

LING 303

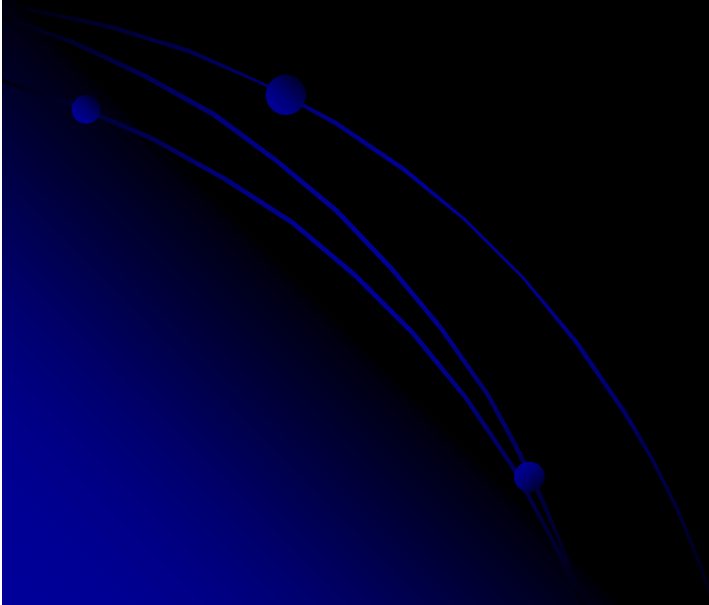
Phonology I



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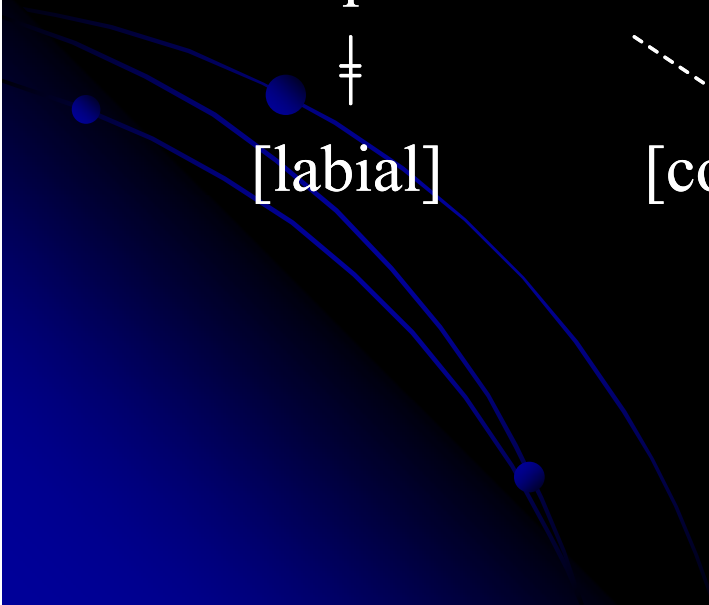
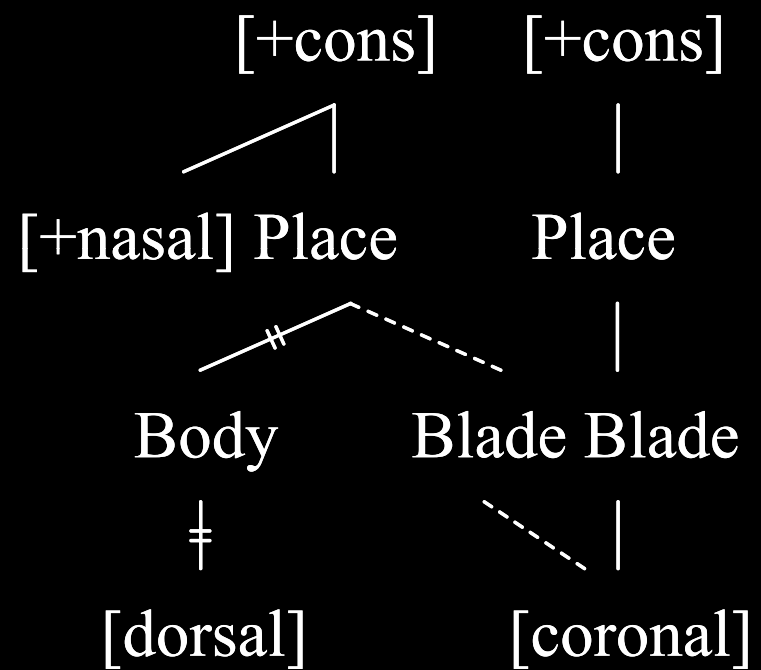
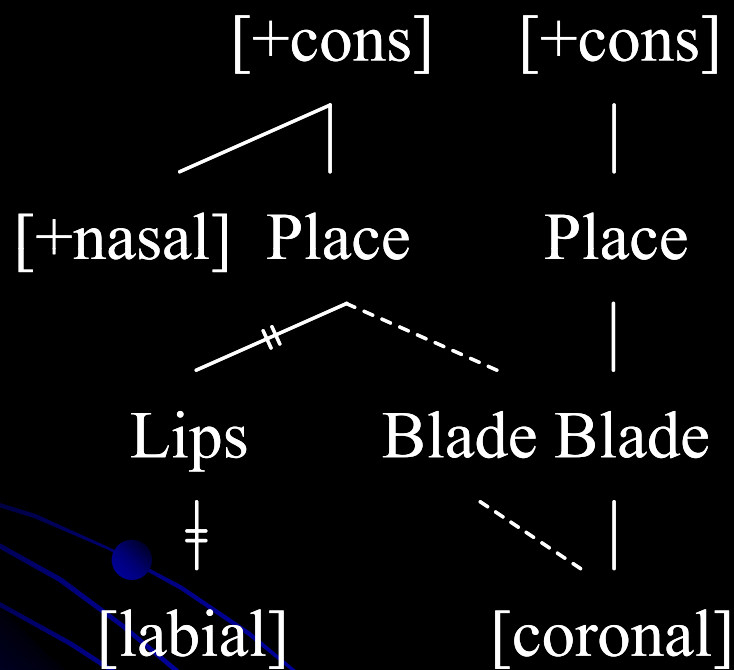
Tongue Blade

