

**HARUAI VERB STRUCTURE AND LANGUAGE CLASSIFICATION
IN THE UPPER YUAT**

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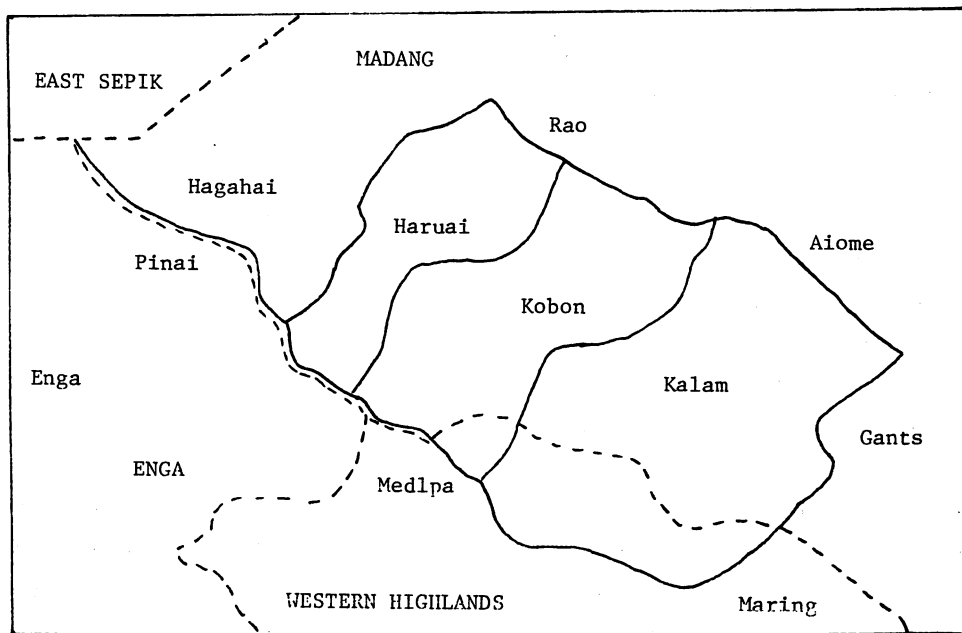
ABSTRACT

Much work on the genetic classification of Papuan languages has rested on lexical comparison. More recently, greater weight has been placed on typological structural properties. However, both lexicon and general typological features are notoriously subject to areal diffusion independent of genetic affiliation. By contrast, bound morphology is much more resistant to borrowing, and therefore forms a securer basis for genetic comparison. While Haruai (Wiyaw, Waibuk) shares much vocabulary and many general typological features with languages of the Kalam family, detailed analysis of Haruai morphology shows that it clearly belongs to the Piawi family and that similarities to languages in the Kalam family must be the result of areal diffusion. Future work on the genetic classification of Papuan languages has as its prerequisite the availability of good synchronic descriptions of the individual languages.

Map

Haruai and Surrounding Languages

(based on Tonson 1976:111)



Scale: 1 inch = 6 miles

Haruai	Language name
MADANG	Province name
————	Language boundary
-----	Province boundary

1. INTRODUCTION

Haruai (ha rway) is spoken by some 1,000 people in the south-west of the Mid-Ramu (Simbai) District in the south-west of Madang Province, Papua New Guinea (see map).¹ Prior to my own fieldwork on Haruai from September 1985 to August 1986, virtually the only material available on Haruai consisted of wordlists, with no published material on morphological or other structural features.² Any statements about the genetic affiliation of Haruai therefore remained necessarily highly tentative. As far as vocabulary is concerned, Haruai shares roughly equal percentages of basic vocabulary with both Kobon and Aramo,³ the two neighbouring languages with which the Haruai are in closest contact. According to Davies & Comrie (1984: 281), Haruai and Kobon share 35% subjectively assessed cognates, Haruai and Aramo 37% - while Kobon and Aramo share only 19%. While Kobon and its sister language Kalam have been the subject of intensive investigation over the past couple of decades, this has not been the case either with Haruai itself or with such neighbouring languages as Aramo and Pinai, to which there is a high degree of initial plausibility that Haruai might be related genetically.

