THE IMPACT OF BORROWING ON PALAUAN

Lewis S. Josephs

INTRODUCTION

Within the last century alone, the Palau Islands of the Western Carolines have been under the influence of four different foreign administrations. culture, gradually introduced into Palau after the annexation of the islands by Spain in 1686, 1 lasted until the end of the Spanish-American War. In 1899 Spain sold the islands, together with other possessions in the Carolines group, to Germany, which administered them briefly until the armistice terminating World War I. After World War I, the League of Nations granted Japan a mandate to the Carolines, including Palau. In spite of its withdrawal from the League in 1935, Japan did not relinquish the mandated islands, but instead put them to its own military and economic use. Palau's principal town, Koror, was made the administrative headquarters of all the Caroline Islands, and the islands of Peleliu and Angaur, south-west of Koror, were heavily fortified. Japan's defeat in World War II marked the end of its control over Palau and the Carolines, and on July 19, 1947, the United States was granted United Nations trusteeship over the area (henceforth called the Trust Territory of the Pacific), which is now in the process of termination.

The impact of four different non-indigenous languages - three European and one Asiatic - upon the language of Palau has been understandably great. Large numbers of lexical items borrowed from Spanish, German, Japanese, and English are used frequently in everyday speech. As we might expect, the majority of these represent names for items or concepts originally alien to Palauan culture, but it is clear that quite a few foreign borrowings have also replaced, or at least come into competition with, native lexical items. Many borrowed words have been 'Palauanised' to some degree or other - that is, they have been subjected to the complex derivational and inflectional processes of Palauan noun and verb morphology and have been introduced into certain characteristic syntactic constructions. Although many foreign lexical items have been taken into Palauan without any change in meaning, a significant number show a rather wide variety of semantic modification and distortion. Judging from a purely statistical count of foreign borrowings and from the over-all effect of Palauanisation, the influence of Japanese has obviously been the most pervasive, in spite of the fact that Japan controlled Palau for less than three decades. From the same points of view, English comes in second (and will presumably continue to have a strong influence), while Spanish and German, respectively, show considerably weaker impact.

Byron W. Bender, ed. Studies in Micronesian Linguistics, 81-123. Pacific Linguistics, C-80, 1984.

2. PALAUAN LOAN WORD PHONOLOGY

In general, the influx of foreign words into Palauan (PAL) has had surprisingly little effect on the language's phonological system. With a few relatively minor exceptions, foreign borrowings are always modified or distorted to conform with the phonemes and phonotactics of PAL, and in many interesting cases, these borrowings undergo phonological rules just as if they were native stems. The inventory of phonemes and phoneme combinations has increased only slightly under the influence of foreign sounds: most obvious is the appearance of the fricative /h/ (pronounced [h] in words of Jp. and Enq. origin and [x] in several items from Sp.) and the affricates /ts/ (corresponding to Jp. [č] or [ts] and Eng. [č]) and /dz/ (corresponding to Jp. [j]). Whereas chronologically older loanwords from Sp., Ger., and Jp. have been almost totally assimilated into the PAL phonological system, more recent loanwords from Eng. do not exhibit the same degree of Palauanisation. This is undoubtedly due to the fact that they represent the newest wave of foreign intruders and also to the fact that many educated speakers of the younger generation are essentially bilingual with Eng. Since these speakers have learned the correct Eng. pronunciation, they often preserve it when Eng. words are borrowed into PAL conversation.

In an attempt to illustrate the overwhelming tendency to reinterpret foreign borrowings in terms of the PAL phonological system, the sections below present a somewhat simplified sketch of PAL phonology² in which various classes of sounds are examined with emphasis on their occurrence in loanword vocabulary. Reference is made where necessary to the phonological systems of the contributing languages and to the relevant orthographic and (for Jp.) Romanisation systems.

2.1. Palauan consonants and their use in loanwords

In the chart below, the PAL consonant phonemes are presented in standard PAL orthography according to manner and point of articulation:

Chart of PAL consonants						
Manners of Articulation	Points of Articulation bilabial dental alveolar velar glottal					
Stops < voiceless voiced	ь	t d		k	ch	
Fricative			s			
Nasals	m			ng		
Liquids			r, l			

Figure 1

As we will see below, the rather restricted consonantal system of PAL requires considerable distortion of nonindigenous consonantal sounds that have no exact PAL counterparts.

2.1.1.

(2)

There are only two *labial* consonant phonemes in PAL — namely, nasal m and non-nasal b. The bilabial nasal m poses no problem and is used in loanwords whenever the contributing language has m, as the following examples illustrate:

(1)		Loan	Source ³	PAL ⁴	
	Sp.	maíz medalla	corn religious medal	maís medália	
	Ger.	Maschine Turm	machine, motor tower	mesíl turm	steeple
	Jp.	mado maguro	window tuna	mádo manguró	
	Eng.	movie rum		mubí rrom	liquor

Loan Source

The non-nasal labial phoneme b is a bilabial stop with two major allophones. Syllable-initially before an 1 or a vowel, the voiced allophone [b] occurs (e.g. blái [bláy] house, bilís [bilís] dog, rubák [rubákh] old man). Adjacent to another consonant in the same syllable (except 1) and in word-final position, we find the voiceless allophone [p] (e.g. btuch [ptu?] star, tbak [tpakh] my spittle, chab [?ap] ashes).

All labial obstruents in words borrowed from Sp., Ger., and Eng. are reinterpreted as the appropriately conditioned allophone of PAL /b/. Thus, the stops p and b and the fricatives f and v all become PAL /b/, s as the following indicate:

DAT.

(2)		Loan S	ource	PAL	
	Sp.	padre Pascua plato purgatorio trompeta bandera barril Biblia botella diablo calabaza calabozo sábado cebolla(s) farol virhén	priest Easter plate, dish purgatory trumpet, bugle flag, banner barrel Bible bottle devil pumpkin dungeon, cell Saturday onion(s) lantern virgin	badré Baskuá belatóng burkatório trombetáng bangderáng barríll ⁶ Bíblia butiliáng diablóng kal(e)basáng kelebús sebadóng sebuliás ⁷ barór birhén	jail, prison : table lamp
(3)	Ger.	Papier Post Kapitan Lampe Schlips Brief Bild Schraube	paper, document post office captain lamp, lantern necktie letter picture screw	babiér bost kabitéi lámbei slibs beríb bilt seráub	paper, letter, book holy picture

```
Tafel
                               blackboard
                                             tabér
            Fenster
                               window
                                             bénaster
            Grammophon
                               phonograph
                                             karmoból
            Maschinengewehr<sup>8</sup>
                               machine-gun mesilkebiér
            auswendig
                               by heart
                                             chausbengdik memorise
                                             báeb
                                                            pipe, windpipe
    Eng.
(4)
           pipe
                                             bistóna
           piston
           present
                                             bresénat
                                             chasbering
            aspirin
                                             osbitár
            hospital
                                             kombalíi
            company
                                             sib
            sheep
                                             baks
            box
            beer
                                             biáng
            bishop
                                             bisób
                                             klab
            club
            table
                                             tébe l
            flour
                                             blauáng
                                                            bread
            office
                                             obís
                                             sabtból
            softball
            valve
                                             barb
                                             berangdáng
            verandah
            glove
                                             kurób
            navy
                                             neibí
                                             sébel
            shovel
```

As the words in (2-4) illustrate, any labial from Sp., Ger., or Eng. becomes PAL /b/ realised phonetically as the indicated allophone in the selected examples below:

```
(5) [b]
   (i) syllable-initially, before 1:
        Sp. diablo = PAL diablong [diablon]
        Eng. flour = PAL blauang [blawan]
   (ii) syllable-initially, before a vowel:
```

```
Bíblia
                                [biblia]
      Biblia =
                 PAL
Sp.
                                [badré]
      padre
                 PAL
                      badré
                      barór
                                [barór]
                 PAL
      sábado
                 PAL
                      sebadóng [səbaðóŋ]
              =
                                [bilth]
Ger.
      Bild
                 PAL
                      bilt
      Post 
                 PAL
                      bost
                                [bosth]
                      babiér
                                [babiér]
      Papier =
                 PAL
Enq.
      piston
                 PAL
                      bistóna
                                [bistón]
                                [baks]
                 PAL
                      baks
      box
      valve
                 PAL
                      barb
                                [barp]
                      tébel
      table
                 PAL
                                [tébəl]
```

(6) [p]

(i) adjacent to consonant other than I in same syllable:

```
Ger. Schlips = PAL slibs [slips]

Eng. present = PAL breséngt [prɛsɛ́ntʰ]

softball = PAL sabtbol [saptból]
```

(ii) word-finally:

Ger. Brief = PAL beríb [bəríp]
Schraube = PAL seráub [səráwp]

Eng. pipe = PAL báeb [báɛp]
club = PAL klab [klap]

A few exceptions exist, of course, to the patterns of loanword phonology described above. In several borrowings from Eng., the labio-dental fricative f is not changed into /b/, but instead remains as [f]. PAL words showing this innovating pronunciation are, for example, féngda fender, and taifún typhoon. In addition, the initial and medial p's of Sp. Papa pope are also pronounced [p] in PAL Papa. The PAL word bostól apostle is a rendition of Sp. apóstol, but the initial a- was evidently misinterpreted as the PAL prenominal particle a, resulting in bostól being taken as the independent noun. The PAL noun Sebangiól Spain is derived from the Sp. adjective español Spanish; in this word, pronounced [səbanyól], the initial vowel e [ɛ] has been dropped and a [ə] has been inserted to avoid a rather infrequent PAL word-initial consonant cluster sb-. Finally, in a word like PAL nebtái from Eng. necktie, we observe an unusual switching from one grave consonant to another (k to b).

The Jp. bilabial stops p¹² and b are borrowed into PAL in the expected way — that is, they are rendered as the appropriately conditioned allophone of PAL /b/. Thus, the examples below require no special explanation:

(7)	Loan Words		PAL		
Jp.	bunpō denpō hinpyōkai kenpei senpūki nappa bara bengoshi bun	grammar telegram exhibition, fair military policeman electric fan [dialect] greens rose lawyer minute, part	búmbo démbo himbiókai kembéi sembukí náppa bára bengngós bung	police (long)	cabbage
	ashiba dobu kyabu ¹³	scaffolding ditch carburetor	chásiba dóbu kiáb		1.

In Jp. the phoneme /h/ has three allophones, distributed as follows: before u in the syllable /hu/ (written as fu in the Romanisation used here), /h/ is pronounced as a voiceless bilabial fricative $[\Phi]$; before i in the syllable /hi/ and before y in /hya, hyu, hyo/, it is pronounced as a voiceless palatal or prevelar fricative $[\Bar{c}]$ similar to the fricative in standard Ger. ich I); and before other vowels in the syllables /ha, he, ho/, it is a glottal fricative similar to Eng. /h/. Although there is one rare example — PAL kangngob ($^{<}$ Jp. kangofu nurse) — in which an allophone of Jp. /h/ has become an allophone of PAL /b/, the allophones of Jp. /h/ are normally borrowed into PAL as a new phoneme /h/ with a single allophone, the (voiceless) glottal fricative [h]. The following PAL loanwords containing /h/ ([h]) are subclassified according to the original Jp. syllable containing the /h/:

(8)

	Loan S	Source	PAL	
ha [ha]	haizara hanafuda hashi hantai harau	ashtray Jp. card game chopsticks opposite pay (for)	haisára hanahúda hási hantái haráu	
hi [çi]	hinpy <mark>o</mark> kai himitsu kohi	exhibition, fair secret coffee	himbiókai hímits kohí	
fu [Φu]	ifukuro furansu fūsen fūtō futsū mafurā	paunch of stomach France balloon envelope common, usual muffler, scarf	chihúkuro huráns huséng húto hútsu mahurá	
he [he]	henji	answer, reply	henzí	
ho [ho]	hokori hon hontō mahōbin mihon	dust book main island thermos bottle sample	hokorí hong hónto mahóbing míhong	Babeldaob

Until the large influx of Jp. vocabulary, /h/ was not really well established as a phoneme of PAL. During the Sp. period, a few words had been borrowed in which Sp. (orthographic) g or j, both pronounced as the voiceless velar fricative [x], were rendered in PAL as [x] or [h]. These two phones are in free variation even today in such words as the following: 16

(9)		Loan	Source	PAL		
	Sp.	Virgen angél Jesús cajón	Virgin angel Jesus box, chest	birhén changhél Hesús káhol	wooden box,	coffin

Once /h/ was established as a PAL phoneme after the introduction of many Jp. lexical items, the way was paved for assimilating certain Eng. loanwords containing this sound. Thus, in the words below, Eng. /h/ becomes PAL /h/:

(10)	Eng.	helmet	hermét
		home run	homráng
		hose	hos
		hotel	hotér

In a few cases, however, the Eng. /h/ is lost, as in

(11)	Eng.	hinge	íings
		hospital	osbitár
		horse	uós

2.1.2.

