II: OVERVIEW OF AUSTRONESIAN AND PHILIPPINE ACCENT PATTERNS

R. David Zorc MRM Inc.

1. Some background information

I am pleased to have this opportunity to discuss the Austronesian accent situation since the question has occupied my interests for some three decades now. My last venture was published in 1983, so it is timely for an update that encourages colleagues to portray in detail all the synchronic facts and to assist in the search for diachronic clues.

The catalyst for my interest in the reconstruction of Austronesian accent was a question posed by Prof. Charles Hockett in my comprehensive exams at Cornell University back in 1971. He had referred me to a review of Dempwolff by Bloomfield (1936) in response to a more critical one by Laves (1935). Briefly, Laves criticized Dempwolff because he did not reconstruct accent even though it was phonemically significant in two of the languages treated (Tagalog and Toba Batak). Bloomfield excused this because he felt most of the information on accent in the dictionaries available then was useless. This was not entirely the case, although deciphering early Spanish and later missionary notations required some study and skill, which I have dealt with elsewhere (Zorc 1978:67-8).

2. The synchronic depiction of accent

In the synchronic description of any language, two types of accent must be distinguished and accounted for:

- 1) accent on given words (word accent), and
- 2) accent on groups of words, such as phrases or sentences (intonation).

Intonation is important in all languages—it gives information about the number of words spoken, and on the type of utterance (statement, question, command, etc.). This being the case, I wondered why many Austronesianists and other comparative linguists ignored it.

Word accent is important in many (but not all) Philippine languages—it

makes a difference in meaning or in grammar; it is contrastive, or phonemic. Both word accent and intonation involve three details:

1) long vs short vowels (length),

- 2) pitch or high vs low tones (pitch accent),
- 3) loudness or amplitude (stress).

Which of these is the most important feature of Philippine languages? Much debate has gone on, but I propose them in the order listed here for a number of reasons.

We can illustrate this with a more familiar example from outside the Austronesian family. Compare English 'bet' vs 'bed'—what is the difference? The phonemically important feature is the voiceless vs voiced final stops, but a secondary feature also involves vowel length, i.e., [bět] vs [beɪd]. These redundant secondary features are often a part of language-cluing common to all world languages, although what is contrastive and what is secondary differs from language to language.

Table 1 gives some Philippine examples that illustrate the interplay of length, pitch and stress in contrastive word accent.

Table 1. Philippine features of contrastive word accent

Tagalog	[?aːso]	$[?a(\uparrow)so(\downarrow)]$	[?ásó]	'dog'
vs	[?aso]	$[?(\downarrow)so(\uparrow)]$	[?asó]	'smoke'
Ilokano	[baɪra]	$[ba(\uparrow)ra(\downarrow)]$	[bára]	'hot'
vs	[băra]	$[ba(\downarrow)ra(\uparrow)]$	[bará]	'lungs'
Aklanon	[laːla]	$[la(\uparrow)la(\downarrow)]$	[lála]	'hurt'
vs	[lăla]	$[la(\downarrow)la(\uparrow)]$	[lalá]	'braid'
Bikol	[baɪga]	$[ba(\uparrow)ga(\downarrow)]$	[bága]	'ember'
VS	[ga]	$[ba(\downarrow)ga(\uparrow)]$	[bagá]	'truly!'
Pampango	[?a:pi?]	$[?a(\uparrow)pi?(\downarrow)]$	[?ápi?]	'lime'
VS	[?ăpi?]	[a(↓)pi?(↑)]	[apí?]	'fire'

Examples could also be drawn from Butuanon, Cebuano, Balangaw, Bontok, Hanunoo, Ibanag, Isneg, Kamayo, Sambal, etc., but the above suffice to illustrate my point.

As Bolinger (1972) has pointed out, amplitude or loudness is the least important feature; it is generally a variation in pitch that one most easily hears and recognizes. The most convincing example is that of a singer being only slightly off-key as opposed to slightly too loud or soft. We quickly notice (and criticize) the former; the latter is readily ignored. In Philippine languages, vowel length (or shortness) is the most important feature of word accent—for various historical reasons, also because of intonation (which can override pitch and stress).

