
Assignment 1 – Ilokano

Due: March 5, 2008

February 27, 2008

This problem was composed by Bruce Hayes (UCLA) based on his own fieldwork. Ilokano is an Austronesian language spoken in the Northern Philippines and in many emigrant communities. The data in this problem were elicited by Bruce Hayes in the 1980s from May Abad, a UCLA undergraduate, and by May from her mother and her aunt. Full Reference:

- Bruce Hayes and May Abad. 1989. Reduplication and Syllabification in Ilokano. *Lingua* 77. 331-374.

Data

Ilokano has only two suffixes, -an and -en, which combine in some cases with prefixes to form circumfixes. For simplicity, Bruce shamelessly altered the data to include only the suffix part of a circumfix, and I am going along with that (see original source for complete data).

[tulad]	‘to mimic’	[tuladen]	‘mimic-goal focus’
[gataŋ]	‘to buy’	[gataŋen]	‘buy-goal focus’
[taraj]	‘to run’	[tarajan]	‘place to run to’
[saŋit]	‘to cry’	[saŋiten]	‘to cause to cry’
[basa]	‘to read’	[basaʔen]	‘read-goal focus’
[saka]	‘foot, leg’	[sakaʔan]	‘place where one walks barefoot’
[pja]	‘health’	[pjaʔen]	‘to make healthy’
[tʃjenda]	‘store’	[tʃjendaʔan]	‘marketplace’
[babawi]	‘to regret’	[babawjen]	‘regret-goal focus’
[masahe]	‘massage’	[masahjen]	‘massage-goal focus’
[komadre]	‘godmother of one’s child’	[komadrjan]	‘the reason why there are komadres’
[maneho]	‘driver’	[manehwan]	‘drive-goal focus’
[saŋo]	‘front’	[saŋwen]	‘to cause to face forwards’
[santo]	‘saint’	[santwan]	‘to make into a saint’

Assume the following about feature theory: the glide /j/ differs from the vowel /i/ solely in the feature [syllabic]. /j/ differs from /e/ in the features [syllabic] and [high]. The glide /w/ differs from the vowel /o/ in the features [syllabic] and [high]. Thus in an SPE-type approach, a simple analysis would be:

Glide Formation: [+syllabic] \rightarrow [-syllabic] / _____ [+syllabic]

Epenthesis (ordered after Glide Formation): $\emptyset \rightarrow ?$ / [+syllabic] _____ [+syllabic]

It's also useful to remember that in the great majority of languages, there is no glide that phonologically matches up with /a/, in the way that /j/ matches up with /i/ and /e/, and /w/ matches up with /o/ and /u/.

Assignment

1. Develop an Optimality-theoretic analysis of these forms, stating your constraints (with prose explication) and giving tableaux for all forms. Put prose explanations for what is going on immediately after each candidate table. Explain crucial constraint rankings.

The appropriate strategy here is to characterize Ilokano phonotactics in a coherent set of constraints, then specify how recalcitrant underlying forms (created by suffixation) are rendered compatible with the phonotactics, by ranking specific Faithfulness constraints low enough.

Be sure to include your grammar all Faithfulness constraints that get violated.

There are a set of representative forms below which you may use as the basis of your analysis. Be sure to cover at least these. I also included a number of crucial ill-formed rival candidates for each output form; be sure to include enough constraints to rule out the ill-formed candidates given here. You might also like to be creative and think of other plausible candidates.

2. The phonetic symbols [a̠], [e̠], and [o̠] are glides that are homorganic with the vowels /a/, /e/, and /o/, respectively. They differ only in the feature [syllabic].
3. Draw a “Hasse diagram” of the rankings you found (i.e. a diagram in which an arrow links the members of each necessarily-ranked pair).
4. At least one of the candidates below is harmonically bounded; i.e. can never win because it has a superset of the violations of another candidate (which is said to bound it). List a harmonically bounded candidate and a rival candidate that bounds it.
5. In your analysis, what underlying representations are compatible with surface [ʔabut]? Explain your answer.
6. Occasionally May Abad would produce forms like [ma.sah.ɛ̠an] instead of [ma.sah.jan], and similarly with other mid-vowel stems like [manehɔ̠an] (but forms like /basa-en/ always came out with a glottal stop; never *[basaɛ̠n], nor *[basaɛ̠n].) Sketch out a way that your grammar might be modified to generate this free variation.

URs:	/tulad/	/abut/	/basa-en/
SRs:	[tu.lad]	[ʔa.but]	[ba.sa.ʔen]
Rivals:	*[tul.ʔad], *[tul.ad]	*[a.but]	*[bas.aen], *[ba.sa.en], *[ba.sen], *[ba.san], *[ba.sa.ten]

URs:	/babawi-en/	/masahe-an/
SRs:	[ba.baw.jen]	[ma.sah.jan]
Rivals:	*[ba.ba.wi.ʔen], *[ba.ba.wi.en], *[ba.ba.win], *[ba.ba.wen]	*[ma.sa.he.ʔan], *[ma.sah.ɛan], *[ma.sa.he.an], *[ma.sa.han], *[ma.sa.hen]