PAL has two contrasting dental stops, voiceless /t/ and voiced /d/. The phoneme /t/ has two allophones: word-finally, an aspirated variant [th] occurs, while in all other environments (i.e. word-initially and word-internally) the unaspirated variant [t] is found (compare chat [?ath] smoke with tang [tan] one). The allophonic variation of /d/ is somewhat more complex, however. Word-initially before a vowel, /d/ is pronounced as either of the voiced allophones [d] or [ð], with the former more likely to occur in rapid, casual speech. Thus, two possible pronunciations are heard for words such as dub [dup, ðup] dynamite and deb [dep, ðep] sugar cane. Word-initially before a consonant, the pronunciation of /d/ varies between the voiceless allophones [t] and [θ], with [t] appearing before /b/ and /m/ (e.g. dbak [tbakh] my dynamite) and [θ] occurring before /k/ and /ng/ (e.g. dngod [θ noð] tattoo needle). Intervocalically and word-finally, /d/ is normally realised as the voiced allophone [ð] (e.g. medak [meðakh] my eye, bad [bað] stone). In final position, /d/ sometimes begins as [ð] and trails off into the voiceless variant [θ].

Dental or alveolar stops from Sp., Ger., Jp., and Eng. are simply borrowed into PAL as the appropriately conditioned variants of /t/ or /d/, and in a few loanwords from Jp. geminate t is also permitted. Note the examples below, which all conform to this principle:

((12)		Loan Sou	rce	PAL	
		Sp.	adiós ¹⁷ diablo sandía soldado	good-bye devil type of watermelon soldier	adiós diablóng sangdiáng soldáu ¹⁸	[aðiós] [diablóŋ, ðiablóŋ] [sanðiáŋ] [solðáw]
		Ger.	Turm Post Rad [rat] ¹⁹ Schwester	tower post office bicycle nun, sister	turm bost rrat suester	[turm] <i>steeple</i> [bost ^h] [r̃ath] [swɛstɛ́r]
		Jp.	tane ten tosen	seed grade, point ferry boat	táne teng toséng	[táne] [teŋ] [toséŋ]
			bento amatte iru	box lunch (be) left over, plenty	bénto chamattér	[bénto] [?amat:ér]
			dai doisu bakudan	platform Germany bomb	dái Dóis bakudáng	[dái, ðái] [dóis, ðóis] [baguðáŋ]
		Eng.	bucket court store time dance bid		báket kort stoáng táem dangs bid	[bágɛtʰ] [kortʰ] [stoáŋ] [táɛm] [dans, ðans] [bið] auction, bidding
			(re)bound		bangd	[banð]

A small, but significant, number of exceptions appear among Eng. loanwords, most of which involve reinterpretation of Eng. word-final (or, less frequently, word-initial) /d/ [d] as PAL /t/. Thus, we find PAL bet [bɛth] (< Eng. bed), kat [kath] (< Eng. (playing) card), kolt [kolth] (< Eng. gold), rot [roth] (< Eng. rod), and toktáng [toktán] (< Eng. doctor). Two other unusual examples

include PAL bos (< Eng. boat), in which a final stop has been rendered as a fricative, and ballas (< Eng. ballast), in which the word-final consonant cluster has been simplified. Interestingly enough, there are no attested examples of Eng. loanwords containing orthographic th ([θ] or [δ]), so it is not known how these phones would be interpreted in PAL.

2.1.3.

PAL has only one indigenous fricative phoneme, the alveolar spirant /s/, with a single allophone [s]. There is no voiced counterpart /z/, and no palatal fricatives such as /s/ or /z/. The total absence of palatal articulations in PAL results in several interesting distortions when PAL adopts Sp., Ger., Jp., or Eng. words containing the palatal fricative [s/s] or the palatal affricates [s/s] and [s/s].

To take the simpler cases first, loanwords containing [s] pose no problem when borrowed, as the [s] merely becomes PAL /s/ (with geminate /s/ also being accepted from Jp.). Several representative examples are given below:

(13)	Loan S		Source PAL			
	Sp.	Dios cruz ²⁰ gracia ²¹ santo	God cross grace saint		diós kerús krásia sángto	
	Ger. Fenster		window béng		béngster	
	Jp.	sao sensei sumi buss o ge	pole, rod teacher charcoal hibiscus		saó sénsei súmi bussónge	fishing pole
	Eng.	school sauce police			skúul sos bulís	

When Jp. words containing the syllables za, zu, ze, and zo are borrowed into PAL, the syllable-initial z — pronounced in Jp. either as the voiced fricative [z] or the voiced affricate [z] (= [dz]) — is normally devoiced to PAL /s/[s]. This change, which is resisted by many speakers of the older generation with a knowledge of Jp., is illustrated in the examples below:

(14)		Loan	Source	PAL
	Jp.	zuga zubon zurui zōri zeitaku haizara kanzume kizu	drawing, picture pants, trousers sly, foxy rubber thongs luxurious ashtray canned goods injury, scar	sungá subóng surúi sóri séitak haisára kansumé kísu

A small number of Eng. borrowings with /z/[z] also exhibit devoicing to PAL /s/[s]-e.g. PAL bresengt (< Eng. present), PAL hos (< Eng. hose), and PAL kiis key (< Eng. keys).²²

Because PAL lacks any palatal fricatives such as $/\S/$ or $/\S/$, the nearest equivalent — namely, $/\S/$ [\S] — is substituted for the [\S] of contributing languages. In Ger. and Eng. $/\S/$ is a separate phoneme whose major allophone [\S] is pronounced with concomitant lip rounding. Note the examples below:

(15)	Ger.	Schrank Schraube Schlips Maschine		cupboard, screw necktie machine	shelf	serángk ²³ seráub slibs mesíl
	Eng.	shovel sheep bishop Marshall	(Islands)			sébel sib bisób Marsiál

In Jp., [§] is not an independent phoneme but actually an allophone of /s/ that occurs before the high front vowel /i/ and the palatal glide /y/. This sound, which is not accompanied by lip rounding and is somewhat tenser, higher, and further back than its Eng. counterpart, is found in the Jp. syllables shi, sha, shu, and sho (phonemically /si/, /sya/, /syu/, and /syo/, respectively). It is adopted into PAL as /s/[s], as the following examples illustrate:

(16)		Loa	PAL	
	Jp.	shashin shina shobai shukan shiken basho haisha mushiba	photo China business custom, habit test, exam place, locality dentist cavity	siasíng Sína sióbai siúkang skeng ²⁴ básio háisia musibá

PAL has adopted a considerable number of loanwords from Jp. containing the affricates [č] and [j]. These affricates (voiceless and voiced, respectively) are articulated in Jp. as dental stops released into palatal fricatives (therefore, they might be more accurately characterised by the phonetic symbolisations [$\{\hat{x}\}$] and $[d\hat{z}]$). These sounds occur in Jp. in the same environments as $[\hat{s}]$ namely, before the high front vowel /i/ and the palatal glide /y/ - and represent allophones, respectively, of t/ and z/. These allophones are found in the syllables chi, cha, chu, cho (phonemically /ti/, /tya/, /tyu/, /tyo/) and in the syllables ji, ja, ju, jo (usually analysed phonemically as /zi/, /zya/, /zyu/, /zyo/). The Jp. affricates [č] and [j] have had an overt influence on the PAL phonological system, since they have been reinterpreted as the PAL affricates [c] and [z], which are not native to the language. It is only in loanwords from Jp. (and Eng.) that we hear PAL [c] and [z], which are affricates consisting of a dental stop released into an alveolar fricative, perhaps more accurately represented as [\hat{t} s] and [\hat{d} z]. When we compare the original Jp. [\hat{t} s] and [\hat{d} z] with their PAL counterparts [ts] and [dz], we notice two important facts. First, the fricative portion of the affricate (a palatal articulation in Jp.) becomes an alveolar fricative in PAL, a natural distortion considering the fact that PAL has no palatal fricatives but only the alveolar fricative /s/[s]. Second, the development of PAL [f2], while filling a gap in the pattern, introduces

the voiced affricate articulation [z] into the PAL phonological system as part of the affricate $[d\bar{z}]$. In the examples of (17) below, we find cases of Jp. $[t\bar{s}]$ (Romanised ch) = PAL $[t\bar{s}]$ (orthographic ts), and in the examples of (18), there are instances of Jp. $[d\bar{z}]$ (Romanised j) = PAL $[d\bar{z}]$ (orthographic z):

(17)		Loan Sou	irce	PAL	
	Jp.	choshi chubu chui (suru) bakuchi ochiru denchi kimochi machi kechi	condition, state (inner) tube be careful gambling fall, fail (exam) battery feeling town, city stingy appendix	tsiás tsiúb(u) tsiuí bakutsí otsír dénts(i) kimóts máts(i) kets mótsio	capital, main town appendicitis
(18)		jakki jū neji aji benjo daijobu	(car) jack gun, rifle screw taste, flavour toilet all right, OK	ziákki ziú nézi cházi bénzio daiziób	

In (17) above, we have seen examples in which Jp. ch ([ts]) is rendered as PAL ts ([ts]). In addition, the Jp. affricate ts [ts] (an allophone of the phoneme /t/ that occurs only before the high back vowel u), also gets adopted into PAL as ts. This straightforward correspondence is illustrated in the examples below:

(19)	Loan Source	2	PAL
Jp.	tsubame tsunami himitsu katsuo nimotsu dokuritsu (suru) utsusu	barn swallow tidal wave secret bonito baggage become independent take (photo of)	tsubáme tsunámi hímits kátsuo nímots dokuríts independent chuts(i)ús ²⁵

Looking at loanwords from Eng., we observe that Eng. ch [ts] as well as the consonant cluster ts is borrowed into PAL as ts [ts]. Eng. ts corresponds to PAL ts in several cases where the plural of an Eng. noun ending in t has been reinterpreted as a PAL singular (cf. fns. 7 and 22) — e.g. PAL chauts (< Eng. outs (in baseball)) and PAL donats (< Eng. doughnuts). Eng. ch becomes PAL ts in items such as tsésa (< Eng. (beer) chaser), tsiokkolét (< Eng. chocolate), and tsuingám (< Eng. chewing gum). 26

In this complex area of PAL loanword phonology, there are bound to be some exceptions or irregularities. The small, but significant, number of these all involve cases in which [ts] or [dz] of the contributing language is rendered as the PAL fricative /s/[s] rather than the expected innovating affricate ts [ts] or [dz]. This simplification is observed in words such as PAL kusaráng (< Sp. cuchara spoon), PAL suklatéi cocoa tree (< Sp. chocolate chocolate), PAL sidósia (< Jp. jidōsha auto), PAL sikáng (< Jp. jikan hour), PAL íngs (< Eng. inch or hinge), z^{2} and PAL masés (singular) (< Eng. matches).

2.1.4.

