intransitive verbs as well. When they are so used the meaning is *stand*, *sit* and *lie*. That they are used as existential verbs is clear from the following example:

- (1) *ne-na motorbike kai li-f-me*
2p-poss *motorbike* q *lie-prs-q*
Do you have a motorbike? [Does your motorbike exist?]

Given the full verb meaning of these existentials it is clear that they are conditioned by the characteristic posture of the objects.

Let us briefly look at the second widespread type of classification.

1.2 Noun classifying pro-verbs

In many Trans-New Guinea Phylum languages we find a predication type that consists of one of a small number of verbs plus an adjunct. The details vary from language to language and I will briefly illustrate this type of construction with an example from Enga. The meaning of the predication is carried by the adjunct, which, with the exception of a handful of nouns, cannot occur independently, i.e. outside the predication construction. The accompanying pro- or auxiliary verb functions mainly as a peg to show tense, aspect and so on:

- (2) yokó dúpa ápu le -ly -ámi-no
leaf they dry utter-pres-3pl-dec
The leaves are drying.
- (3) baa-nyá mókó dóko pakélyó si-ly -á -mo
he-poss leg the scar hear-pres-3sg-dec
His leg is scarred.
- (4) baa-mé yamé pi-ly -á -mo
he-Ag cover hit-pres-3sg-dec
He is covering it.

(Examples 2-4 from Lang 1975:86)

Most adjuncts are nouns and only occur with one pro-verb; so the noun classes in these languages are established on the basis of which pro-verb the nouns occur with (whether this type of construction is in fact an instance of noun classification is questionable but I will not discuss this here). These few remarks must suffice to show the nature of the adjunct plus pro-verb noun classificatory system. (For more discussion and references see Lang 1975 and Piau 1981.)

Having briefly outlined the two well-known classification systems we can now turn to the third type, where serial verbs were reinterpreted as noun classifiers. By way of comparison let us first look at a couple of other constructions involving reanalysed serial verbs.

2.1 From serialisation to prepositions or cross-reference marking

In African linguistics there has been a lengthy debate about how serial verb constructions are best interpreted synchronically (see Givón for a discussion of this case and for further references). Let us look at two Yoruba examples:

- (5) mo mu' i'we' wa' fu'n o,
I took book came gave you
I brought the book for you. (Givón 1975:83)
- (6) mo so, fu'n o,
I said gave you
I said to you. (Givón 1975:83)

In the first case (5) the element fu'n could still be interpreted literally as a full verb, whereas in the second example (6) this is impossible. After stating the case for a reanalysis of originally full verbs as prepositions in Niger-Congo languages, Givón takes up the question of how such a change may be expected to happen; this we can ignore here.

In South-East Asian languages the same phenomenon is found. Here are two examples from Vietnamese:

- (7) Lan chạy vào vườn
 run (go)into garden
 Lan ran into the garden. (Clark 1978:110)

- (8) Lan nhìn vào cửa-sổ
 look window
 Lan looked into the window. (Clark 1978:111)

The element *vào* in example (7) could be regarded as a verb yielding the translation *Lan ran, entering the garden*. This is however impossible in (8); here *vào* has to be interpreted as a preposition.

In Papuan languages too, we find reinterpreted serial verbs. In many languages the verb 'give' functions as a benefactive marker. In Abelam, a member of the Ndu language family, we find *kway*, which can occur as an independent verb 'give', in the following example:

- (9) yatə -kway-kʌ -wtə -kwʌ
 carry Ben fut 1st non-past
 I will carry (it) for you. (Laycock 1965:55)

There are two ways of viewing the Abelam case; either we state that there is a benefactive marker that is phonetically identical with the verb 'give' and occupies the same slot as the latter would in serial constructions, or we do not keep the two forms apart and regard examples such as (9) as extensions of the meaning of 'give'. The situation in Awtuw, a member of the Ram family, is analogous:

- (10) wan-e yiye ka -lowpa-kow-nem!
 1st-O gate imp-open -ben-pl
 Open the gate for me! (H. Feldman, personal communication)
- (11) Awtiy-re tey aeye rokra-kow-ka
 Awtiy-O 3fs food cook -ben-pf
 She's cooked food for Awtiy. (H. Feldman, personal communication)

The Ben marker *-kow-* occurs as an independent verb 'give', but the meaning of 'give' need not be present in (11) and is certainly absent in (10).