Given the paucity of available information, earlier claims about the genetic affiliation of Haruai were inevitably speculative. Wurm (1982: 126, 223) assigns Haruai (there referred to as Waibuk or Wiyaw) to the Piawi (or Waibuk) family, which consists of the following languages: Haruai, Aramo (or Aramaue), Pinai (or Pinaye) and Wapi.⁴ He remains undecided, however, whether the Piawi family should be assigned to the East New Guinea Highlands stock of the Trans-New Guinea phylum (along with the Kalam family) or, as originally suggested by Laycock (Laycock & Z'graggen 1975: 758), to the Yuat superstock of the Sepik-Ramu phylum. My aim in this paper is to clarify the genetic affiliations of Haruai at the lowest hierarchical level, though I also note one piece of evidence that may be relevant at higher levels.

In the earliest work on genetic classification of Papuan languages, great emphasis was laid on lexicon, wordlists and counts of (usually subjectively assessed) cognates forming the basis of classificatory claims. However, it has become clear that this methodology is highly unreliable, perhaps especially given the Papuan sociolinguistic environment, where borrowing of very basic lexicon is quite widespread. Thus Wurm (1982: 260) acknowledges that for lexical evidence 'to have considerable validity, it requires to be supported by additional evidence'. I will try and show in section 2 that in the case of Haruai it is probably safer to discard lexical evidence altogether. Wurm's suggestion is that greater emphasis should be placed on structural features.

However, the general concept of 'structural features' is quite broad, including in particular some aspects of language that are known independently to be easily borrowable along with other features that are more resistant to borrowing. For instance, general typological features are notoriously subject to areal diffusion: consider, as an example, the modern Indo-Aryan languages, whose strict verb-final word order and phonemic retroflex consonants set them off from most other branches of Indo-European but find an exact parallel in the neighbouring Dravidian languages. At the other extreme, bound morphology is particularly resistant to borrowing, although this does not, of course, mean that bound morphology can never be borrowed (consider, for instance, the success of the Latin agentive suffix -arius in the Germanic languages, e.g. English -er). The distinction is thus not between features that can be borrowed and those that cannot be borrowed, but rather between different degrees of borrowability. The 'structural features' used in Wurm (1982) strike me as too biased in favour of readily borrowable general typological features. In these terms, one can establish a rule of thumb that will form the guideline through the rest of this paper: if language X shares common vocabulary and/or general typological features with

language Y but bound morphology with language Z, then this is prima facie evidence that languages X and Z are the more closely related and the similarities between X and Y are due to borrowing. The closer the identity in lexicon with corresponding divergence in morphology, the more likely this is to be true. In particular, I will try to show that for X, Y, and Z one can read Haruai, Kobon, and Aramo, respectively.

2. LEXICON

One of the things that most struck me in working on Haruai lexicon is the extreme flux that characterizes it. In many instances, it turns out to be quite unclear how one is to answer the question 'is x a Haruai lexical item?', even for an individual locality or person. While Haruai seems to have little internal structural variation, it has immense internal lexical variation, and very often this variation is between two terms one of which is quite different from its Kobon equivalent, the other identical or almost so. I will give a few examples to illustrate this. In the cluster of houses at Aradip (a dyb), where I did most of my work, there are two competing words for 'father': acö and böp, the latter tending to be used more by adults in speaking of their father; böp is virtually identical with Kobon bap.⁵ The usual word for 'sun' at Aradip is nayö, but the same speakers as usually say nayö will also sometimes say sdö, cf. Kobon södö.⁶ The existence of such pairs in more or less free variation is no doubt an advantage in a society, such as Haruai, where word taboo plays a large role. Tonson (1976: 105) noted that in his Haruai wordlists Kobon cognates are more frequent in the more northerly dialects and my own work confirms this. Around Bwalb, only some 20 minutes' walk from Aradip, several Kobon words are in use that excite amusement in Aradip (even though residents of Aradip are familiar with them): thus in Bwalb in addition to Haruai mhöd 'older sister' and mölöw 'sister (of male ego)', many speakers also use añ 'sister', cf.

Kobon añ. While Aradip speakers use wl wl 'small', Bwalb speakers also use pro pro, cf. Kobon pro pro. At Aradip, the usual expression for 'be ill' is rag^wö p, literally 'sorcery take'. Bwalb residents use ap r 'thing do'; here, although the actual words are different, the pattern is the same as Kobon nan g- 'thing do'.