- [coronal] (last class)
- [±anterior] (today)
- [±distributed] (next class)



Sri Lankan Portuguese Creole

a.	/ma:m-su/	[ma:nsu]	'hand' (genitive)
	/pərim-təsuwa:/	[pərintəsuwa:]	'I am sweating'
	/reza:m lej/	[reza:nlej]	'reasonably'
b.	/mi:tiŋ-su/	[mi:tinsu]	'meeting' (gen.)
	/uŋ di:jəpə/	[un di:jəpə]	'for one day'
c.	/kəklu:n-pə/	[kəklu:npə]	'turkey' (dative sg.)
	/si:n-ki/	[si:nki]	'bell' (verbal noun)



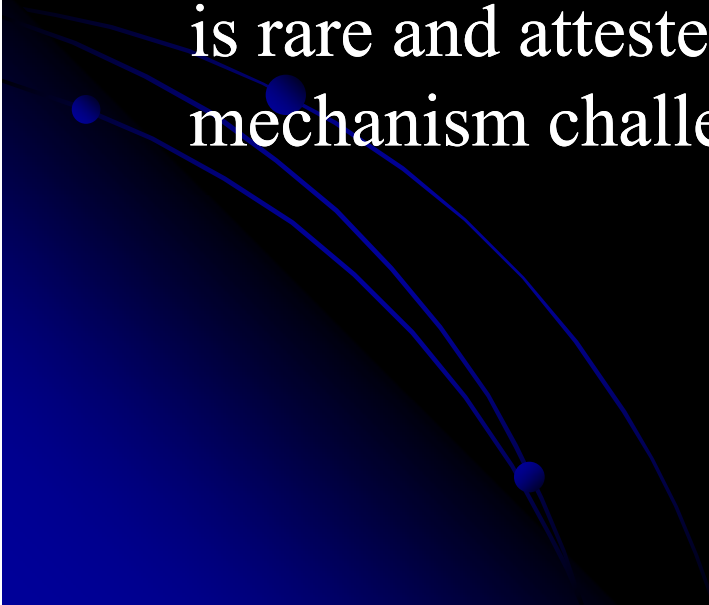
[±anterior]

- Anterior sounds are produced with an obstruction that is located in front of the palato-alveolar region of the mouth; nonanterior sounds are produced without such an obstruction.
- [+anterior]: Dentals and alveolars
- [−anterior]: Retroflexes and palatoalveolars

Markedness

- [-anterior] is generally more highly *marked* than [+anterior]
- The markedness of [-anterior] is evident in phoneme inventories.
 - Languages such as Oowekyala (Wakashan) or Blackfoot (Algonquian) allow numerous [+anterior] phonemes but it excludes [-anterior] consonants, e.g., /s, z, ts, dz/ are okay, but not */ʃ, ʒ, tʃ, dʒ/. So for instance the English word *matches* was borrowed into Oowekyala as [madzis].
 - Similarly, French *magie* [maʒi] 'magic' was borrowed into the Bantu language Lingala as [mazi] because Lingala lacks /ʒ/.