Whether we call cases such as Abelam or Awtuw instances of extension or reanalysis is a matter of terminology.

Having looked at a couple of cases of reanalysis of serial verbs as prepositions or benefactive markers, we will now turn to the case of Imonda.

2.2 Reanalysis of serial verbs as noun classifiers

General characteristics of Imonda

Like most Papuan languages Imonda is verb final. It exhibits simple noun morphology and has complications in the verbal morphology. S/DO/IO are cross-referenced on the verb. It has a case system which is conditioned by the syntactic status and semantic content of the NPs as well as lexical properties of certain verbs. Verb stems can be strung together to form serialisations. Apart from number marking and some aspect markers that do not have a verbal

base, nothing can intervene between the different verb stems. In Imonda we only find 'nuclear' serialisation. By this term Foley and Olson refer to conjoined predicates that share all core arguments and aspect marking. This is in contrast to core serialisation where the individual verbs select the core arguments independently (see Foley and Olson (1985:28) for a discussion of these two types with examples from Barai, another Papuan language). Nuclear serialisation consists of at least two verbs, one of which belongs to an open class and the second to a restricted class of verbs. They establish a hierarchy of what sort of verbs are most likely to occur in the restricted slot. Active intransitive motion verbs are most eligible for the restricted slot; this type occurs in Imonda:

- (12) tobto wai-səh -wəl-wagl-f
fish acc-search-pl-go-pres
She goes along looking for fish (with her child).

I cannot go into any details of their hierarchy and the interested reader is referred to their article. The top position in the hierarchy is occupied by certain Papuan languages, which allow multiple open slots. Barai and Yimas display serialisation with two or more transitive verbs, as shown in the following Barai example:

- (13) a na ine tua kore-j-ie
you I stick break off throw-trans-2sg
You broke off and threw a stick at me.

Now, in Imonda we find examples that seem entirely parallel to this pattern, i.e. serialised transitive verbs (note the use of double quotes hereunder):

- (14) if ka-m fət -ai -h -u
breadfruit I-o remove from fire-give-rec-imp
"Remove the breadfruit from the fire and give it to me."

- (15) sa ka-m pət-ai -h -u
coconut I-o pick-give-rec-imp
"Pick the coconut and give it to me."

- (16) e-nei pwis-ai -h -u
prox-dem cut-give-rec-imp
"Cut this and give it to me."

- (17) e-nei pwis-ne-u
prox-dem cut-eat-imp
"Cut this and eat it."

At first glance we seem to have straightforward examples of serialisation. fət, pət and pwis all occur as independent verbs. The second verb in (17) also occurs independently:

- (18) e-nei ne-u
prox-dem eat-imp
Eat this.

The element ai however is not an independent verb; it shows up only in serial constructions. It is odd that a language should not have an independent verb 'give'; in fact, a bit of testing soon reveals that examples (14) through (16) do not mean anything else but 'give'. The meaning of the first verbs in

the constructions, i.e. *fət remove from fire*, *pət pick a hanging fruit* and *pwis cut* is not present. A breadfruit or a coconut may be lying on the ground or on a table and yet (14) and (15) have to be used if we want someone to give either of these objects to us. Likewise in (17) *pwis-ne-u* only means *eat*, no cutting is involved. The difference between (17) and (18) is that in the former we have some idea what sort of food is being talked about whereas this is not so in the latter case. This additional information is carried by *pwis*, the element which at first seemed to be a full verb taking part in a serial construction. Note that *pwis* (*fət* and *pət*) does occur as free verb *cut* but has lost its verbal status in constructions such as the ones above. In other words, *pwis* has been reanalysed as a noun classifier. The common factor of all objects referred to by the nouns that trigger *pwis* on the verb is that they are usually cut up before being eaten, such as meat. Likewise the common factor of objects that take *fət* is that people put them into the fire, such as breadfruit or firewood. This shows that the range of objects a given classifier takes is determined by the original meaning of the verb from which it derived.

A question that arises concerns the number of these classifiers. Given their verbal origin and assuming that *ai* was a full verb at an earlier stage of the language it is to be expected that there is a large number of classifiers as one can do many different things to objects and then pass them on. This is exactly what is found in Imonda. So far I have found about 60 classifiers. Not all of them are on the same footing however. Many are parallel to the ones given above, i.e. they have a related verb that is phonetically identical and native speakers can readily perceive the connection between the two. However, a number of the most frequently occurring classifiers do not have any related verb at all, or if they do, then the connection is opaque to the speaker because of phonological reduction. Here are some of the more important of these opaque classifiers.