Given that most of the subjectively assessable cognates between Haruai and Kobon involve virtual identity, given that they are so variable from community to community, from speaker to speaker, and even from occasion to occasion, and especially given also the virtual lack of morphological parallels between the two languages, the most plausible conclusion is that the similarities are the result of borrowing, in the direction from Kobon to Haruai (given that the variation characterizes Haruai in particular).

Incidentally, further insight into different historical layers of vocabulary in Haruai might be forthcoming from an analysis of the lexicon of songs. While I have noted lexical discrepancies between songs and ordinary Haruai, I have not investigated this problem in any depth.

GENERAL TYPOLOGY

In terms of general phonological, morphological, and syntactic typology, Haruai and Kobon are very similar; an assessment of the typological position of Aramo must await more detailed investigation of that language.

Haruai, like Kalam and Kobon, has a phonology of the Sepik-Ramu type (Wurm 1982: 54-57), though it should be borne in mind that despite the Sepik-Ramu type phonology Wurm assigns the Kalam family on balance to the Trans-New Guinea phylum. The following three features of Haruai are particularly characteristic. First, there is a non-phonemic close to half-close central vowel, so that many words have consonant clusters in phonemic representation which are broken up by this epenthetic vowel (symbolized ɨ) in phonetic representation, e.g. rmj 'ear', more

narrowly [rɪmʔ_l]; this gives rise to morphophonemic alternations between ɬ and zero, e.g. stem p 'take', more narrowly [pʔ], used for instance in serial verb constructions, versus singular imperative p-ɔ̃, without ɬ. (Some, but not all, instances of ɬ in Kobon are apparently phonemic (Davies 1981: 230).) Secondly, and no doubt related to the first point, the phonemic semivowels w and y have both syllabic and non-syllabic allophones, again giving rise to some morphophonemic alternations: thus, the future tense of w 'go' is y-n, with an initial syllabic, in the first person singular, but y-ɔ̃n, with an initial non-syllabic, in the third person singular. (For the morphological analysis of these forms, see section 6.1.) Thirdly, Haruai has phonemically distinct palatal and palatalized consonants (indicated by a tilde), e.g. m̃l 'long' versus m̃l 'light'. (Kobon and Kalam have a distinct palatal series of consonants, but no palatalized consonants with other primary place of articulation.)

Syntactically, Haruai is similar to Kobon and Kalam in having basically verb-final clause structure, with no cause marking of noun phrases (even the minimal case distinctions within pronouns found in Kobon and Kalam are missing in Haruai) and indexing of the person-number of the subject in the verb:

- (1) An hõn pay-n -ŋ -a.
 we pig hit FUTURE 1PLURAL DECLARATIVE
 'We will hit the pig.'

Other grammatical typological parallels between Haruai and Kobon include: adjectives usually placed after the noun; possessors usually placed before the possessed (except that personal pronoun possessors usually follow); both head-final and head-internal relative clauses; special medial verb forms, although the details of these forms are very different in the two languages, for instance in that Haruai has, in addition to switch-reference medial verb forms, other medial verb forms that are not sensitive to

coreference. For more detailed discussion and exemplification of these various points, reference should be made to Comrie (in preparation).

4. NOMINAL MORPHOLOGY

Haruai has virtually no nominal morphology. The same is true of Kobon and Kalam, though even the minimal pronominal morphology (e.g. distinct subject and non-subject forms) found in Kobon and Kalam is missing in Haruai. Haruai nominal morphology is in fact virtually restricted to special pronominal forms of a handful of kin terms.

One of the striking features of Kobon (and Kalam) kin term morphology is the following pattern (Jackson 1975: 96; Davies 1981: 234-237): most male kin terms begin with b, most female kin terms with a; the special second and third person possessor forms begin with n. Of the 24 kin terms listed by Davies, all those which have distinct second and third person possessor forms have them with initial n (though 3 begin with n even in the citation form; each of the 24 has at least one non-first person possessor form with initial n). Of these 24 terms, 7 of those relating to males have initial b, 7 of those relating to females initial a plus one term with either male or female reference but necessarily female ego).