Acquisition

- Berhardt and Stemberger (1998:299–300):
 - *ship* as [sɪp],
 - *chip* as [tsɪp].
 - The opposite pattern, in which all [+anterior] alveolars are replaced by [–anterior] palatoalveolars, is rare and attested only in individuals with oral mechanism challenges such as cleft palates (ibid.).
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Contrasts

- West African Hausa: [+anterior] /ɾ/ (or /r/) vs. [-anterior] /ɽ/, e.g., *báráɾ* ~ *báráɽ* ‘servant’ vs. *báɾà* ‘begging’
- Californian Karok: [+anterior] /ʂ/ vs. [-anterior] /ʃ/, e.g., *ʂúf* ‘creek’ vs. *ʃúf* ‘backbone’
- Similarly Luiseño: *ʂúkat* ‘deer’ vs. *ʃúkmal* ‘fawn’

South Wakashan Nuuchahnulth

su:p 'soap' or 'soup'

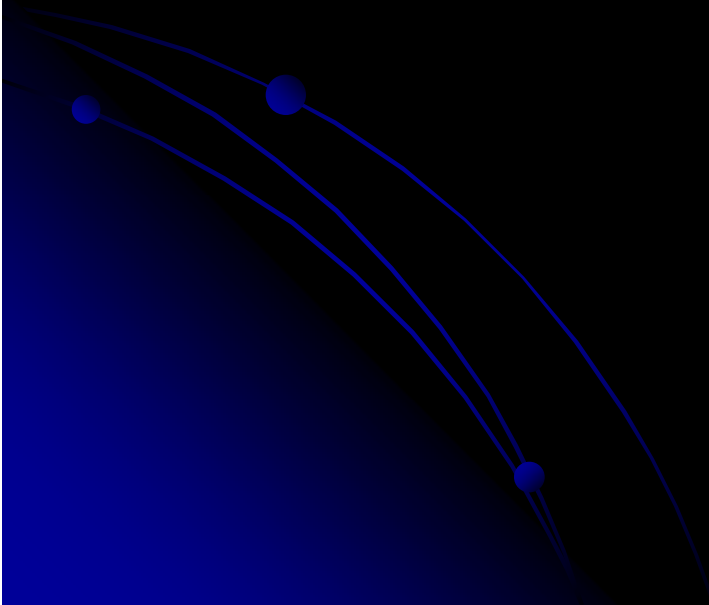
ʃu:wis 'shoes'

t^saka: 'to get spilled'

tʃaʔak 'island'

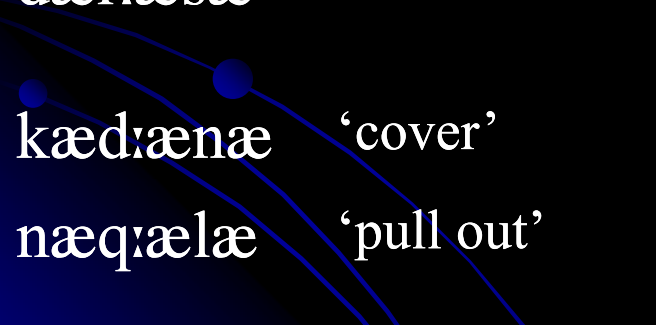
t^s'aʔak 'river'

tʃ'aʔak 'water'