- (19) *flau i ka-m f-ai -h-u*
axe I-o class-give-rec-imp
Give me the axe.
- (20) *jahaf ka-m l-ai -h -u*
gnetum I-o class-give-rec-imp
Give me some gnetum leaves.
- (21) *sa ka-m pwi-ai -h -u*
coconut I-o class-give-rec-imp
Give me the coconut.
- (22) *təbtə ka-m w-ai -h -u*
fish I-o class-give-rec-imp
Give me the fish.
- (23) *po ka-m i(j)-ai -h -u*
water I-o class-give-rec-imp
Give me some water.
- (24) *təh ka-m t-ai -h -u*
firewood I-o class-give-rec-imp
Give me firewood.

- (25) sue ka-m g-ai -h -u
fire I-O class-give-rec-imp
Give me fire.

- (26) poi ka-m s-ai -h -u
pitpit I-o class-give-rec-imp
Give me pitpit (saccharum).

Let us briefly look at these classifiers one by one:

- (20) l-

This classifier collocates with greens, i.e. leaves; it may be derived from the verb *lesf* *put on top of each other*, but native speakers do not see any link between the two. Interestingly, the loan word 'book' can also take this classifier.

- (21) pwi-

In this case the classifier seems to be related to the verb *pwiwalf* *break in two*. The range of objects is defined accordingly, i.e. whether they are normally broken or not. The introduced item 'biscuit' is subsumed under this category.

- (22) w-

For this classifier I was unable to find a related verb. The objects that go with it are small animals such as fish and frogs. So, presumably, this verb (dropped out of use?) must have meant something like *capture* or *kill*.

- (23) i(j)-

There is a related verb *if* *scoop water out*. But this does not refer to the ordinary fetching of drinking water, but rather to the specific case of scooping water out of an area dammed up for the purpose of collecting fish. So the semantic link between the classifier and the verb is not transparent to the native speaker.

- (24) t-

There is the verb *tɔf* *break* and the range of objects accordingly consists of breakable objects. But again the verb has been reduced to a single consonant, thereby obscuring its origin.

- (26) s-

The related verb here is *sef* *remove from ground*. Again the verb is reduced to a single consonant.

- (19)+(25) f- + g-

These two classifiers are by far the most frequently occurring ones. There is absolutely no hope of finding verbs from which they might have been derived, given the disparate sort of objects they collocate with. Quite often, and especially so in the case of f-, these classifiers can replace others. It is therefore not surprising to learn that the vast majority of introduced items can co-occur with them.

The above classifiers give a clue as to why reinterpretation could take place. Phonological reduction seems to have played a major role. As pointed out, these classifiers occur very frequently and so it is not surprising that they should have undergone reduction, thereby obscuring their verbal status. Where no reduction took place, such as in the case of *pot pick fruit* or *pwis cut*, reinterpretation must have happened by analogy.

Given that Imonda does not possess an independent verb 'give', i.e. no verb 'give' without prefixed noun classifiers, it is interesting to see what the language does with loan items.

2.2.1 Integration of loan items into the classificatory system

Imonda has two options for the integration of borrowed nouns into the classificatory system. Either the co-occurring verb takes one of the two semantically least marked classifiers, i.e. *f-* or *g-*, or the new object triggers one of the more specific classifiers if native speakers can associate the introduced item with one of their traditional culture because of similarity in shape or use. Most of the introduced items can occur with one of these two classifiers, *f-* being more widely used. However there are some which do not:

- (27) *kopwi ka-m i(j)-ai -h -u*
coffee I-o class-give-rec-imp
Give me coffee (liquid).

The use of *faihu* or *gaihu* would render the above sentence ungrammatical. Although it has not been tested thoroughly it is my impression that most loan words can take one or the other of these semantically unmarked prefixes. Sometimes an informant would hesitate and would not be sure whether a given construction is acceptable or not:

- (28) ? *bia ka-m g-ai -h -u*
beer I-o class-give-rec-imp
Give me some beer.

It appears that in this example the classifier *logw-*, related to the verb 'fill in' is preferred.

The use of more transparent classifiers is more revealing as far as reinterpretation is concerned. Here we get additional support for the view that erstwhile full verbs were semantically depleted and reanalysed as classifiers.