Table 1: Some Haruai kin terms

	General/First	Second	Third
'father'	<u>acö</u>	<u>nawö</u>	<u>nwö</u>
'mother'	<u>mam</u>	<u>nam</u>	<u>nwöm</u>
'sister (of male ego)'	<u>mölöw</u>	<u>nölöw=</u>	<u>nölöw=</u>
'mother's brother'	<u>papwö</u>	<u>nöpap</u>	<u>nöpap</u>

Haruai has far fewer kin terms with specific possessed forms. Moreover, the only Haruai forms that show initial male b and

initial female a are forms that are anyway virtually identical to their Kobon equivalents, so that such parallels do not go beyond the lexicon, e.g. Haruai bönöy, Kobon bane 'wife's brother'; Haruai apso, Kobon apıs 'grandmother'. Haruai does, however, have a small group of kin terms where the second and third person possessor forms have an initial n not present in the general/first person possessor form, as set out in table 1. The forms for 'mother's brother' are virtually identical with their Kobon equivalents: panabap, nöbap (or nıbap?); the Haruai second and third person possessor forms for 'father' are identical with the Kobon forms for 'father's brother'; these may then be simply lexical similarities. The same could conceivably be true of the words for 'mother', where Kobon has amı, name, nime, though hardly for the third person possessor form here. But Haruai mölöw, nölöw (the latter must be followed by a cliticized personal pronoun indicating the possessor) are quite unlike any Kobon words for 'sister'. This is certainly a striking morphological parallel, albeit a small one. But note that Haruai also presents evidence for a general/first person possessor with initial m (mam, mölöw), which finds no parallel in Kobon. Moreover, some other Haruai kin terms form their possessive forms in other ways (e.g. the second-third person possessor form of apso 'grandmother' is apk). Overall, the evidence from possessed kin strikes me as inconclusive.

5. PERSONAL PRONOUNS

Table 2: Haruai and Aramo personal pronouns

	Haruai	Aramo	Proto-Piawi
Singular	1 <u>n</u> ; <u>nŋ</u> ; <u>ngö</u>	<u>ngö</u>	<u>*n</u>
	2 <u>nan</u> ; <u>nagö</u>	<u>nayö</u>	<u>*na</u>
	3 <u>nwn</u> ; <u>nwgö</u>	<u>nöyö</u>	<u>*nw</u>
Plural	1 <u>an</u> ; <u>anŋ</u> ; <u>angö</u>	<u>angö</u>	<u>*an</u>
	2-3 <u>nŋ</u> ; <u>nöyö</u>	<u>nöyö</u>	<u>*n</u>

The personal pronouns of Haruai and Aramo are set out in table 2. For Haruai, all alternants of which I am aware are given; for Aramo, only one set was elicited, so it is possible that there may be other alternants. Both languages have a two-way number distinction (no dual) and a three-way person distinction (no inclusive-exclusive distinction) with neutralization of second and third person in the plural; this statement is definitive for Haruai, although in Aramo it is possible that I may have missed some forms.

Inspection of table 2 readily reveals that the personal pronouns of Haruai and Aramo are extremely similar, to such an extent that I have even hazarded guesses as to the Proto-Piawi stems of these pronouns. In Aramo all pronouns have a final -gö, pronounced [gö] after nasals and [yö] elsewhere (the correspondence between Haruai og and Aramo y was noted by Tonson (1976: 105)); I assume that the labialization in the third person singular pronoun is to be assigned morphologically to the stem, as is more clearly the case in Haruai, where velars are always labialized in contact with w. In Haruai, the corresponding -gö alternates with -ŋ, this in turn being optional in the first person forms. It seems plausible that the velar nasals in the Aramo first person forms represent assimilation to the following g. The remaining surprise is the vowel in the Aramo second-third person plural form, though it should be borne in mind that the transcription for Aramo is impressionistic and the unexpected vowel may simply reflect an incomplete phonemic analysis.

These forms are quite different from those found in Kobon and Kalam, listed in table 3; I have not given all alternants or dialect variants, since their inclusion would not materially alter the picture. The only close parallels are Kalam nwk ~ Proto-Piawi *nw (with no close parallel in Kobon) and Kobon ne/Kalam nad ~ Proto-Piawi *na, although one should probably discount the Proto-Piawi n, which is common to all the personal pronouns.