PAL has two *velar* consonant phonemes, the stop /k/ and the nasal /ŋ/. The phoneme /k/ has three major allophones, distributed as follows: in word-final position, the aspirated allophone [kh] occurs²8 (e.g. brak [prakh] taro, derúmk [ðərúmkh] thunder); intervocalically, /k/ is realised as the voiced stop [g] (e.g. rekás [rəgás] mosquito, mekeáld [məgɛálð] hot); and elsewhere (i.e. word-initially or word-medially adjacent to another consonant) /k/ has the unaspirated allophone [k] (e.g. kar [kar] medicine, skors [skors] cane. When [k] and [g] are contained in loanwords from Sp., Ger., Jp., and Eng., these sounds are simply converted into the appropriately conditioned allophones of PAL /k/. Thus, the examples below require no further explanation:

20)		Loan	Source	PAL
	Sp.	carro católico Pascua manteca gracia iglesia	pushcart, waggon Catholic Easter lard grace church	karróng katolík baskuá mangtekáng krásia ikelésia
	Ger.	Kapitän Mark Schrank Gummi	captain mark (monetary unit) cupboard, shelf rubber	kabitéi mak serángk kúmi
	Jp.	kai kakine garasu ginko gomen	shell fence glass bank pardon me	kái kákine karás kíngko koméng
	Eng.	clock cake tank guitar glove bucket		klok kéik tangk kitá kurób báket

The velar nasal phoneme /ŋ/ (orthographic ng) has two major allophones — [n] and [n] — whose distribution is by and large determined by a principle of assimilation. Before the dental stops /t/ and /d/, the alveolar fricative /s/, and the liquid /r/, the more forward dental variant [n] is used; this allophone is spelled ng in all native PAL words — e.g. iungs [yuns] island, merangd [merano] (type of) coral. Phonemic /n/ [n] is totally lacking in native PAL vocabulary as the consequence of a very early sound change in which proto-Austronesian /*n/ and /*n/ became /1/ in various positions except that before /t/, /d/, etc., thus relegating [n] to the status of an allophone of /ŋ/. The resulting resistance to [n] in prevocalic or word-final position was at least partially viable through the Ger. times, as attested from the following borrowings from Sp. and Ger. in which the [n] of the contributing language was taken into PAL as [1]:

(21)		Loan So	ource	PAL		
	Sp.	cajón cañón campana Marianas	box, chest cannon bell Marianas (Islands)	káhol kaliól ²⁹ kambaláng ³⁰ Marialás	wooden box,	coffin
	Ger.	Maschine Grammophon	machine phonograph	mesíl karmoból		

However, we also find examples of Sp. borrowings containing prevocalic [n] in which the [n] was retained in PAL, thus indicating the beginning of a trend to accept this sound in a wider number of environments. Such examples (in which PAL orthographic n is used rather than ng) include keristiáno (< Sp. cristiano Christian), komunión (< Sp. comunión Holy Communión), and koróna (< Sp. corona crown). With the large influx of Jp. vocabulary, prevocalic [n] gradually became established as a possible PAL articulation, and this situation has by and large continued through the present period of Eng. borrowings. In the list below, representative examples are taken from Jp. and Eng. in which prevocalic [n] is adopted without change into PAL:

(22)		PAL		
	Jp.	nasu nikibi negi nori okane tane abunai	eggplant pimple, acne green onion glue, paste, starch money seed dangerous	nas níkibi néngi nóri okáne táne chabunái
	Eng.	navy nurse gardenia		néibi nurs kadénia

In borrowed words containing [n] before dentals or alveolars, PAL simply uses the [n] allophone of $/\eta/$. By convention, this [n] is spelled ng in borrowings from Sp., Ger., and Eng., but spelled only as n in loanwords from Jp. These potentially confusing orthographic conventions are to be kept in mind when examining the lists below:

(23)		Loan	Source	PAL	
	Sp.	bandera manta santo	flag, banner black cloth saint (m.)	bangderáng mangtáng sángto	woollen blanket, cotton
	Ger.	Fenster auswendig	window by heart	béngster chausbéngdik	memorise
	Eng.	pound dance inch, hind ground Sunday	ge	bongd dangs íings kurángd sángdei	playground Sunday, week
(24)	Jp.	bentō denchi	box lunch battery	bénto dénts(i)	

ensoku picnic,outing ensók mondai problem móndai ninjin carrot nínzin

njin carrot ninzin type of sweet potato

taken, brought

The second allophone of $/\eta/$ — namely, $[\eta]$ — is used in native PAL words in all positions where the allophone $[\eta]$ is excluded. In other words, $[\eta]$ is of much wider distribution than $[\eta]$ because it occurs prevocalically (both in word-initial and medial positions), word-finally, and before the velar stop /k/, the glottal stop /2/, and the liquid /1/. Some examples of the $[\eta]$ allophone of $/\eta/$ in native words are given below:

(25) prevocalically: fire ngau mouth ngor put oil on mengilt steering wheel, rudder ongéu flower word-finally: bung heart, spirit reng ding ear my name before /k/, /?/, /1/: ngklek omengkangk lay on ground Ngchésar village in E. Babeldaob dance nglóik

nglái

(26)

In PAL words of foreign origin, the sound $[\eta]$ (always spelled ng) appears from several sources. First of all, in Ger., Jp., and Eng., $[\eta]$ is probably best analysed not as an independent phoneme, but rather as an allophone of /n/ before velar consonants. Since the combination velar nasal $[\eta]$ + velar stop is natural in PAL (cf. 25 above), it is borrowed without modification, as the examples below indicate:

	Loan So	ource	PAL		
Ger.	schenken	send	sengk	gift on child's first birthday	
	Schrank	cupboard, shelf	serángk		
Jp.	denki hankachi hōsenka kankei kankōdan katorisenko	electricity handkerchief garden balsam relationship tourist group mosquito coil	déngki hangkáts hoséngka kángkei kangkódang katoriséngko	tourist	
Eng.	bank monkey (card sunglasses soft-drink tank trunk	game)	bangk mongkii sangklás ³² sobdringk tangk torángk		

In a large number of PAL loanword items, $[\eta]$ occurs word-finally. One of the major sources of this $[\eta]$ is a word-final $[\eta]$ in the contributing language. Thus, Jp. word-final n (phonetically a nasalised version of the preceding vowel and, for many speakers, somewhat velarised) is invariably taken into PAL as $[\eta]$, as the examples below indicate:

(27)

Loan Source PAL Jp. barikan hair clippers barikáng byōin hospital bioing botan button botáng bun minute, part bung radish daikon dáikong yōchien *kindergarten* iotsiéng sen line, wire seng udon noodles udóng

The same phenomenon is observed in Eng. borrowings, where word-final Eng. [n] is pronounced in PAL as [n]:

(28) Eng. piston
aspirin
drum (can)
home run
curtain
sign
bistóng
chasberíng
deromukáng water drum
homráng
katéng
saíng

A second major source of word-final $[\eta]$ in loanwords is clearly due to excrescence. In most native PAL words, an excrescent word-final $[\eta]$ appears after the vowels a, o, and u when the word in question appears in isolation (e.g. when being cited), in sentence-final position, or sentence-internally before a major pause. To take a typical example, the PAL intransitive verb mong go has no excrescent $[\eta]$ within a sentence, as in (29a), but does take this $[\eta]$ sentence-finally, as in (29b):

(29) a. Ng mo er a skuul He's going to school. b. Ng mong. He's going.

A good number of Sp. words ending in a and o take an excrescent word-final $[\eta]$ in PAL. When the word in question is used sentence-internally (not before a pause), the $[\eta]$ is normally lost. Some representative examples include the following:

(30)

Sp.	bandera	flag, banner	bangderáng
	plato	dish, plate	belatóng
	botella	bottle	butiliáng
	diablo	devil	diablóng
	martillo	hammer	martilióng
	Misa	Mass	Misáng

Interestingly enough, many loanwords from Jp. end in the vowels a, o, and u, but virtually none of them exhibit excrescent $[\eta]$. Why Jp. borrowings should have been resistant to this phenomenon is quite mysterious, especially because many Eng. borrowings, which were of course chronologically later, were clearly susceptible to it. In the majority of Eng. loanwords below, note the loss of word-final Eng. [r] and its replacement in PAL by the vowel [a] followed by an excrescent $[\eta]$:

(31)	Eng.	verandah	berangdáng
		beer	biáng
		flour	blauáng
		master	mastáng
		store	stoáng
		doctor	tóktang
		number	lámbang

A few exceptions to this pattern exist — e.g. PAL botéto (\leq Eng. potato), PAL kitá (\leq Eng. guitar), and PAL tsésa (\leq Eng. (beer) chaser).

In certain dialects of Jp. such as Tokyo standard, the voiced velar stop /g/ is pronounced between voiced sounds as a nsasl ([n]). Since the standard dialect was used by government officials and taught in the Palau schools during the Jp. period, it is not surprising that most Jp. words with intervocalic /g/[n] were borrowed into PAL with [n]. Some typical examples are listed here:

(32)		Loan	Source	PAL
	Jp.	agaru dogu yanagi maegami	rise, increase tool willow bangs	changár dóngu ianángi maingami
		maguro saigo tamago	tuna last time egg	manguró sáingo tamángo

In the standard dialect of Jp., when a syllable ending in n is followed by a syllable beginning with g, the resulting sound is something like a long velar nasal — e.g. bango [baã 0 no:] member. A similar long velar nasal is pronounced in the corresponding PAL loanword and is represented by the orthographic sequence ngng:

(33)	Jp.	bang o	number	bángngo
		bengoshi	lawyer	bengngós
		kangofu	nurse	kangngób
		ringo	apple	ringngo
		songai	(financial) loss	sóngngai

2.1.5.

The PAL glottal stop phoneme /?/ (orthographic ch) has no allophonic variation, and is pronounced [?] in all positions (word-initial, word-internal, and word-final) — e.g. charm animal, chisél news of him, mechéd shallow, dechór standing, táoch mangrove channel, and buuch betel nut. None of the languages contributing loanwords to PAL has phonemic glottal stop, although in Jp. vowel-initial words are normally pronounced with an excrescent prevocalic glottal stop both in isolation and within sentences. The same phenomenon tends to occur in Eng., especially when vowel-initial items are uttered in isolation. Most Jp. and Eng. loanwords in this category have been borrowed into PAL with word-initial glottal stop, as the following sampling of vocabulary indicates:

(34)

	Loan	Source	PAL	
Jp.	aburasashi abunai eisei imi oto uri usui	oil can dangerous sanitation meaning noise, sound melon, cucumber (liquid) weak	chaburasási chabunái chéisei chími chóto chúri chusúi	muskmelon
Eng.	<pre>ambulance air (for tyre, etc.) ice okra</pre>		chambelángs chéa cháis chókura	

There are, of course, cases in which the PAL form lacks the initial glottal stop — e.g. PAL ensók ($^{<}$ Jp. ensoku picnic, outing), PAL okáne ($^{<}$ Jp. okane money), PAL usángi ($^{<}$ Jp. usagi rabbit), PAL obís ($^{<}$ Eng. office), and PAL osbitár ($^{<}$ Eng. hospital).

The Jp. syllables wa, ya, yu, and yo, which begin with glides, are adopted into PAL as two separate syllables — that is, w and y become full vowels. When PAL word-initial u or i has developed from this source, there is no word-initial glottal stop. Several representative examples are PAL uáta (< Jp. wata cotton), PAL uatasibúne (< Jp. watashibune $ferry\ boat$), PAL iákiu (< Jp. yakyū baseball), PAL iásai (< Jp. yasai vegetables), PAL iaksók (< Jp. yakusoku promise), and PAL iótei (< Jp. yotei plan, schedule).

2.1.6.

Palauan has two liquids with phonemic status — /|/ and /r/. The phoneme /|/ is a lateral articulation similar to Eng. /|/: it shows no allophonic variation and can occur 'long' ([1:] = phonemic /||/ and orthographic |||). The phoneme /r/ is a flap r [r] very similar to Jp. /r/, and when two r's occur phonemically in sequence (/rr/ = orthographic rr) the result is a trilled r, not unlike Sp. [\tilde{r}] but often pronounced with considerable friction. In spite of the fact that PAL has both /|/ and /r/ in contrast (e.g. lisel its coconut tree vs. risel its root), these phonemes are often interchanged in loanwords, as we will see below. The instability of an absolutely clearcut contrast between /|/ and /r/ is evidenced not only by such loanwords but also by certain native pairs of free variants (e.g. merrédel — merréder leader and ikr — ikl outside) exhibiting an interchange of these sounds. While there are a few examples in which r of the contributing language is taken into PAL as |, in the great majority of cases non-indigenous | is adopted as PAL r: 35

(35)

Sp.		lantern salt	barór		
	,	sugar	sar sukál ³⁶		
Ger.		blackboard paper, document	tabér babiér — babilngél ³⁷	paper, book	letter,

Eng.	valve	barb	
	belt	bert	fan belt
	ball (in baseball)	bor	
	helmet	hermét	
	hospital	osbitár	
	hotel	hotér	
	keel	kir ³⁸	
	glove	kurób	

Interestingly enough, when words are borrowed from Jp., which has only /r/ and no /l/, there is never any distortion: all Jp. /r/ [r] become PAL /r/ - e.g. PAL chiro (< Jp. iro colour).