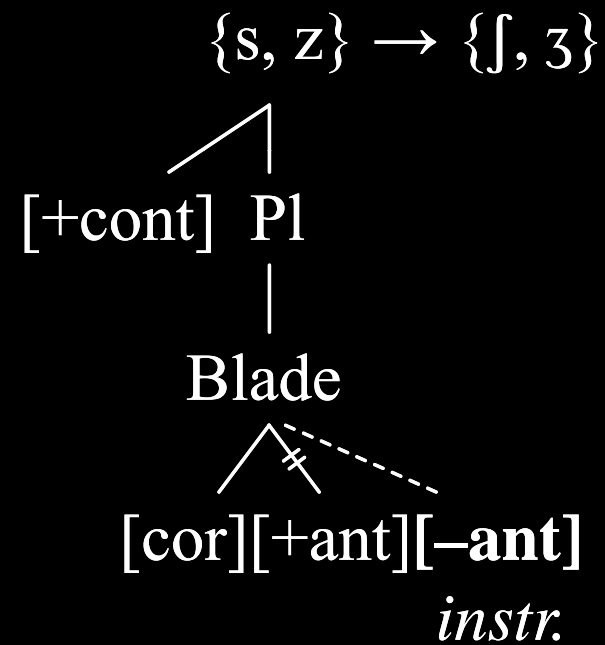
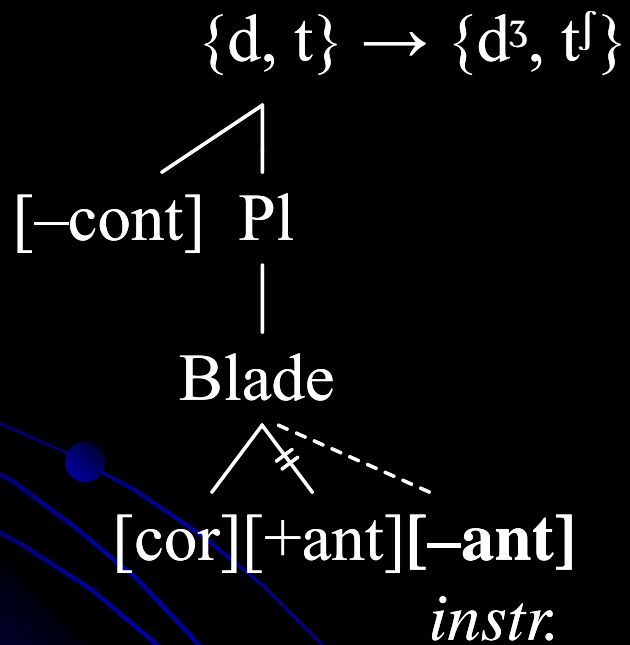


Instrumental in Amharic

hedæ	‘?’	mæhed ³ a	‘means for going somewhere, place where one walks’
kæf:ætæ	‘open’	mækfæt ^ɫ a	‘key’
wæg:æzæ	‘excommunicate’	mæwæg:azæ	‘means for authority to excommunicate’
dær:æsæ	‘arrive’	mædræfæ	‘arrival, time or place of arrival’
kæd:ænæ	‘cover’	mækdæp:æ	‘lid’
næq:ælæ	‘pull out’	mænqæjæ	‘instrument for pulling things out’