Table 3: Kobon and Kalam personal pronouns

		Kobon	Kalam
Singular	1	<u>yad</u>	<u>yad</u>
	2	<u>ne</u>	<u>nad</u>
	3	<u>nipe</u>	<u>nwk</u>
Dual	1	<u>hol</u>	<u>ct</u>
	2	<u>köl</u>	<u>nt</u>
	3	<u>köl</u>	<u>kyk</u>
Plural	1	<u>hon</u>	<u>cn</u>
	2	<u>köl</u>	<u>nb</u>
	3	<u>köl</u>	<u>kyk</u>

Moreover, the Piawi family personal pronouns bear no obvious relation to any of the sets of pronouns given by Wurm (1982:37-48), especially in the striking ubiquity of the segment n. There is, however, one feature of the Piawi family personal pronouns to which I do want to draw attention in a broader genetic context, especially since it will recur in the discussion of verb morphology, namely the use of palatalization to mark the second-third person plural. As pointed out by Haiman (1979) and taken up by Wurm (1982: 78-79), one of the few pieces of morphological evidence for genetic relatedness among the various branches of the putative Trans-New Guinea phylum is the use of a palatal element as a plural marker in personal pronouns and verb forms. On this criterion, the Piawi languages show in fact greater affinity with the Trans-New Guinea phylum than does the Kalam family.

6. VERB MORPHOLOGY

The core of this section is a comparison of the indicative affirmative verb paradigm of Haruai with those of Kobon and Aramo (section 6.1), although in section 6.2 a number of other verb forms are considered briefly. Since the Aramo materials cited are based

on only a few hours' work with a speaker of that language, I should perhaps justify why I consider these paradigms reasonably reliable and what the limits are on this reliability. The Aramo materials were elicited primarily through Haruai, which my Aramo consultant speaks well as a second language; elicitation through Haruai was supplemented by elicitation through Tok Pisin, of which he has some knowledge, with the assistance of David (ŏnŏŋ=sŏ), a native speaker of Haruai who speaks good Tok Pisin (but no Aramo). The usual problems of eliciting verb forms arose, such as substitution of first person for second person and vice versa, of future for imperative and vice versa, but since it soon became apparent that Haruai and Kobon have verb forms that are so closely related it was easy to correct for this. The Aramo verb forms elicited are sufficiently close to those of Haruai to make genetic affiliation almost a certainty, though sufficiently different to guarantee that I was not just being given 'Haruai forms in an Aramo accent'. Although the wordlists in Tonson (1976) and Davies & Comrie (1984) give virtually no information on verb forms, comparison of other items elicited from Mapnŏ and corresponding forms in these wordlists make it clear that the same language is being described.

6.1 INDICATIVE AFFIRMATIVE VERB FORMS

The indicative affirmative verb forms of Haruai and Aramo are set out in table 4, these being the verb paradigms for which I have sufficient material for a detailed comparison of the two languages. For each tense in each language, two sets of forms are given, base and declarative, as explained below. The verb used in Haruai/Aramo is 'go'.

The first striking parallel, which finds no reflection in the Kalam family, is the distinction between base and declarative paradigms, the latter with a final -a (before which ŏ is lost); essentially, the base forms are used in questions and the declarative forms in statements. For further details, it will be

useful to examine the past tense first, as the most transparent morphologically, bringing in forms from the other tenses as appropriate.