Even though PAL has word-final r and r before other consonants (e.g. ngor mouth, skors cane, dart one hundred), when r occurs in these positions in loanwords, it is often lost. Thus, Ger. Mark mark (monetary unit) becomes PAL mak fifty cents, and r is lost word-finally in the Eng. words of (31) and before a consonant in the following additional items:

(36)		Loan Sour	ce	PAL		
E	1	carcinoma card market horse		kasinóma kat makít uós	cancer playing	cards

It is not known to what extent, if any, exposure to Eng. r-less dialects might have influenced the pronunciation of the PAL words in (31) and (36).

The phoneme sequences /11/ and /rr/ in loanwords also reveal some distortions. Thus, Sp. barril barrel shows a lengthening of the l in PAL barrill, and while this very same word and karrong (< Sp. carro pushcart, wagon) show a correspondence between PAL /rr/ [\tilde{r}] and Sp. / \tilde{r} /, in loanwords rrat (< Ger. Rad bicycle) and rrom liquor (< Eng. rum) we find an idiosyncratic doubling of the r.

2.2. PAL vowels and their use in loanwords

The following chart presents the six vowels of PAL classified in terms of tongue height and relative tongue advancement:

hart of PAL	vowels					
Tongue Advancement						
front	central	back				
i		u				
ε	ə a	0				
	front	front central i ɛ ə	Tongue Advancement front central back i u			

Figure 2

There are five full vowels in PAL -/i/, /u/, $/\epsilon/$ (orthographic e), /o/, and /a/ — which occur in stressed or unstressed syllables. In addition, there is one reduced vowel -[a] (also orthographic e) — whose occurrence is restricted to unstressed syllables (very much like Eng. [a] schwa). Vowels in loanwords are taken into PAL according to the following general principle: full vowels in the contributing language are normally pronounced as the PAL vowel closest to them in articulation unless they happen to fall in an unstressed syllable of the PAL word, in which case they are sometimes pronounced as [a].

2.2.1.

(37)		Loan	Source	PAL		
S	p.	botella cebollas chocolate	onions		(o>u, e>i) onion (o>u) cocoa tree (o>u)

In addition, full vowels in several Sp. words are reduced to $[\vartheta]$ in an unstressed syllable of the PAL form — e.g. PAL kelebús $[k\vartheta]$ (\langle Sp. calabozo jail, prison) and PAL sebadóng $[s\vartheta$ baðón] (\langle Sp. sábado Saturday). By contrast, the full vowels of Jp. loanwords are never reduced to $[\vartheta]$ even when they occur unstressed in the corresponding PAL form, as many previous examples will attest.

The Eng. vocalic system is very rich, with a relatively large number of single vowels (e.g. in the author's dialect, [I, i, U, u, ϵ , e, \mathfrak{I} , o, \mathfrak{I} , and several diphthongs ([aw, ay, \mathfrak{I})). When the Eng. vocalic system is 'translated' into PAL, numerous changes and distortions occur, and we find quite a significant number of exceptions and irregularities. The major modifications to be discussed below all involve cases in which a vowel of Eng. (e.g. [\mathfrak{X} , \mathfrak{I} , \mathfrak{I}) has no direct PAL equivalent and is therefore rendered as a PAL vowel contiguous to it in terms of articulation.

The Eng. low front vowel [x] is almost always borrowed as PAL low central [a], as the list below illustrates:

(38)	Loan Source			PAL
	[æ] [a]	>	band valve dance stamp	bangd barb dangs stamb

Only in one unusual case is Eng. [x] taken into PAL as $[\epsilon]$ — i.e. PAL bek (< Eng. bag).

(39)		Loan Source				
	Eng. PAL	[^] [a]	>	bucket doughnuts club	báket dónats klab	
	Eng. PAL	[^]	>	pump cup rum	bomb kob rrom	

The Eng. lower mid back vowel [3] is borrowed as the PAL mid back vowel [0], as shown below:

(40)	Loan Source				PAL
				ball	bor
	PAL	[o]		sauce	sos

Eng. has several pairs of contrasting lax vs. tense vowels — i.e. [I] vs. [i], [U] vs. [u], and [ϵ] vs. [e]. Since PAL has only one vowel corresponding to each of these pairs, the Eng. lax vs. tense contrast is neutralised in loanwords, as the following data illustrate:

(41)	[I, i] > [i] (tense)	bid piston sheep keel		bid bistóng sib kil
	[U, u] > [u] (tense)	puss pool room	[pul]	bus bul rum
	[ε, e] > [ε] (lax)	save	[ténIs]	bet tenís seb tsésa

In addition to the above, some Eng. tense vowels become long vowels or diphthongs in PAL — e.g. PAL kiis [ki:s] (< Eng. keys), PAL skuul [sku:l] (< Eng. school), PAL teib [tsyp] (< Eng. tape), and PAL keik [ksykh] (< Eng. cake). Furthermore, some full vowels or diphthongs of Eng. are reduced to PAL [a] in unstressed syllables — e.g. PAL chambelangs [?ambalans] (< Eng. ambulance) and PAL chasbering [?asbarin] (< Eng. aspirin).

The Eng. diphtnongs [aw] and [ay] are adopted into PAL with much irregularity. In some cases, Eng. [aw] remains a diphthong in PAL (e.g. PAL sausab [sawsap] (< Eng. soursop)), while in others it becomes the single vowel a (e.g. PAL kurangd (< Eng. ground)) or the single vowel o (e.g. PAL bongd (< Eng. pound)). Eng. [ay] is either pronounced as a similar diphthong in PAL (e.g. PAL chais [?ays] (< Eng. ice)) or as the diphthong [as] (e.g. PAL baeb [basp] (< Eng. pipe)).

Some of the more unusual PAL renditions of Eng. vowels are undoubtedly due to spelling pronunciations. Thus, in words like the following, the PAL vowel corresponds to the Eng. orthographic vowel rather than to the actual Eng. phonetic vowel:

(42)		Loan Source	PAL
	Eng.	pocket	bokkét
	-	bishop	bisób
		altar	chaltár
		deacon	díakon
		clock	klok
		compass	kómbas

2.2.2.

In a small number of loanwords from Sp., Ger., and Eng., the PAL form shows an excrescent [ə] between the two consonants that form a cluster in the contributing language. Since kr, sr, and dr are not possible as word-initial consonant clusters in PAL, it is natural that a [ə] would be inserted in the PAL form to obviate an unpronounceable sequence. Thus, cr- initials from Sp. are rendered in PAL as kər- (e.g. PAL keristiáno (< Sp. cristiano *Christian*) and PAL kerús (< Sp. cruz *cross*), and schr- [šr] initials from Ger. become PAL sər- (e.g. PAL serángk (< Ger. Schrank *cupboard*, shelf*) and PAL seráub (< Ger. Schraube *screw*); in addition, Eng. drum (can) becomes PAL deromukáng. An excrescent [ə] may appear as well, however, between the consonants of clusters that are themselves acceptable in native PAL words — e.g. kl, sb, and br. This unpredictable and sporadic phenomenon is observed in such examples as PAL ikelésia (< Sp. iglesia *church*), PAL Sebangiól *Spain* (< Sp. español *Spanish*), and PAL beríb (< Ger. Brief *letter*).

2.2.3.

In Jp. the high vowels i and u are characteristically devoiced between voiceless consonants and in word-final position after a voiceless consonant. Since such voiceless vowels have a very low audibility, it is not surprising that they are very often omitted in PAL loanwords. In the words of (43) below, the omitted voiceless vowel of Jp. is interconsonantal, in the examples of (44) it is word-final, and in (45) it occurs in both positions:

(43)		Loan	Source	PAL	
•	Jp.	bokusō kuse rekishi shitagi shiken	grass, pasture habit history underwear test, exam	boksó kse réksi stángi skeng	elephant grass
		hik <mark>o</mark> ki tsukemono	aeroplane pickles	skóki ⁴² (t)skemóno ⁴³	

(44)	bengoshi	lawyer	bengngós
	doisu	Germany	Dóis
	doku	poison	dok
	hachi	bee	hats
	himitsu	secret	hímits
	kangofu	nurse	kangngób
	keikaku	plan	kéikak
	shokuminchi	colony, settlement	siokumíns ⁴⁴
(45)	mokuteki	purpose	mokték
	shikaku	square	skak
	yakusoku	promise	iaksók

In most PAL loanwords from Jp., the high back vowel u is deleted after r; u is also deleted sporadically after certain other voiced consonants. Examples of this phenomenon are illustrated below:

(46)	Loan	Source	PAL	
J	p. taoru sarumechīru amatte iru kiite iru kotowaru tebukuro daijōbu	towel (Jp. brand name) left over, plenty effective refuse glove all right, OK	táor sarmetsír chamattér kitér kotouár teb(u)kuró daiziób	liniment

2.2.4.

Of the five full vowels of PAL, four can occur long (orthographically, ee, ii, oo, and uu). Phonetically, these long vowels are not only greater in length than the corresponding single vowels but also are followed by a slight gliding articulation, at least for many speakers. Native words containing long vowels include kméed [kmɛ:ð] near, diil [ði:l] abdomen, dekóol [ðəgó:l] cigarette, and buuch [bu:?] betel nut. 5 As we observed in 2.2.l. above, some PAL loanwords from Eng. contain long vowels as renderings of Eng. tense vowels — to repeat one example, PAL kíis [ki:s] (< Eng. keys). Given the fact that PAL has long vowels both in the native phonology and in Eng. loanword phonology, it is very surprising that there has been a total resistance to borrowing long vowels from Jp. Thus, even though Jp. has long equivalents for all five vowels (Romanised as \overline{a} , \overline{b} , \overline{b} , and \overline{b}), there is not a single case in which PAL has not shortened a corresponding Jp. long vowel. A few of the numerous examples of this across—the—board, yet puzzling, phenomenon are provided below:

(47)	Jp.	sarumechīru kōhī kyūri senpūki	(Jp. brand name) coffee cucumber electric fan	sarmetsír kohí kiúri sembukí	liniment
		raji <u>e</u> tā kosui	electric jan radiator perfume	raziéta kosúi	

PAL LOANWORD MORPHOLOGY

The PAL morphological system has been surprisingly flexible in the extent to which it has allowed loanwords to be integrated, as illustrated by the fact that many borrowed noun and verb stems participate in characteristic native inflectional and derivational patterns. In addition, lexical items from diverse grammatical classes in the contributing languages have been readily borrowed into PAL as members of the several major native parts of speech, often accompanied by interesting shifts of meaning.

3.1. Change of part-of-speech affiliation during borrowing

In the majority of cases, as we would expect, PAL has borrowed a foreign lexical item as a member of the indigenous grammatical class that most closely corresponds to the original class membership in the contributing language. Thus, most borrowings that are nouns in Sp., Ger., Jp., and Eng. also function as nouns in PAL. To take only one typical example, the loanword sense: teacher, a noun in Jp., also is used as a noun in PAL and can occur in three basic nominal positions — i.e. as sentence subject, sentence object, and after the preposition er of, to, etc. Each of these is illustrated in the sentences below:

(48) a. A sensei a ungil. The teacher is good.

b. Ak milsa a sensei. I saw the teacher.

c. Tia a hong er a sensei. This is the teacher's book (= book of the teacher).

3.1.1.

Whereas most non-indigenous nouns are borrowed as PAL nouns, a significant number are also adopted into PAL as state verbs. As opposed to action verbs, which designate actions, activities, or events that involve an active participant, PAL state verbs describe states, qualities, or conditions that temporarily or permanently characterise persons or things. Syntactically, action verbs can be distinguished from state verbs in terms of the pattern of past tense formation: action verbs use an infix -il- (e.g. mengaus weave — milengaus was weaving), while state verbs use the auxiliary mle was, were (e.g. ungil good — mle ungil was good). PAL state verbs normally correspond to Eng. adjectives (and, as we will see below, to various classes of modifying words in Jp.), but not always: thus, for instance, the PAL state verb medengei know (cf. past mle medengei know) has an Eng. verb (know) as its nearest equivalent.