One of our first examples involved the classifier *pot*, which has a related verb of identical phonemic shape *pick fruit*. Now, the introduced item 'ball' also takes this classifier. It is clear that the link between ball and coconut is shape. This, incidentally, was the main evidence for Brown to treat the classifiers as conditioned by shape (Brown 1981). Brown was the first to draw attention to the classifiers in the Waris languages. He noted a set of 15 verbal prefixes and analysed them as being conditioned by the shape of the object of the verb. He also mentioned that many of these prefixes seemed to have related verbs. However, he did not discuss the link between verb and classifier and instead dedicated his attention to establishing the semantic domains of the 'shape classifiers'. As we have seen the range of objects of a given classifier is determined by the meaning of the full verb from which it was derived, i.e. it is not shape that it is conditioned by. However, examples such

as pôt show that some reinterpretation in direction of classification on the basis of shape may be going on. The next example presents another apparent shape-based choice:

- (29) we/ban ka-m kul-ai -h -u
 rope/belt I-o class-give-rec-imp
 Give me the rope/belt.

The verb associated with the classifier kul- is kul of *coil up*. We have already seen another case of shape-based choice of classifier, namely that of 'book' which was classified together with 'greens', presumably due to its having many leaves, i.e. pages, put on top of one another. Often one cannot decide whether it is shape or use which was the basis of the choice; so for instance, introduced containers usually take the same classifiers as those of traditional origin. A typical example of use-based choice is the classification of shot-gun along with the traditional bow.

2.2.2 Some remarks on the verbs that take the classifiers

The classifiers generally appear with verbs for which it would make sense to enter into serial constructions with the source verbs of the classifiers. We therefore find fət < *remove from fire* prefixed to verbs such as 'give', 'go', 'come', 'throw', 'eat', but not to verbs such as 'see' or 'like'. As is to be expected, the classifiers do not appear with verbs from which they are derived. Nor are they used with verbs that denote activities that have to be performed before an item can be given/put/carried.

We have seen above that some of the verbs that take classifiers such as nef *eat* can occur independently. Other examples are 'come' and 'go':

- (30) e -nei pwis-wagl-u
 prox-dem cut -go -imp
 Carry this. [< cut this and go.]

Given the loss of verbal status of pwis we now have to interpret wagl *go* as a different lexical item 'carry' when it is prefixed with the noun classifiers.

Other verbs that take the classifiers such as 'give' do not occur independently. Other examples are 'put', 'throw' and 'get'. There are various peculiarities and irregularities associated with these classifier + verb constructions, which however I cannot discuss here. I would like to mention just one point. Some of the verbs are phonologically very reduced in some forms. The most extreme case we find with -iaf *get*, which disappears altogether in the imperative:

- (31) sa pôt-ia -u
 coconut class-get-imp
 Get a coconut!
- (32) sa pôt-abt -u
 coconut class-dual-imp
 Get two coconuts!

Where the object is dual as in (31) the verb 'get' drops out completely. Phonological reduction of what used to be the second verb in serialisation and its dropping out of use as independent verb clearly helped to obscure the two-verb status of these constructions and thus furthered reanalysis.

BIBLIOGRAPHY

BROWN, R.

- 1981 Semantic aspects of some Waris predications. In K.J. Franklin, ed. *Syntax and semantics in Papua New Guinea languages*, 93-123. Ukarumpa: S.I.L.

CLARK, M.

- 1978 *Coverbs and case in Vietnamese*. PL, B-48.

FOLEY, W. and M. OLSON

- 1985 Clausehood and verb serialization. In J. Nicholas and A. Woodbury, eds *Grammar inside and outside the clause*. Cambridge University Press.

GIVÓN, T.

- 1975 Serial verbs and syntactic change: Niger-Congo. In C. Li, ed. *Word order and word order change*, 47-112. Austin: University of Texas Press.

LANG, A.

- 1975 *The semantics of classificatory verbs in Enga*. PL, B-39.

LAYCOCK, D.C.

- 1965 *The Ndu language family (Sepik District, New Guinea)*. PL, C-1.
1973 *Sepik languages; checklist and preliminary classification*. PL, B-25.

LORD, C.

- 1973 Serial verbs in transition. *Studies in African Linguistics* 4/48: 269-296.

PIAU, J.A.

- 1981-82 Kuman classificatory verbs. *Language and Linguistics in Melanesia* 13:3-31.