3. Stress accent as a grammatical feature

In all Philippine languages stress or pitch accent is a syntactic (grammatical) feature, a means of indicating an accent group (phrase); it does not even necessarily coincide with length. Thus:

Tagalog usually [símo] 'who?' but [simó] 'who?' (impatient, angry)
Aklanon usually [námu] 'what?' but [namú] 'what?' (irritation, duress)

Stress normally is a way of marking word boundaries and usually has a low functional load in words with a closed penult (CVC.CV(C)); Tagalog pinsan 'cousin,' minsan 'sometimes,' bibingka 'rice cake' or Ilokano lángka 'jackfruit,' karámba 'earthen jar.' Note Bisayan usually has CVC.CV(C), but there is Cebuano mandár 'to order,' dughít 'instrument for poking,' Aklanon daywáh 'two,' tatlúh ''three' (in counting in a series). In fact, Bisayan speech with accent on a closed penult is a generally and readily recognized feature of Bisayan intonation when speaking Tagalog or Filipino, i.e., a 'Visayan accent.'

4. Length as a feature of intonation

Even length can be a feature of intonation, but it is much more limited, e.g., Aklanon [támbuk] 'fat,' [katámbuk] 'very fat,' but [katámbuk] 'very, very fat!'

In fact, length in a final syllable is an unusual feature, and is generally limited to a few dialects where it is the result of the loss of some historical consonant, bringing two vowels together, as in the following cases:

Cebuano [da] 'also,' but [da:] 'bring, carry' (< dalá)
Tausug [sin] object marker, but [si:n] 'money' (< Mandarin qian)
Kamayo [abú] 'ashes,' but [abú:] 'smoke' (< PHF *qebél)
Butuanon [kawá?] 'take, get,' but [kawá!] 'left(side)' (< PCP *kawalá)

- 5. Kinds of length/shortness in Philippine languages
- 5.1 Firstly, there is inherited length (going back thousands of years) in Bisayan, Bikol, Tagalog, Ilokano, Sambal, Kapampangan, Ifugao, Isneg, Bontok, Hanunoo, etc. (See examples above in Table 1).

Some near minimal pairs can be reconstructed for Proto-Philippine:

```
*káryuh 'tree, wood' vs *kayú 'you (plural)'
```

^{*}dá:Raq 'blood' vs *daRá? 'earth, soil'

^{*?}á:su 'dog' vs *qasúh 'smoke'

```
*kíɪta? 'see' vs *kitá 'we (inclusive)'
*báːRah 'embers' vs *baRáq 'abscess, boil'
*báːwang 'garlic' vs *bawáng 'ravine, crevasse'
```

5.2 Secondly, length may develop as the result of the loss of some consonant. This is the case in languages that have lost the PPH distinction, such as Pangasinan (see Zorc 1979), Ibanag (Zorc 1978:79-84), Casiguran Dumagat (Zorc:Ibid), Kuyonon (Zorc 1977:passim), Tausug (Zorc 1977:217-18), etc.

Pangasinan bailo 'new' (< ballo) vs baló 'widow' (< PPH *bailu)
Ibanag aryam 'play' (< ayyam) vs ayám 'animal' (< PPH *qaryam)
Kuyonon kaipún 'yesterday' (< PCP *kahápun) vs kapún 'castrate'
(< Spanish capon)
Tausug iipún 'slave' (< *qeDípun) vs ipún 'tooth' (< PPH *iipen)

6. Classification of languages based on the role of accent

I have proposed a system of classifying Austronesian languages on the basis of the role of accent (Zorc 1978:71-2, updated in 1983:4-6). Altogether, eleven criteria are involved, as illustrated in Table 2. However, it should be noted that the classification of any given language may reflect more than a single criterion. Tagalog, for example, involves five: A (inherited length), B (compensatory length after loss of *1, *7, or *h, as in arraw 'day' < PCP *aldaw < PAN *qalejaw), D (coalescence of vowels, as in arnim 'six' < PCP *a?enem), F (strengthening after a short vowel, as in iri instead of **ili 'this' < PCP *i-ldi), and K (morphemic accent, as in turlog 'sleep,' tulóg 'asleep' < PHN *turduR). Even a language like Malay, with predictable accent, involves two features: H (regular accent on the penult) and J (except if the penult contains schwa). I believe it is imperative that scholars address these issues in synchronic phonological statements about the language under investigation.