Most of the cases in which a foreign noun is borrowed into PAL as a state verb come from Jp. Because the part-of-speech affiliation is changed, the meaning of the lexical item is also modified, but in a fairly consistent manner: thus, as the glosses for the PAL state verbs in (49) below indicate, the PAL meaning is something like 'characterised by/similar in appearance to [the referent of the original Jp. noun]'.

(49)		Jp. Noun	PAL State Verb	
	baikin	bacillus, bacterium, germ	baiking	unsanitary, unhygienic
	bozu	Buddhist priest, monk, shaven head	bózu	(head) completely shaved
	asebo ⁴⁷	prickly heat, heat rash	chásebo	broken out in prickly heat
	aji	taste, flavour	cházi	tasty
	haibyō	lung disease, TB	háibio	sick with TB
	hanbun	half	hámbung	half-witted, simple-minded
	kama	sickle, hook	kámang	(arm) twisted/crippled
	jiman	pride, vanity	simáng	vain, boastful
	tamanegi	onion	tamanéng i	(head) completely shaved
	tamagogata	ovoid figure	tamangongáta	egg-shaped, oval

In addition to being used in PAL as state verbs, some of the items in (49) can also be used as nouns (e.g. cházi taste, flavour, kámang sickle, and tamanéngi

A few examples following the pattern of (49) are found from Sp. and Eng. sources. These are given below:

(50)			Noun		PAL Sta	te Verb
	Sp.	diablo calabozo martillo	devil dungeon, c hammer	ell	diablóng kelebús martilióng	terrible, awful jailed, in prison clumsy, ungraceful
	Eng.	curve butterfly				curved (person) fickle/prone to changing one's mind (woman) loose/fast.48
		you-drive	(car)		iudoráibu	(woman) loose/fast. 4°

All of the words in (50) except baterflai can also be used in PAL as nouns.

Several PAL loanwords illustrate other types of shifts in part-of-speech affiliation resulting from the process of borrowing. Thus, the two Eng. adjectives English and American are the source for the PAL nouns Ingklis England and Merikel America. 49 In addition, a few Jp. nouns were adopted into PAL as intransitive verbs — e.g. PAL v.i. chanzing add, do sums (< Jp. n. anzan mental arithmetic/calculation) and PAL v.i. sbiido speed up (< Jp. n. supiido speed). As a final example of interest, the Ger. adverbial auswendig by heart/ memory is turned into a transitive verb in PAL — i.e. chausbengdik know/learn thoroughly, memorise.

3.1.2.

There are three major classes of modifying words in Jp., all of which are borrowed into PAL as state verbs. Jp. adjectivals are forms that inflect for tense and other categories: for example, in the present tense, they take the suffix -i and in the past tense the suffix -katta (e.g. usui (liquid) weak usukatta (liquid) was weak). When Jp. adjectivals are adopted into PAL they are invariably taken in the present tense (-i) form, as the examples below illustrate:

(52)

(51)	Jp. Ad	jectival	PAL State Verb
	abunai usui komakai	dangerous (liquid) weak detailed, thorough, stingy	chabunái chusúi komakái
	koi kusai omoshiroi sabishii zurui takai	(liquid) strong bad-smelling interesting, funny lonely sly, foxy, sneaky expensive	kói ksái omosirói ⁵⁰ sabisí surúi takái

Jp. nominal adjectivals are non-inflecting noun-like elements that are divided into two subclasses according to whether they must be linked to a following modified noun by the particle na or the particle no (e.g. kantan na koto $simple\ matter\ vs.\ futs\ uo\ koto\ usual\ matter)$. Nominal adjectivals from both subclasses are taken into PAL as state verbs, as shown in the examples of (52) below:

	Jp. Nominal Adjectival		PAL State Verb		
na-type	bonkura iroiro	dull, slow-witted various, diverse, miscellaneous	bongkurá chirochíro	many-coloured, (child- ren of particular woman) fathered by different men	
	otenba	pert, saucy	chotémba	(woman) loose/fast/ flirtatious	
	daijōbu kantan kechi zeitaku	all right, OK simple, brief stingy, miserly luxurious, high- class	daiziób kantáng kets séitak	,	
no-type	osoroi	(clothes, etc.) of uniform style	chosorói		
	daitai	general, main, rough	daitái	all right, OK ⁵¹	
	hadaka hadashi hantai	naked barefooted opposite, dis- senting	hadaká hadási hantái	naked, bare-breasted	
	futs u katate	common, usual (with) one hand	hútsu kataté	(with) one hand, dexterous	
	kichigai	crazy, insane	kitsingái		
	_				

Many stative expressions in Jp. consist of a verb in its gerund form (with the suffix -te) followed by the auxiliary verb iru be, exist — e.g. tsukarete iru (be) tired from tsukareru get tired). A few of these -te iru expressions have been borrowed into PAL as state verbs: in the resulting PAL forms, of course, the identity of the separate Jp. morphemes (verb stem, suffix -te, and auxiliary verb iru) has been obscured. Some representative examples of this interesting phenomenon are listed below:

(53)	Jp. Sta	tive Expression	PAL State Verb
	amatte iru	(be) left over/plenty, more than enough	chamátter
	atte iru	(be) suitable/appro- priate (for each other)	chattér ⁵²
	kankei shite iru	(be) related to/ connected with	kangkeistér
	kiite iru	(be) effective/ efficacious	kitér
	tsukarete iru	(be) tired	(t)skáreter

A small number of Jp. intransitive verbs have been converted into PAL state verbs. In every case, the Jp. intransitive verb is of a special type consisting of a noun followed by the verb suru do. In the PAL form, however, the verb suru is omitted:

(54)	Jp. In	ntransitive Verb	PAL State Verb	
	dokuritsu (-suru)	become independent	dokuríts	independent
	koshō (-suru)	break down, go out of order	kósio	broken, out of order
	panku (-suru)	get punctured, blow out	bangk	(tyre) flat/punctured ⁵³

3.1.3.

Most transitive and intransitive verbs from Japanese and English are borrowed into PAL without any change in part-of-speech affiliation. Thus, the examples in (55-6) below are rather straightforward, with the semantic changes being of most interest:

(55)		Jp. or Eng. Tr	ansitive Verb	PAL Trans	itive Verb
	Jp.	harau yakusoku (-suru)	pay for promise	haráu iaksók ⁵⁴	
		kaburu	put on/wear (hat)	kabúr	flip (person) over one's shoulder and throw down
		kensa (-suru)	<pre>inspect, exam- ine, (medically)</pre>	kénsa ⁵⁴	
		kotowaru	refuse	kotouár	
		mawasu	turn, screw	mauás	
		shimeru	close, strangle, choke	simér	strangle, choke, turn off (e.g. water)
		shiraberu	examine, investigate	sirabér	
		chūi (-suru)		tsiuí	watch out for (one's behaviour), warn (person)
		ōen (-suru)	support, cheer	o(i)éng	praise, honour, acclaim
		tsukamaeru	catch, seize,		

	Eng.	stop sign bake		stob saíng ⁵⁵ béik	
(56)		Jp. or Eng. In	transitive Verb	PAL Intr	ansitive Verb
	Jp.	bakuhatsu (-suru)	blow up, explode	bakuháts	
		ayamaru katsu	apologise to win	chaiamár kats ⁵⁶	
		kawaru	change	kauár	(condition of wind) change
		kizetsu (-suru)	faint	kiséts	v
		makeru mawaru ⁵⁸	lose	máke ⁵⁷	
		mōkaru	turn/go around make profit, gain	mauár mokár	
		shinpai (-suru)	worry	símbai	
		son (-suru)	lose money, incur loss	song	
		seikō (-suru) taoreru	succeed fall, collapse	séiko taorér	
	Eng.	drive go ahead		doráib kohéi	drive around in car go ahead/forward, advance

As exceptions to the above, a few intransitive verbs or expressions of Jp. have been reinterpreted as PAL transitive verbs. The most striking examples are PAL v.t. changár promote (< Jp. v.i. agaru rise, increase) ⁵⁹ and PAL v.t. kingátsku notice, be aware of (< Jp. v.i. ki ga tsuku take notice of, be attuned to). ⁶⁰

3.2. Paradigmatic features of loanwords

PAL native morphological structure is extremely varied and rich, with highly developed systems of inflection and derivation. Transitive verbs occur in both imperfective and perfective forms, with each type composed of characteristic morphemes and the perfective forms involving a whole paradigm of incorporated pronominal object suffixes. In addition, transitive verbs have related stative forms (the so-called resulting and anticipating state verbs to be explained in 3.2.1. below) as well as derived reciprocals, causatives, and numerous reduplicated forms. Intransitive verbs and state verbs have inchoative forms ('is beginning to..., is becoming...') and predictive forms ('is about to (become)...') and also exhibit derived reciprocals, causatives, and reduplicatives. Finally, the great majority of nouns are inflected with suffixes that indicate the person and number of the possessor (see 3.2.2. below).

3.2.1.

While complete coverage of the derivational morphology of PAL verbs is beyond the scope of this paper, $^{6\,1}$ the following illustration will suffice to describe those categories relevant to loanword morphology. Given a basic noun

stem such as chelébed whip, club, anything to hit with, the following forms can be derived:

- (57) a. ergative mechelébed gets hit milechelébed got hit
 - b. imperfective mengelébed hits, is milengelébed was hitting hitting
 - c. perfective cholebedák hits me chillebedák hit me (past)
 cholebedáu hits you chillebedáu hit you (sg.)
 (sg.)
 cholebedíi hits him/ chillebedíi hit him/her/it
 her/it
 - d. resulting chellébed (in a state of having been) hit state verb
 - e. anticipating chelebedáll is/needs to be hit state verb

Both the ergative and imperfective forms begin with the verb marker me-(o- in verbs formed from b-initial stems) and inflect for the past tense by infixing the past tense marker -il- after the word-initial consonant. In the imperfective form, an additional morpheme - the imperfective marker ng (1 or m in other environments) - appears before the stem chelébed, whose initial consonant has been deleted. The perfective forms consist basically of the stem chelébed (but note the change of vowel: the o of cholebed- is most likely a phonetically modified, infixed form of the verb marker) followed by a series of suffixed pronominal objects - e.g. -ák me, -áu you (sg.), -íi him/her/it, and so on. The past tense of perfective forms also involves infixing the past tense marker -il- after the word-initial consonant. The two state verbs resulting and anticipating - are used as nominal modifiers with rather specialised meanings. The resulting state verb, formed by infixing -(e) | - after the word-initial consonant, describes the state or condition that some person or object is in as a result of having undergone the related action, while the anticipating state verb, formed by suffixing -all (or -(e)), focuses on some person or object as being expected or required to undergo that action.

A significant number of loanwords have been Palauanised to the extent that they participate in paradigms similar to (57). Some representative examples are given below in the same format:

- (58) PAL n. kiis key (< Eng. keys)
 - a. erg. mekiis gets opened milekiis got opened
 - b. impf. mengiis opens (with key), unlocks milengiis was opening
 - c. pf. kiisii opens it up kilisii opened it up
 - d. res. state vb. kliis opened
 - e. antic. state vb. kisáll is to be opened
- (59) PAL n. chasuart asphalt (< Eng. asphalt)
 - a. erg. mechesuárt gets asphalted milechesuárt got asphalted
 - b. impf. mengesuårt puts asphalt on milengesuårt was putting asphalt on
 - c. pf. chosuertíi asphalts it over chilsuertíi asphalted it over

- d. res. state vb. chelsuart asphalted
- e. antic. state vb. chesuertáll is to be asphalted
- (60) PAL n. sébel shovel (< Eng. shovel)
 - a. erg. mesébel gets cleared of debris milsébel got cleared of de-(by shovelling) bris (by shovelling)
 - b. impf. mesébel⁶³ shovels, removes milsébel was shovelling/removing debris from debris from
 - c. pf. sobelii shovels it out silebelii shovelled it out
 - d. res. state vb. selébel shovelled out, cleared of debris
 - e. antic. state vb. [none]
- (61) PAL n. smengt cement (< Eng. cement)
 - a. *erg*. mesméngt *gets cemented* milsméngt *got cemented*
 - b. impf. mesméngt puts cement on milsméngt was putting cement on
 - c. pf. simengtii cements it over silemengtii cemented it over
 - d. res. state vb. selemengt cemented over
 - e. antic. state vb. smengtall is to be cemented
- (62) PAL n. bomk 64 pump, small boat engine (< Eng. pump)
 - a. erg. obómk gets pumped ulebómk⁶⁵ got pumped
 - b. impf. omómk pumps ulemómk was pumping
 - c. pf. memkii pumps it out milemkii pumped it out
 - d. res. state vb. blomk pumped out
 - e. antic. state vb. bemkall is to be pumped out

3.2.2.