Table 4: Haruai and Aramo indicative affirmative verb forms

	Haruai Base	Decl.	Aramo Base	Decl.
Present Sg.	1 <u>w-l</u>	<u>w-l-a</u>	<u>w-l</u>	<u>w-l-a</u>
	2 <u>w-l-ø</u>	<u>w-l-a</u>	<u>w-l-ø</u>	<u>w-l-a</u>
	3 <u>w</u>	<u>w-a</u>	<u>w</u>	<u>w-a</u>
Pl.	1 <u>w-øl</u>	<u>w-øl-a</u>	<u>w-øl</u>	<u>w-øl-a</u>
	2-3 <u>w-øy</u>	<u>w-øy-a</u>	<u>w-i</u>	<u>w-i-a</u>
Past Sg.	1 <u>w-m</u>	<u>w-m-a</u>	<u>w-m</u>	<u>w-m-a</u>
	2 <u>w-m-ø</u>	<u>w-m-a</u>	<u>w-m-ø</u>	<u>w-m-a</u>
	3 <u>w-øŋ</u>	<u>w-øŋ-a</u>	<u>w̃-a</u>	<u>w̃-a</u>
Pl.	1 <u>w-m-ŋ</u>	<u>w-m-ŋ-a</u>	<u>w-m</u>	<u>w-m-a</u>
	2-3 <u>w-m̃</u>	<u>w-m̃-a</u>	<u>w-m̃</u>	<u>w-m̃-a</u>
Future Sg.	1 <u>y-n</u>	<u>y-n-a</u>	<u>wI-n (?w̃-n)</u>	<u>wI-n-a</u>
	2 <u>y-n-ø</u>	<u>y-n-a</u>	<u>wI-n-ø</u>	<u>wI-n-a</u>
	3 <u>y-øn</u>	<u>y-øn-a</u>	<u>w-en (?w̃-øn)</u>	<u>w-en-a</u>
Pl.	1 <u>y-n-ŋ</u>	<u>y-n-ŋ-a</u>	<u>w-en</u>	<u>w-en-a</u>
	2-3 <u>y-øñ</u>	<u>y-øñ-a</u>	<u>w-eñ</u>	<u>w-eña</u>

The basic marker in the past tense is -m, except in the third person singular, where both languages have irregular (and different) forms. (Despite considerable rechecking, I remain suspicious of these Aramo third person singular past tense forms, which do not fit in with the general pattern.) The person-number suffixes shared by the two languages are: first person singular -ø, second person singular -ø;⁷ second-third person plural marked by palatalization. These recur in all three tenses (in the Present, -øy in Haruai is clearly the palatalized alternant of -øl; I presume that Aramo -i is the palatalized variant of -l). The third person singular suffix is perhaps also -ø in the past tense, as it

clearly is in the other two tenses. Thus the only discrepancy is in the first person plural, where Haruai has -ŋ, Aramo -θ, likewise in the future tense;⁸ but in the present tense both languages have zero.

The present and future tenses each have two tense markers. In addition, the third person singular present tense has a zero tense marker in both languages. The present tense markers in both languages are -l and -öl, with identical distributions except for the second-third person plural, where Haruai has the palatalized alternant of -öl, Aramo the palatalized alternant of -l. In the future tense the tense suffixes are -ŋ and -ön (though postulation of -ön as the precise form in Aramo requires more analysis than I can currently justify independently, but it is still clear that two very similar suffixes are involved); the distribution is the same in both languages except in the first person plural (where, as already noted, Haruai has the person-number suffix -ŋ, not found in Aramo). Yet another striking parallel is that the future tense suffixes induce palatalization of the stem: this is clear in the Haruai future stem y- and it is at least plausible that the impressionistic phonetic transcription of Aramo reflects a basic future stem w̄, as indicated in the analysis in parentheses.

Comparison with Kobon and Kalam reveals virtually no parallels in the forms of either person-number or tense suffixes. In table 5, I have set out the person-number suffixes of all four languages. (In Kobon and Kalam there are some variants in different tense-moods that I have not included, though they do not materially alter the picture.) The only parallel between the Piawi and Kalam families is the zero ending for the third person singular, which is of course widespread throughout the languages of the world and no basis for the genetic comparison.

Comparison of tense suffixes is more difficult because the tense systems of the Kalam languages do not match one-one with those of the Piawi languages (nor does Kobon match one-one with

Kalam), but even the following statements leave little room for speculation on similarities between the two families: Kobon past -Ø, present-perfect -b, present -ab, future -nab; Kalam present perfect/iterative -p, recent past -ab. The only remote similarity is the use of n in the Kobon future and in the Piawi languages.