Table 2. Accent classification of Austronesian languages

- (A) Phonemic length and shortness, as inherited from PPH (< PHN, PMP, PAN): Bisayan (except Kuyonon and Tausug), Coastal and Pandan Bikol, Balangaw, Bontok, Hanunoo, Ifugao, Ilokano, Isneg, Itneg, Itawit, Kalinga, Kapampangan, Kankanay, Malaweg, Sambal, Tagalog.
- (B) Phonemic accent (quantity or stress) as secondarily introduced, generally due to consonant loss, analogical levelling, or borrowing: Casiguran-Durnagat, Ibanag, Pangasinan, Old-Javanese, Ratahan, Malagasy.

- (C) Length contrasts in the ultima, resulting from compensation for the loss of a consonant: Tausug, Butuanon, Kamayo, Cebuano.
- (D) Phonemic length, as the result of coalescence (or crasis) of vowels, which does not correspond with stress (pitch accent): Kuyonon, Tungho-Saisiat.
- (E) Phonemic (1) length or (2) shortness, retained sporadically as remnants of a pre-existing system: Kalagan (length), Mansaka (shortness).
- (F) Consonant length (1: gemination, or 2: strengthening) following a short vowel (generally, but not always *e): Bagobo, Ilokano, Kagayanen, Obo, Isneg, Itneg, Malaweg, Tagabawa, Madurese, Buginese, Sama-Bajaw.
- (G) Oxytone, with accent (with or without secondary vowel lengthening) falling regularly on the ultima: Acehnese, Bilaan, Javanese, Ivatan, Kerinci, Palau, Puyuma, Tboli, Takituduh-Bunun, Saisiat, Uma-Juman, Yogad.
- (H) Paroxytone, with accent (with or without secondary vowel lengthening) falling regularly on the penult: Gaddang, Makassarese, Paiwan, Pazeh-Kahabu, Ishbukun-Bunun, Maanyan.
- (I) Proparoxytone, with accent falling regularly on a prepenultimate syllable (or on the first syllable of a polysyllabic word): Saaroa, Mantauran-Rukai.
- (J) PAN *e influences accent in a different way from the other vowels: Atayal, Malay, Sarangani-Manobo, Tiruray.
- (K) Accent is used inflectionally, that is morphemic accent: Chamorro, Kanakanabu, Motu, Toba-Batak, Angkola-Batak, most Central Philippine languages.

7. Evidence for the reconstruction of Austronesian accent

- 7.1 While the vowels *a, *i, *u could be either long or short, *e could neither be long or stressed, thus reconstructions such as *bĕRáy 'give,' *dĕkét 'adhere, stick to,' *dĕpáh 'fathom,' *qĕtút 'fart,' *Sĕmáy 'rice,' *Sĕdám 'borrow' are proposed.
- 7.2 Grammatical use of accent is proposed for verbs (in the imperative, e.g., *ka?én 'eat!'), for names or kin nouns (in the vocative, e.g., *amá 'father!,' *in 'mother!'), and stative adjectives (*Caném 'buried,' *tuDúR 'asleep') all of which have intonation falling on the ultima, whereas the root word probably

had accent on the penult. Furthermore, some affixes dictate accent placement on derivations (see Zorc 1977:64-9 and 1978:92f).

- 7.3 Certain syntactic classes, such as pronouns (*akú 'I'), deictics (*iní 'this'), interrogatives (*pijáh 'how many?'), negatives (*hadí? 'no,' *běkén 'not so,' *adá? 'don't!'), and numerals (*isá 'one,' *DuSá 'two,' *limá 'five,' *pitú 'seven,' *walú 'eight') had accent on the final syllable.
- 7.4 Gemination or strengthened reflexes probably result from a short penult vowel with corresponding length on the adjacent consonant. This is the case for geminate consonants in Madurese, Makassarese, and Ilokano, and probably for the strengthened reflexes in the North Sarawak languages treated by Blust (1974; see detailed review in Zorc 1983:14-20).
- 7.5 Accent differences in PMP/PAN may have been responsible for certain irregular sound shifts or changes, which have led to the reconstruction (on at least some etyma) of PAN phonemes that may not otherwise be justified, such as palatals in Malay (kecil < PHN *kětíl 'small,' ñilu < PAN *ngilúH 'set teeth on edge,' jauh < PMP *dĭaúq 'far,' pecah < PAN *pěséq 'broken in pieces,' pecal < PAN *pěsél 'knead, massage, squeeze in the hand'). This potential of accent to yield 'irregular' reflexes had not been acknowledged prior to Zorc (1983:11-13), as far as I am aware. Wolff (this volume) deals with this issue quite thoroughly.
- 7.6 Syncope in cognate forms is probably the result of loss of an historically de-accented vowel, e.g., Malay ternak 'native' < *taR- 'local' + anák 'child,' PHN *pangDan < PAN *panguDáN 'pandanus,' Bontok amtí < PAN *Samutí Solanum nigrum.