The great majority of PAL nouns are inflected with *possessor suffixes* to indicate the person and number of a possessor. The categories of possessor expressed in the suffixes correspond exactly to the seven major pronominal distinctions of PAL, as indicated in the list below:

Possessor Suffixes (63) Category of Pronominal Possessor first person singular -ek, -uk, -ik, -ak second person singular -em, -um, -im, -am -el, -ul, -il, -al third person singular first person plural inclusive -ed, -ud, -id, -ad -am, -(e)mam first person plural exclusive -iu, -(e)miu second person plural third person plural (human) 66 -ir, -(e)rir

Given the phonetic form of an independently occurring noun stem, it is impossible to predict whether the possessor suffix will take the vowel e, u, i, or a in the three singular forms and in the first person plural inclusive form. This is illustrated by the following examples:

(64)	(64) Independent Form		Sample Possessed Form		
	reng ker oách	heart, spirit question leg	rengúk kerím ochíl	my heart, my spirit your question his/her/its leg, their (non-human) legs	
	oák charm chur chur	anchor animal laughter tongue	okúd chermék cherím churál	our (incl.) anchor my animal your laughter his/her/its tongue, their	
	chur	rib of coconut frond	churúd	(non-human) tongues our (incl.) frond	

As most of the examples (64) also show, PAL noun stems undergo various types of morphophonemic changes when the possessor suffixes are added. These changes affect the vocalic element in the stem and are due mainly to the shift of stress from the noun stem to the possessor suffixes, which are always stressed. Thus, for example, the a of charm animal and the u of chur laughter are both reduced to a schwa [ə] (orthographic e) in the possessed forms, where they come to appear in unstressed syllables. Similarly, the diphthong represented by oa in oach leg and oak anchor is reduced to the single vowel o in the corresponding possessed forms.

With regard to the phenomenon of possession, PAL nouns fall into three classes. The examples of (64) are all optionally possessed nouns because the noun stem can occur as an independent word as well as with possessor suffixes. Bound noun stems that must always have a suffixed pronominal possessor are called obligatorily possessed nouns — e.g. budek, budem, etc. my skin, your skin, etc. or obekuk, obekul, etc. my older brother, his older brother, etc. In other words, with obligatorily possessed nouns we do not find independently occurring free forms such as *bud skin or *obek older brother. Lastly, unpossessible nouns are those that never take possessor suffixes. A few native PAL nouns and — as we will see in 4.1. below — the majority of loanword. nouns belong to this category. In order to show possession with such lexical items, it is necessary to use a prepositional phrase of the form er of + possessor — e.g. delmerab er ngil his room (lit. room of him) and sensel er ngak my teacher (lit. teacher of me).

A significant number of loanword nouns have been sufficiently Palauanised so as to participate in the paradigm of noun possession illustrated in (63) above — in other words, they have been borrowed as optionally possessed nouns. Some typical examples are listed below, with only the third person singular form given as a representative example:

(65)	(65) Loan Source			PAL In	dependent	Noun	PAL Possessed Noun	
	Ger. Jp.	Schraube taoru	screw towel	seráub t á or			serubél torél	
	Eng.	pipe box (re)bound dance keys shovel school time tank		báeb baks bangd dangs kíis sébel skúul táem tangk	rebound,	bounce	bebél beksél bengdél dengsél kisél sebelél skulél temél tengkél	[bebél] [bəksél] [bənðél] [ðənsél] [səbəlél] [tɛmél] [təŋkél]

As the examples of (65) clearly show, loanword noun stems undergo the very same phonological processes of vowel and diphthong reduction to which native stems are susceptible.

Many loanword nouns, especially vowel-final stems from Jp., are adopted into the paradigm of noun possession with the addition of a stem-final augment of the form -leng- or -(e)ng- 67 Note the following examples:

(66)		Loan Sou	irce	PAL Independent Noun	PAL Possessed Noun
	Ger.	Papier	paper	babiér	babi Ing é l
	Jp.	kama bando kata skato zubon tama	sickle belt shape skirt pants ball	kámang bándo káta skáto subóng táma	kamelengél bandelengél katelengél skatelengél subelengél tamelengél
	Eng.	bucket bamboo bag boat book cup matches soap		báket bambúu bek bos buk kob masés sob	baketengél bambungél bekengél besengél bukelengél kebengél masesengél sebengél

3.2.3.

Loanword stems participate rather freely in a large variety of PAL derivational patterns. Perhaps the derivational affix occurring most frequently with foreign noun stems is the prefix ou-, which derives verbs that designate ownership or use of, control over, or participation in the entity designated by the stem itself. First of all, the use of ou- with native stems is illustrated in the examples below:

(67)	Nou	n Stem	Derived V	'erb in ou -
	blái charm sers secheléi	house animal garden friend	oublái ouchárm ousérs ousecheléi	own a house keep a pet keep a garden, do farming have (particular person) as a friend

The great majority of verbs in ou- formed with loanword stems are intransitive verbs derived from nouns. Note the following examples:

(68)		Loan S	Source	PAL N	Ioun	PAL Intrans	sitive Verb
	Ger.	Rad	bicycle	rrat		ourrát	have/own a bicycle
	Jp.	bakuchi	gambling	bakutsi	twenty-one (card game)		ρlay twenty-one
		ashi	foot	[none] ⁶⁸	(cara game)		walk/go on foot (rather than ride)

	denwa	telephone	déngua	oudéngua	have a telephone, make a telephone call
	yakyū shibai jidosha zuga	baseball play auto picture, drawing	iákiu sibái sidósia sungá	ouiákiu ousibái ousidósia ousungá	play baseball act in a play have/own an auto make a picture/ drawing
Eng.	basket() card(s) store tape (re	ecording)	baskét kat stoáng téib	oubaskét oukát oustoáng outéib	play basketball play cards run/own a store make/have a tape- recording of

In a few cases, a borrowed noun prefixed with ou- yields a transitive verb - e.g.

(69)	Loan Sou	ırce	PAL Noun	PAL Transit	ive Verb
Jp.	shirankao	feigned ignorance	sirangkáo	ousirangkáo	pretend that one is innocent
	shiken	test, exam	skeng	ouskéng	examine, give test to
Eng.	dance		dangs	oudángs	dance (particular type of dance)
	school		skúul	ouskúul	teach

Another common PAL prefix is beke-, which is used to form state verbs that designate two divergent and apparently unconnected categories of meaning. First, beke- can be added to noun stems to form state verbs meaning 'prone to..., habitually doing...' Thus, with native stems we have, e.g. beketekoi talkative from tekoi word, speech and bekesius swear a lot, talk vividly, from sius swearing. Borrowed noun stems prefixed with beke- and having the connotation of habitual action include PAL mongk complaint — bekemongk always complaining (cf. Jp. monku complaint) and PAL bet bed — bekebet prone to spending a lot of time in bed (cf. Eng. bed). Second, beke- is also used with noun stems to form state verbs meaning 'having the characteristic smell of...' Native words with this interpretation are, for example, bekecheluch smell of coconut oil from cheluch coconut oil and bekengikel smell of fish from ngikel fish. Loanword nouns appearing with the same category of meaning include kosui perfume — bekekosui smell of perfume (cf. Jp. kōsui perfume) and katuu cat — bekekatuu smell of a cat (cf. Eng. cat).

The process of plural formation in PAL is quite restricted, since the plural prefix re- (r- before a vowel) can only be added to noun stems designating human beings — e.g. chad person — rechad people, ngalek child — rengalek children, ekebil girl — rekebil girls, and so forth. Loanword nouns with human referents can likewise be prefixed with re-, as in sensei teacher (< Jp. sensei) — resensei teachers, toktang doctor (< Eng. doctor) — retoktang doctors, etc. In addition, PAL uses a special prefix consisting of the plural morpheme re- followed by another element -chi- to designate nationalities (e.g. Ruk Truk — rechiruk Trukese people); this prefix, too, can accompany non-indigenous stems, as in Dois Germany (< Jp. doisu) — rechidois Germans and Merikel America (< Eng. American) — rechimerikel Americans. Another prefix added to PAL nouns is k1(e)-, which is used to derive abstract nouns meaning something like 'the experience of being...' or 'the act of doing...' Thus, in addition to examples from the native vocabulary such as chad person, human being, — klechad human life, way of life, we find examples based on loanword stems

such as sensei teacher (< Jp. sensei) - klsensei the experience of being a teacher and doraib drive (< Eng. drive) - kledoraib the action of driving around in a car. As one final example of the application of PAL derivational processes to foreign vocabulary, observe how the reciprocal prefix (basic alternant: kau-) can be added to loanword nouns to form related reciprocal verbs - e.g. mondai problem (< Jp. mondai) - kaumondai dispute, argue over and musing cooperative enterprise (< Jp. mujin mutual financial business) - kaumusing participate jointly in a cooperative enterprise.

4. SYNTACTIC PHENOMENA RELATING TO LOANWORDS

By and large, the PAL syntactic system has readily accommodated the various classes of loanwords that have penetrated into the language. Thus, for example, there is no distinction between native and borrowed nouns in terms of their ability to function as sentence subject, sentence object, and so on. In a like fashion, state verbs from non-indigenous sources are virtually indistinguishable from native state verbs with respect to the characteristic syntactic functions of this grammatical class. Nevertheless, there are two areas worthy of mention in which PAL syntax has been especially flexible in dealing with loanwords, one having to do with nouns and the other with verbs.

4.1.

As mentioned in 3.2.2. above, PAL nouns fall into three classes with regard to the phenomenon of possession. Thus, in addition to optionally possessed nouns and obligatorily possessed nouns which, respectively, may or must occur with possessor suffixes, PAL has a class of unpossessible nouns that never allow these suffixes. In order to express possession with such nouns, PAL speakers use a periphrastic expression consisting of the preposition er offollowed by the noun (or noun phrase) indicating the possessor. While there is a small class of native PAL unpossessible nouns consisting primarily of items designating animals, plants, or parts of the natural environment, the great majority of loanword nouns fall into the unpossessible category. As was observed in 3.2.2., a significant, but nevertheless guite small, number of borrowed nouns have been assimilated into PAL to the extent that they participate in the paradigm of noun possession shown in (63) - in other words, they have become optionally possessed nouns. Most borrowed nouns, however, remain unpossessible, and their foreign nature is clearly marked syntactically by the necessity of using a periphrastic expression with them to indicate the possessor. phenomenon is illustrated below:

(70)	Loan S	ource	PAL Unpossessible Noun	Sample Use of Unpossessible Noun Followed by Periphrastic Expression of Possession
Sp.	rosario	rosary	rosário	rosario er a Maria <i>Mary's</i> rosary
Ger.	Papier	paper	babiér	babier er ngii <i>his paper/</i> letter ⁶⁹
	Maschine	machine, motor	mesíl	mesil er a dengki generator (lit., machine of electricity)

Jp.	d o gu	tool	dóngu	dongu er a kldaiksang ⁷⁰
	kotai	answer	kotái	carpentry tools kotai er a ochur answer to
	KOLUT	unower	KOLAT	the math problem
Eng.	clock		klok <i>clock</i> , watch	klok er ngak <i>my clock/watch</i>
	store		s toáng	stoa er a Droteo <i>Droteo's</i> store

4.2.