Table 5: Person-number suffixes

		Harway	Aramo	Kobon	Kalam
Singular	1	<u>-Ø</u>	<u>-Ø</u>	<u>-in</u>	<u>-yn</u>
	2	<u>-Ø</u>	<u>-Ø</u>	<u>-an</u>	<u>-an</u>
	3	<u>-Ø</u>	<u>-Ø</u>	<u>-Ø</u>	<u>-Ø</u>
Dual	1			<u>-ul</u>	<u>-wt</u>
	2-3			<u>‡l</u>	<u>-yt</u>
Plural	1	<u>-ŋ</u> ; <u>-Ø</u>	<u>-Ø</u>	<u>-un</u>	<u>-wn</u>
	2	palatalization		<u>-im</u>	<u>-m</u>
	3	palatalization		<u>-al</u>	<u>-ay</u>

As noted in the discussion of personal pronouns in section 5, the use of palatalization to mark the second-third person plural is, however, a feature that might point in the direction of wider genetic affiliation between the Piawi languages and the Trans-New Guinea phylum, where the use of palatalization to mark plural verb forms is widespread.

6.2 OTHER VERB FORMS

It is not my intention here to go through all of the verb morphology of Haruai, for which reference should be made to Comrie (in preparation), but rather to cite a few forms where parallels and discrepancies among the languages in question can be noted.

Negation in Haruai is by means of the suffix -Øl, always stressed. The Aramo negation marker, prefixal ká (likewise stressed) is quite different. (Haruai, incidentally, has no prefixation in its verb morphology.) However, Kobon and Kalam

likewise have completely different negation markers: Kobon suffixal -ag, Kalam prefixal m(a)-, so variation in negative affixes between closely related languages may be an areal feature.

Haruai distinguishes same-subject verb forms in -ön from different-subject verb forms in -m(ön). In Aramo, I have noted the suffixes -ön versus -m with identical functions. In Kobon, both same-subject and different-subject verb forms agree in person-number with their subject, while in Kalam only different-subject forms do, thus giving rise to a much richer set of forms, but no striking similarities to those of the Piawi languages.

Haruai has a habitual-progressive aspectual suffix -md, identical in form (barring transcriptional differences) to the Kobon habitual suffix -mıd. However, in both languages this suffix is simply a morphologized variant of the verb md (Kobon mıd) 'stay', so the parallel does not in fact go beyond the lexicon. (Use of a verb meaning 'stay' to express aspect is common across the languages of the world.)

The only other possible parallel between Haruai and Kobon verb morphology that I am aware of is the Haruai nominalization in -b, cf. Kobon -eb. Given the gross disparities elsewhere, it is quite conceivable that the similarity could be accidental.

7. CONCLUSION

The most obvious conclusions from the foregoing concern the genetic affiliation of Haruai at the lowest level of hierarchical structure. Whatever may be suggested by vocabulary and general typology, verb structure shows clearly that Haruai is genetically related, indeed very closely genetically related, to Aramo, i.e. a member of the Piawi family. There is no evidence for any genetic relation with the Kalam family (though, of course, one can never prove that two languages are not genetically related; in any event, if the Piawi and Kalam families are in fact genetically related,

the relation is so remote that it may not now be retrievable). The lexical similarities are to be attributed to borrowing (probably rather recent, given the virtually identity between Haruai and Kobon forms).⁹ In terms of remoter genetic relations, the use of palatalization to mark some plural personal pronouns and verb forms is a striking morphological parallel between the Piawi languages and many branches of the Trans-New Guinea phylum, though hardly sufficient in itself to warrant inclusion of the Piawi family in this phylum.

But I would also like to draw some more general conclusions concerning work on the genetic classification of Papuan languages. Despite the reservations expressed by Wurm (1982: 260), much of this work still rests on lexical comparisons, yet in the case of Haruai in comparison with Kobon and Aramo such lexical comparisons are totally unrevealing of the close relationship between Haruai and Aramo and the vast genetic gulf between Haruai and Kobon. I doubt whether a shift to general typological properties would significantly change the picture; certainly in my work on Haruai I have been struck again and again by the close typological similarities to Kobon, especially in syntax. Yet even the results of a few hours' work on verb paradigms make it abundantly clear that Haruai and Aramo are closely related while Haruai and Kobon are not. Subjectively, the similarities between Haruai and Aramo verb paradigms are at least as close as those between, say, Spanish and Italian - it is almost as if we had been worrying for a decade or two whether Spanish and Italian are closely related languages.