8. Concluding remarks

The very diversity of accent patterns among Austronesian languages (as outlined in Table 2) cautions against any simplistic solutions or assumptions about the proto language of highest order. No single pattern is prevalent, nor is it possible to conclude that the majority of languages are paroxytone (as once was felt to be the case). It would therefore be prudent to assume that PAN had a complex accentual system which gave birth to the diversity found throughout the modern family.

There is some evidence that accent pairs may be established for protolanguages earlier than PPH, e.g., PHN, PMP, or PAN:

PHN *íɪla 'see, foresee, know' vs PHN *iláh 'wild, untamed (animal)' PAN *búːluq 'thin bamboo' vs PMP *búːlu 'body hair, down, feather' vs PMP *bulú 'to wash up'

PMP *sárkay 'ascend' vs PMP *sakáy 'ride, catch a ride'

The loss or re-introduction of accent in any given daughter language should not give us pause. Evidence from languages like Mansaka or Kalagan establishes that it is possible to retain only a handful of historically-establishable vowel contrasts while all other vestiges are lost. This reflects the natural ebb and flow of phonological change, which is just as evident in the suprasegmental system as in the development of the segmental meso-language and synchronic phonologies. Regular or sudden change can account for some instances, lexical diffusion for others.

Whether the Philippine system reflects the original more closely than any other is admittedly subject to debate and further research, but projecting most of the accent patterns establishable for PPH to PAN leaves fewer residual problems than any alternate hypothesis.

ABBREVIATIONS

PAN	Proto-Austronesian
PCP	Proto-Central Philippine
PHF	Proto-Hesperonesian (Western Austronesian) + Formosan
PMP	Proto-Malayo-Polynesian
PPH	Proto-Philippine

REFERENCES

- Bloomfield, Leonard. 1936. On Laves' review of Dempwolff. *Language*: 12:52-3.
- Blust, Robert A. 1974. The Proto-North Sarawak vowel deletion hypothesis. Ph.D. dissertation, University of Hawaii.
- Dempwolff, Otto. 1934. Vergleichende Lautlehre des austronesischen Wortschatzes. Band 1: *Induktiver Aufbau einer Indonesischen Ursprache*. ZES Beiheft 15.
- Laves, Gerhardt. 1935. Review of Dempwolff 1934. Language 11:264-7.
- Zorc, R. David. 1972. Current and Proto-Tagalic stress. *Philippine Journal of Linguistics* 3.1:43-57.
- _____. 1977. The Bisayan dialects of the Philippines: subgrouping and reconstruction. Pacific Linguistics C-44. Canberra: The Australian National University.
- _____. 1978. Proto Philippine word accent: innovation or Proto-Hesperonesian retention? *Papers of the Second International Conference on Austronesian*

Linguistics, Fascicle 1. Pacific Linguistics C-6l. Canberra: The Australian National University, 67-119.

____. 1979. On the development of contrastive word accent: Pangasinan, a case in point. In Nguyen Dang Liem (ed.), South-East Asian Linguistic Studies, Volume 3. Pacific Linguistics C-45). Canberra: The Australian National University, 241-58.

____. 1981. Review of Consuelo J. Paz (1980), A Reconstruction of Proto-Philippine phonemes and morphemes. *Philippine Journal of Linguistics* 12.2:44-50.

____. 1983. Proto-Austronesian accent revisited. *Philippine Journal of Linguistics* 14.1:1-24.