As observed at the beginning of 3.1.1., PAL state verbs use the auxiliary mle was, were to express the past tense, while action verbs (transitive and intransitive) take the infixed past tense marker -il-. The use of -il- with action verbs of foreign origin is restricted to those few items discussed in 3.2.1. in which a borrowed noun has served as the stem for derived ergative and imperfective forms prefixed with the verb marker me- (or o-) - e.g. imperfective mengils open (with a key) - milengils was opening (with a key) (cf. kils key), etc. Transitive and intransitive action verbs of foreign origin are otherwise impervious to past tense formation with -il-, and instead the native pattern for state verbs is used, since this provides an alternative way (with the auxiliary mle) to mark the past tense overtly. This usage is illustrated in the sentences below: in (71) the borrowed action verb is transitive, while in (72) it is intransitive:

(71) a.	v.t.	haráu <i>pay (for)</i> (< Jp. harau)	A sensei a mle harau a blals. teacher PAST pay fine The teacher paid the fine.
b.	v.t.	siraber examine, investigate (< Jp. shiraberu)	A bulis a mle siraber er tia el police PAST investigate this tekoi. matter The police investigated this matter.
с.	v.t.	skamáer confront, face, corner (< Jp. tsukamaeru catch, seize, arrest)	Ng techa a mle skamaer er kau? it who PAST corner you Who was it who cornered you?
(72) a.	v.i.	bakuháts <i>explode</i> , <i>blow</i> up (< Jp. bakuhatsu)	Ng mle bakuhats a tangk. it PAST explode tank The tank exploded.
b.	v.i.	séngkio <i>vote</i> (< Jp. senkyo [suru])	A betok el chad a mle sengkio. many person PAST vote A lot of people voted.
c.	v.i.	<pre>saing sign name as pledge to abstain from liquor (< Eng. sign)</pre>	A toki a mle saing er a kesus. PAST sign last etc. night Toki pledged last night to abstain from liquor.

State verbs of foreign origin are identical to native state verbs with respect to the use of mle for the past tense. Thus, we have, for example, ksái foul-smelling (< Jp. kusai) — mle kusai was foul-smelling, kantáng simple (< Jp. kantan) — mle kantang was simple, and so forth. In addition, PAL state verbs take the auxiliary mo go, become (past tense: mlo) to express a change of state — e.g. ungil good — mlo ungil become good, improved, mekeald hot — mlo mekeald got hot, etc. The very same pattern is used as well with state verbs of foreign origin, as in sabisí lonely (< Jp. sabishii) — mlo sabisi got lonely and kitsingái crazy, insane (< Jp. kichigai) — mlo kitsingai went crazy.

THE SEMANTICS OF LOANWORDS IN PAL

As we have seen in the examples so far given, the great majority of foreign lexical items have been borrowed into PAL with no discernible semantic modification. There are nevertheless quite a few striking cases in which the original meaning of a loanword has undergone significant distortion. It is difficult to propose a clearcut method of categorising the types of semantic change, but as a rough approximation, the following three-way distinction seems reasonable. First, a process of semantic change called narrowing or specification involves taking a loanword having a general category (or generic) meaning and using it, in the borrowing language, to designate some specific member, subtype, or subclass of the category in question. Second, a process called widening and expansion involves just the opposite phenomenon - that is, a term with fairly specialised reference in the contributing language is borrowed with a more general or generic meaning, perhaps being used to refer to the whole class of which the original referent is a part or member. Finally, a third process called extension or shift does not involve the whole-part or part-whole relationships, respectively, of narrowing or widening, but instead hinges on a part-part relationship. In other words, a given term representing a member of some category is shifted or extended to refer to another comember of the same category, or is simply shifted, somewhat imprecisely, to a referent having similar or related properties.

Semantic narrowing or specification is observed in the loanword items listed below:

(73)		Loan So	urce	PAL	
Ge	er.	Bild Turm	picture tower	bilt turm	holy picture church tower, steeple
Jŗ	p.	bangō	number	bángngo	identification number, door number, number in batting order (baseball)
		bok us o	grass, pasture	boksó	elephant grass (used as animal feed)
		ainoko	halfbreed, mulatto	chainokó	half-Japanese and half- Palauan
	iroiro various, diverse, miscellaneous		chirochíro	many-coloured, (children of particular woman) fathered by different men	
		ude	arm	chúde	biceps
		eki	liquid, fluid, solution	chekí	battery acid

	hake hont o kank o dan kansoku	brush main island tourist group observation, survey	háke hónto kangkódang kánsok	paint brush Babeldaob (individual) tourist meteorological survey
	machi minatohan ⁷¹ nappa ⁷²	town, city harbour quarter greens	mats minatoháng náppa	main town, capital area of Koror between Neco Store and T-Dock cabbage
Eng.	blocks ground number		blaks kurángd lámbang sos	cement blocks playground identification number, telephone number soya sauce

In some cases, the PAL word not only preserves the original, more general meaning but also develops a more specialised meaning - e.g.

(74)Ger.	Gummi	rubber	kúmi	rubber, rubber band
Jp.	bakudan kata	bomb shape, form	bakudáng káta	bomb, dynamite shape, form, frame for weaving
Eng.	pipe		báeb	pipe, windpipe

Semantic widening or expansion appears in loanword items such as the following:

(75)Jp.	baikin	bacillus, bac- terium, germ	baiking	disease
	boi	page, waiter, porter, bellhop	bói	servant
	bōkūgō	air-raid shelter, dugout	bokungó	deep hole, pit
	kenpei	military police- man	kembéi	police
	rinbyō	gonorrhea	rímbio	venereal disease
Eng.	rum		rrom	liquor

In certain cases, the PAL word maintains the original specific meaning and, in addition, develops a more general meaning — e.g.

(76)Jp.	otsuri	change (from purchase)	otsúri	change (from purchase), benefit, recompense
	said a tanj o bi	cider birthday	saidáng tansióbi	cider, soft-drink birthday, birthday party
Eng.	buoy		bói	buoy, property marker (on land)
	Sunday		sándei	Sunday, week

The phenomenon of semantic extension or shift is illustrated in the examples below:

(77)Ger.	Mark	mark (monetary unit)	mak	fifty cents (old value of one mark)
		schenken	give, send	sengk	gift of money to first- born child by father's family
	Jp.	bud o	grape	búdo	Panama cherry
	•	denkibu	Electric Depart- ment	déngkibu	power plant
		han	fief, feudal domain	hang	hamlet
		mō chō	appendix	mótsio	appendicitis
		ninjin	carrot	ninzín	type of sweet potato (with orange-coloured inside)
		sarumata t o gan	shorts, trunks wax gourd, Chinese water- melon	sarumáta tongáng	panties squash
	Eng.	flour ball four		blauáng borhuá	bread walk (in baseball)

In addition, there are cases in which the PAL word maintains the original meaning and develops one or more coexisting or extended meanings — e.g. $\,$

•	7	\sim	
ı	•	ĸ,	

Ger. Papier	paper, document	babiér	paper, document, letter, book
Jp. tama	ball, marble	t á ma	ball, marble, fried flour ball
Eng. cat clock soursop		katúu klok sáusab	cat, sweetheart clock, watch soursop, spade or heart in cards ⁷³

ACKNOWLEDGEMENTS

I would like to thank Romana Anastacio for her invaluable assistance in providing me with information on various aspects of Palauan loanword vocabulary. Appreciation is also due to Wako Hinds and to Charles DeWolf, who provided me with helpful insights on Japanese and Palauan, respectively. Theo Faustino kindly suggested many revisions to the original draft.

NOTES

- 1. The Palau Islands were discovered in 1543 by the Spanish explorer Ruy López de Villalobos, who named them the Arrecifos. It is said that Sir Francis Drake visited the islands in 1579.
- 2. For a more detailed analysis of the PAL phonological system, see Josephs 1975: Chapter 1.
- 3. For Sp., Ger., and Eng., the loan source is given in the modern standard orthography. For Jp., the Romanisation system used is that found in Kenkyûsha's New Japanese-English dictionary, ed. Koh Masuda (Fourth edition, Tokyo, 1974). This system presents a phonetic (rather than phonemic) spelling of Jp. syllables using Eng. orthographic equivalents for the sounds in question. Thus, the syllables of Jp. are rendered as follows:

a	i	u	e	О
ka	ki	ku	ke	ko
sa	shi [ši]	Su	se	so
ta	chi [či]	tsu [cu]	te	to
na	ni	nu	ne	no
ha	hi	hu [Φu]	he	ho
ma	mi	mu	me	mo
ya		yu		yo
ra	ri	ru	re	ro
wa				
ga	gi	gu	ge	go
za	ji [ji]	zu [ţu]	ze	zo
da			de	do
ba	bi	·bu	be	bo
pa	рi	pu	pe	ро

In addition to the above, a *palatal glide* can occur between a consonant and a following a, u, or o, as indicated in the following syllables:

kya	kyu	kyo
sha [ša]	shu [šu]	sho [šo]
cha [ča]	chu [ču]	cho [čo]
nya	nyu	nyo
hya	hyu	hyo
mya	myu	myo
rya	ryu	ryo
gya	gyu	gyo
ja [ʃa]	ju [ʃu]	jo [j o]
bya	byu	byo
руа	pyu	руо

Long vowels within a single syllable are indicated by a long mark (e.g. $k\overline{u}$, $g\overline{o}$, etc.), and geminate consonants are spelled double (e.g. tt, pp, etc.). The symbol n stands for a syllable-final nasal phoneme that assimilates to the initial consonant of the following syllable within the word (e.g. shinpai [šimpay] worry, kankei [kaŋkey] relationship) and is realised in word-final position as a nasalised version of the preceding vowel (e.g. hon [hoo] book, shinbun [šimbuũ] newspaper). In Tokyo dialect, the g in syllable-initial position is usually pronounced [ŋ] word-internally (e.g. negi [nɛŋi] green onion). The location of the pitch accent, although marked in Kenkyûsha's Romanisation, is omitted here.

4. The orthographic conventions of PAL should become clear from the ensuing discussions, but note the following equivalents:

PAL orthography	Phonetic equivalent
ch	[?]
ng	[n, ŋ]
d	[ð, θ]
11	[1:]
rr	[ř]

In this paper, the primarily stressed syllable of a polysyllabic word is marked with an accent over the vowel or the peak of a diphthong, although no such marking is made in standard PAL orthography. Note, further, that if no PAL gloss is given, the word in question has the same meaning as in the contributing language.

- 5. Some minor details of pronunciation in the contributing languages are disregarded here. For example, whereas orthographic b and v of Sp. are both pronounced as bilabial stops in word-initial position, intervocalically they are normally articulated as lenis bilabial fricatives. For further details on the Sp. situation, see Stockwell and Bowen 1965:47-48.
- 6. In the PAL form, the final $\ensuremath{\text{l}}$ of Sp. barril has been idiosyncratically lengthened.
- 7. Note that the Sp. plural form cebollas was reinterpreted in PAL as a singular.
- 8. In Ger. orthography, w stands for [v].
- 9. In this word, the final nasal is pronounced [n] rather than [n] hence, the unusual spelling with n rather than ng.