Of course, I am aware that elicitation of verb paradigms is much more difficult than elicitation of vocabulary lists of comparable reliability. In my own work on Aramo I was exceptionally fortunate (and pleasantly surprised) in that, since Haruai and Aramo are so similar in this respect and since I had already worked in depth on the Haruai verb, I was able to elicit a sufficient body of Aramo material that I consider to be highly reliable within only

a few hours. But where the choice is between an easy but unreliable method (such as lexical or typological comparison) and a difficult but reliable method (such as morphological comparison), the need for reliability dictates that the more reliable method be chosen. More generally, I feel that progress on the genetic classification of Papuan languages must depend much more heavily on solid descriptions of individual languages. Even if the ultimate goal is diachronic comparison, a firm base must be established by synchronic description.

Addendum:

When this article was already in press, I learned from William A. Foley (Australian National University) that the personal pronouns in Huruai bear a striking resemblance to those of Arafundi. The possibility of a genetic link between Arafundi and the Piawi languages deserves further investigation.

NOTES

1. This material is based upon work supported by the National Science Foundation under Grant No. BNS-8504293. I am grateful to the Madang Provincial Research Committee for permission to conduct this research and to the Summer Institute of Linguistics (Papua New Guinea Branch) for invaluable material aid. I am especially grateful to the Haruai people for their enthusiastic support of my work on their language and to Philip Bebena (Ṁapnö) for devoting part of his brief visit to Aradip to allowing me to elicit some Aramo verb paradigms. Versions of this paper have been given to the Fifth International Conference on Papuan Linguistics, Goroka, June-July 1986 and to

the Department of Linguistics, Research School of Pacific Studies, The Australian National University, Canberra, August 1986. I am grateful to all those who offered comments after these presentations, and also to Andrew Pawley for his comments on an earlier written version, and to Carol Jenkins for making available to me some of her unpublished work. Kobon forms are cited from Davies (1981) or from unpublished material made available to me by John Davies; Kalam forms are from Pawley (1966) and therefore reflect the etp mnm dialect as spoken by the Kaironk territorial group. 'Haruai' (ha rway) is the indigenous name for the ethnic group and language referred to as Waibuk, Wiyaw, or Wovan in earlier literature.

2. Andrew Pawley (personal communication) gathered some Haruai and Aramo verb paradigms in the mid-1960s, but these have remained unpublished and were unavailable to me, although his conclusion that there are no obvious parallels between Kalam-Kobon and Haruai or Aramo verb morphology is rather well known.
3. On the basis of work carried out to the west of the Haruai area, Carol Jenkins (personal communication) notes that Aramo should more properly be considered one dialect of a language most appropriately called Hagahai. Since all my material is from Aramo, I will continue to use this term, which should perhaps therefore be construed as 'the Aramo dialect of the Hagahai language'.
4. I am not aware of any detailed work on Pinai beyond wordlists, which show a percentage of cognates of around 68-70% with Aramo (Davies & Comrie 1984: 281), a high enough figure to suggest genetic affiliation. Whether a separate Wapi language exists remains doubtful (Davies & Comrie 1984: 275, 282). The statement most consistent with the current state of knowledge would be that the Piawi family contains three languages: Haruai, Hagahai, Pinai.

5. There are many instances internal to Haruai where o alternates with other vowels, e.g. mōs or mos 'two'.
6. The difference between no vowel and i is probably purely transcriptional; see the discussion of i in section 3.
7. In my cassette recordings of Aramo verb paradigms, the distinction between first person singular forms without -o and second person singular forms with -o is not clear, although I made the distinction confidently in taking forms down from dictation. If I am in error here and Aramo in fact lacks this -o ending, this would be one similarity fewer between Haruai and Aramo.
8. Functionally, the Haruai first person plural suffix -ŋ does serve to distinguish first person plural forms that would otherwise be identical to other person-number forms, as the corresponding Aramo forms are.
9. This is consistent, at least in outline, with the archeological evidence. For information on this, in particular the earlier close contacts between the Haruai and peoples to the south and the recent nature of close contacts with the Kobon, I am grateful to Paul Gorecki; he is not, of course, to be held responsible for the use I have made of this information.

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