- 10. Indeed, the irregular spelling of PAL Papa with p's is intended to highlight this exception.
- 11. For a detailed discussion of PAL a, see Josephs 1975: Section 2.6. When adopting certain PAL nouns and place names, Eng. speakers also had trouble with PAL a, interpreting it as an integral part of the stems in question. Thus, in Eng. texts, we find the PAL community house bai being referred to as an abai and the villages of Irrai and Imeliik spelled as Airai and Aimeliik.
- 12. In Jp. itself, /p/ is a rather restricted phoneme, occurring only geminate in words of native origin. Otherwise, the occurrence of /p/ is limited to borrowings from Chinese and Eng. and to a special class of 'onomatopoeic' vocabulary. See McCawley 1968:77ff. for further details.
- 13. Jp. kyabu (longer alternant: kyaburetā) is itself a borrowing from Eng. A significant number of PAL loanword items can be traced through Jp. (from which they were directly borrowed) to their ultimate Eng. source. Thus, in certain cases, characteristic distortions of the original Eng. pronunciation clearly suggest direct borrowing from Jp. e.g. Jp. and PAL bando belt (< Eng. band); Jp. puragu plug PAL berangu spark plug (< Eng. plug); Jp. and PAL kanaria canary (< Eng. canary); Jp. and PAL masku mask (< Eng. mask); Jp. merikenko flour (< Eng. American + Jp. ko powder) PAL merikengko flour; Jp. ranningu athletic shirt PAL ranningngu athletic shirt (< Eng. running [shirt]); Jp. rajiētā radiator PAL razieta radiator (< Eng. radiator). In other cases, however, it is very difficult to tell whether a given loanword was taken directly from Jp. or from its original Eng. source e.g. PAL batteri (cf. Eng. battery, Jp. batteri), PAL chea (cf. Eng. air, Jp. ea), PAL dainamo (cf. Eng. dynamo, Jp. dainamo), PAL saireng (cf. Eng. siren, Jp. sairen).
- 14. In some dialects of Jp. (e.g. downtown Tokyo), /hi/ is pronounced [ši] rather than [çi].
- 15. Many speakers of the older generation, who still have knowledge of Jp. and spoke the language fluently during the period of the mandate, tend to maintain the original Jp. pronunciation for the allophones of /h/. Thus, for example, the initial fricative of PAL hútsu *common*, usual (cf. Jp. futsu) will often be heard as $[\Phi]$ or [f] rather than [h].
- 16. In present-day PAL, [x] appears in the words of (9) and sporadically among younger speakers as a replacement for the $[k^h]$ allophone of /k/ when the sound in question occurs word-finally after a stressed vowel. Thus, for such speakers, chermék my animal is pronounced as [?erméx] rather than as $[?ermék^h]$. Interestingly enough, it is reported that as late as the Ger. times, many PAL speakers (at least the older generation) pronounced the present-day phoneme /?/ as [x]. Following Ger. orthographic conventions, the letters ch were used to spell this sound (cf. Ger. doch [dox] therefore), and this spelling has remained standard even after the phonetic change from [x] to modern-day [?]. Only one loanword with [h] appears to have been taken from Ger. namely, the PAL interjection hall stop! (cf. Ger. Halt! stop!). The origin of the unusual h-initial pair hngong (exclamation to draw attention to a pleasant smell) and hngob (exclamation to draw attention to an unpleasant smell) is obscure.
- 17. Intervocalically, Sp. /d/ is actually pronounced as a lenis voiced fricative similar to [ð]. Cf. note 5 and see Stockwell and Bowen 1965:44-47.
- 18. The loss in PAL of the second d of soldado is probably due to the fact that the Sp. sound is so lenis (cf. note 17) as to appear nearly inaudible to non-native speakers. This phenomenon is mentioned by Stockwell and Bowen 1965.

- 19. In Ger. (morphophonemically basic) voiced stops are automatically devoiced in word-final position. Thus, the /d/ at the end of Rad was heard as [t] and borrowed into PAL as /t/ (realised word-finally as [th]). The same phenomenon is observed for Ger. Bild [bilt] picture PAL bilt [bilth] $holy\ picture$.
- 20. The sound represented by word-final orthographic z in Sp. is either [s] or $[\theta]$.
- 21. Sp. orthographic 'soft' c (i.e. c before i or e) is pronounced either as [s] or [θ]. Cf. note 20.
- 22. In all of these examples, Eng. /z/[z] is represented by orthographic s. PAL kiis is used as a singular although borrowed from the Eng. plural keys (cf. note 7).
- 23. In this and the following example, a schwa [ə] (orthographic e) has been inserted to awoid the prohibited consonant cluster sr.
- 24. In Jp. shiken, the high front vowel i is voiceless between two voiceless consonants i.e. we have $[\S ik \in \widetilde{\epsilon}]$. In PAL, the voiceless vowel [i] is lost completely hence, skeng $[sk \in \eta]$. For more discussion of this phenomenon see 2.2.3. below.
- 25. Note the unexpected optional i in the PAL form, indicating that the Jp. word might have been misinterpreted as *uchusu by some speakers.
- 26. A good number of younger speakers with a knowledge of Eng. pronounce these words with initial [t] rather than [t]
- 27. Because both the $[t\tilde{s}]$ of inch $[Int\tilde{s}]$ and the $[d\tilde{z}]$ of hinge $[hInd\tilde{z}]$ become PAL s and the h of Eng. hinge is lost, the PAL form (ings is homophonous.
- 28. Note the similarity to the phoneme /t/, which also has an aspirated allophone $[t^h]$ word-finally (cf. 2.1.2.).
- 29. Sp. orthographic $\tilde{\textbf{n}}$ represents a palatised nasal hence, the appearance of i in the PAL counterpart.
- 30. Word-final PAL ng will be discussed presently.
- 31. Even a few Eng. borrowings show the change of n to 1 e.g. PAL lámbang (< Eng. number), kombalíi (< Eng. company), and Lukiléi (< Eng. New Guinea).
- 32. In this interesting example, PAL has $[\eta]$ before [k] even though the Eng. source does not have $[\eta]$ (due, undoubtedly, to the morpheme boundary intervening between the final nasal of sun and the initial velar of glasses). Note, in addition, that in the PAL form, the Eng. plural suffix has been omitted.
- 33. Interestingly enough, no examples were observed of Eng. loanwords with word-final [n]. One or two exceptions exist to the pattern observed here e.g. PAL taifún (< Eng. typhoon), where word-final Eng. [n] = PAL [n].
- 34. One notable exception to this statement is PAL kámang (arm) twisted/crippled (< Jp. kama sickle, hook).
- 35. Note, in addition, the existence of a rule in the native phonology that requires the assimilation of /l/ in certain morphemes to an /r/ elsewhere in the word. Thus, while the basic form of the past tense infix is /-il-/, as in milleseb burned (cf. meleseb burn) and chilarm suffered (cf. chuarm suffer), the l changes to r in such forms as mirrael travelled (cf. merael travel) and riros drowned (cf. remos drown).

- 36. In this example, the a of azucár has evidently been analysed as the PAL prenominal particle a, thus leaving -zucár (= PAL sukál) as the independent noun (cf. note 11).
- 37. Babilngél his paper/letter/book is the third person singular possessed form of babiér. Note the change of r to l in the possessed form and see 3.2.2. below for further discussion.
- 38. The form kil is also used by some speakers.
- 39. Although the occurrence of stress is probably predictable within the native phonology (see Wilson 1972:39-42), there do not appear to be any consistent patterns governing stress in loanword phonology. Whether the contributing language has a stress accent system (as in Sp., Ger., and Eng.) or a pitch accent system (as in Jp.) does not seem to matter: it is virtually impossible to predict which syllable of the PAL loanword will receive primary stress. Clearly, much more research is needed in this challenging area.
- 40. The tense vowels in these pairs are sometimes analysed phonetically as diphthongs i.e. [iy], [uw], and [ey].
- 41. There are some further conditioning factors that determine whether or not a given high vowel will devoice (e.g. the location of the pitch accent within the word and the number of devoiceable vowels potentially occurring in adjacent syllables), but these are not relevant to the present discussion. For a complete analysis of Jp. vowel devoicing, see Han 1962:17-45.
- 42. In this word, Jp. h before i [ci] becomes s in PAL with concomitant loss of the vowel. Similar examples are Pal. skózio (Jp. hikōjō airport) and PAL skidás (Jp. hikidashi drawer).
- 43. With the loss of devoiced u, the PAL form gets an initial cluster tsk-, which is optionally simplified to sk-. Another similar example is PAL (t)skareter (< Jp. tsukarete iru tired).
- 44. In this word, Jp. ch [ts] gives PAL ts; and after the loss of the word-final devoiced vowel, the consonant cluster nts simplifies to ns.
- 45. Alternate pronunciations, including the glide articulation, are [kmɛːyð] [ðiːyl] [ðəgó:wl], and [bu:w?]
- 46. For a more detailed discussion of the syntactic and semantic properties of PAL state verbs, see Josephs 1975: Chapter 7.
- 47. This is a slang form for standard asemo.
- 48. This PAL state verb illustrates a humorous semantic shift from the original meaning of the Eng. noun.
- 49. In comparing Eng. American with PAL Merikel, we again observe the phenomenon in which an initial a- in the source word has been interpreted as the prenominal particle a, thus leaving -merican as the basis for the independent PAL noun. Cf. notes 11 and 36.
- 50. This word is also used in PAL as a noun meaning joke.
- 51. Note the unpredictable meaning distortion here, possibly influenced by contamination from daiziob, which has the same meaning and is partially similar phonetically.
- 52. The Jp. negative equivalent of atte iru namely, awanai not suitable/appropriate (for each other) is also borrowed into PAL as chauanái.

- 53. This word is also used as an intransitive verb in PAL i.e. it can also have the meaning go flat, get punctured, blow out.
- 54. The PAL forms can also be used as nouns with the meanings, respectively, (a) promise, (b) inspection, examination.
- 55. PAL saing (note the unusual accentuation) is also used as a noun meaning sign and as an intransitive verb meaning sign name (especially as pledge to abstain from liquor).
- 56. PAL kats is also used as a noun meaning winner.
- 57. PAL make is also used as a noun meaning loser.
- 58. Jp. mawaru is the intransitive partner of mawasu (cf. (55) above).
- 59. The PAL form changar is also used as an intransitive verb meaning (salary, etc.) increase, (person) get excited/nervous.
- 60. PAL has also borrowed the negative equivalent kingatskanái not be aware of, not notice (< Jp. ki ga tsukanai).
- 61. The many details omitted here can be found in Josephs 1975: Chapters 5-7, 9-12.
- 62. In other words, the basic form of imperfective mengélebed is (verb marker) me- + (imperfective marker) -ng- + (stem) chelébed, and by a special morphological rule, the initial ch of the stem is deleted directly following the imperfective marker.
- 63. In the imperfective forms of some verbs with s-initial stems, the imperfective marker is idiosyncratically absent, thus making the imperfective forms homophonous with the ergative forms. This phenomenon is also observed in example (61).
- 64. Note the unusual dissimilation of word-final b to k in this form. An alternant without dissimilation i.e. bomb is also in use.
- 65. In verbs with o- as the verb marker, the past tense is formed by replacing o- with ule-. The sequence ule- may be a phonologically changed form of (verb marker) o- + (past tense marker) -il- in which the contiguous vowels mid back o and high front i have blended to yield high back u. See Josephs 1975:6.3.2. for more discussion of the phenomenon of vowel blending in PAL.
- 66. The suffixes -ir and -(e)rir designate *human* plural possessors only. In order to express a non-human plural possessor, the third person singular suffixes -el/-ul/-il/-al are required, thus resulting in some potential ambiguity.
- 67. The -ng- augment is also found in the possessed forms of certain native stems e.g. bas charcoal besengél, bilás boat bilsengél, úum kitchen umengél, and téu width tengél.
- 68. Interestingly enough, there is no independent PAL noun asi foot but only the derivative ouasi.
- 69. The borrowed noun babiér paper, letter is 'semi-possessible' because some speakers use possessor suffixes (e.g. babilngél $his\ paper/letter$ of (66)) while others indicate possession with a periphrastic expression, as given here.
- 70. Kldaiksang being a carpenter is an abstract noun formed by adding the prefix kl(e)— (cf. the last paragraph of 3.2.3. above) to the borrowed noun daiksang carpenter (< Jp. daiku carpenter + san [title of address]).

- 71. This term is archaic in Jp.
- 72. This is a Jp. dialect word.
- 73. The meaning shift here is based on an analogy between the shape of the soursop fruit and that of the heart and spade symbols in cards. To distinguish hearts from spades the following terms are used: bekerekard el sausab heart (lit. red soursop) and chedelekelek el sausab spade (lit. black soursop).

BIBLIOGRAPHY

HAN, Mieko Shimizu

1962 Japanese phonology: an analysis based upon sound spectrograms. Tokyo: Kenkyusha.

JOSEPHS, Lewis S.

1975 Palauan reference grammar. Honolulu: University Press of Hawaii.

McCAWLEY, James D.

1968 The phonological component of a grammar of Japanese. The Hague: Mouton.

McMANUS, Edwin G., S.J.

1977 Palauan-English dictionary, ed. and expanded by Lewis S. Josephs, with the assistance of Masa-aki Emesiochel. Honolulu: University Press of Hawaii.

STOCKWELL, Robert P. and J. Donald BOWEN

1965 The sounds of English and Spanish. Chicago: University of Chicago
Press.

WILSON, Helen Irene

The phonology and syntax of Palauan verb affixes. (Doctoral dissertation, Department of Linguistics, University of Hawaii, Honolulu.) Working Papers in Linguistics, University of Hawaii 4/5.