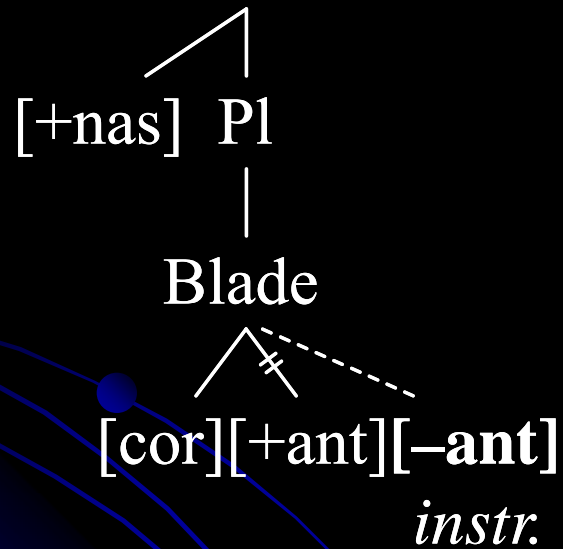


Instrumental in Amharic

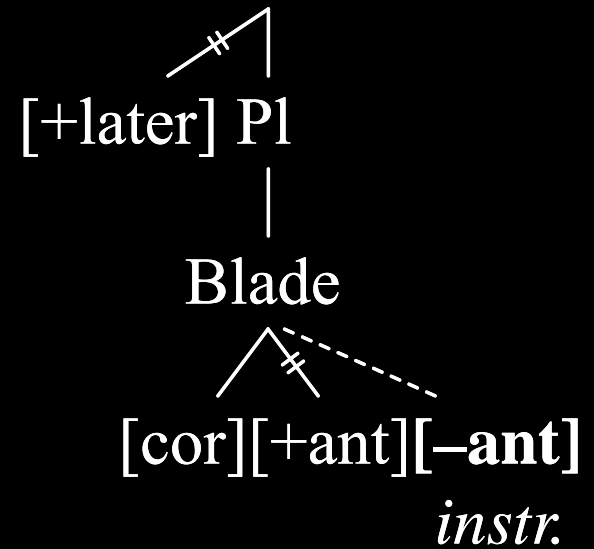


Instrumental in Amharic

$n \rightarrow \eta$



$l \rightarrow j$



Japanese mimetics

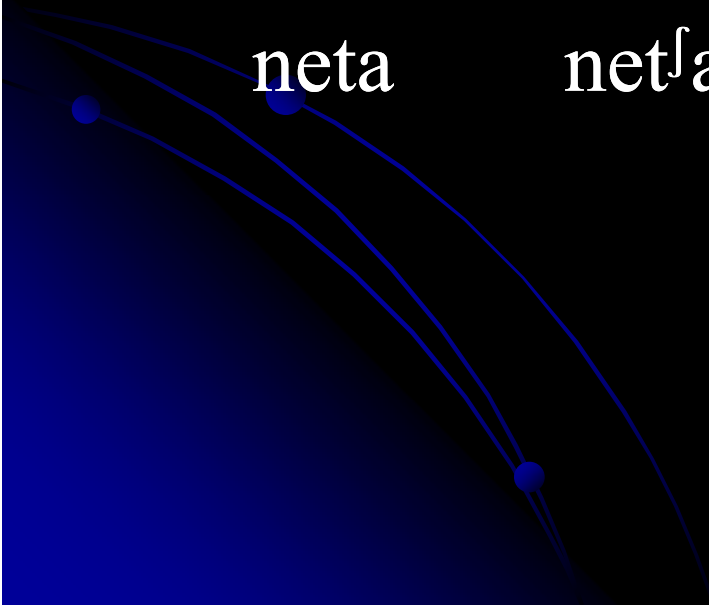
- *Mimetics* are words that sound like what they mean (“onomatopoeia,” e.g., English: *bow-wow*, *cock-a-doodle-doo*) or that have peculiar sound patterns (“ideophone,” e.g., English: *helter-skelter*, *teeter-totter*).
- Japanese mimetics are characterised by *palatalisation* of the rightmost coronal consonant (note that mimetics also involve *reduplication*)

Japanese mimetics

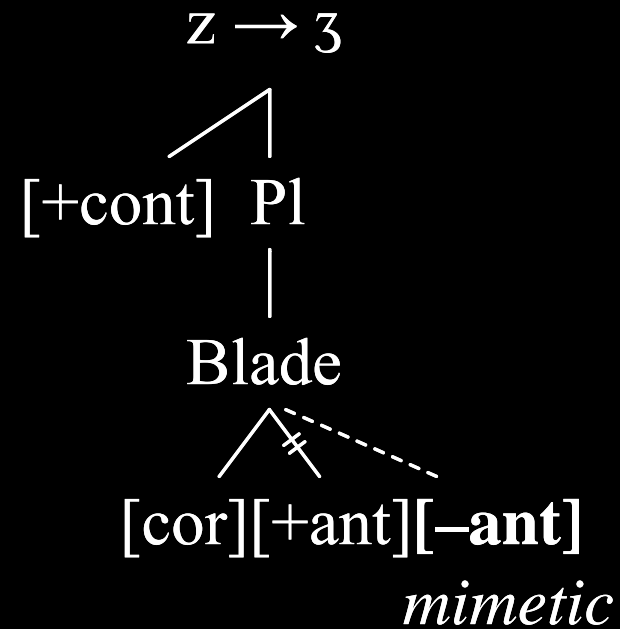
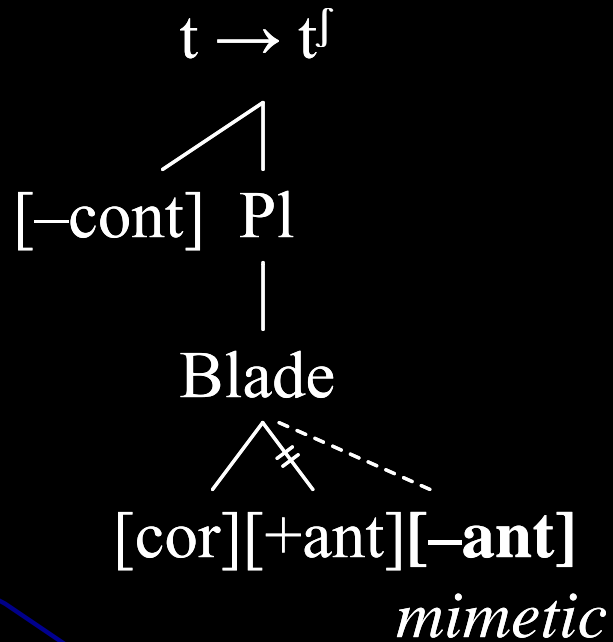
toko	tʃoko-tʃoko	‘childish small steps’
zabu	zabu-zabu	‘dabble in liquid’
noki	ɲoki-ɲoki	‘sticking out one after another’
meta	metʃa-metʃa	‘destroyed’
kasa	kasa-kasa	‘rustling’

Japanese mimetics ctd.

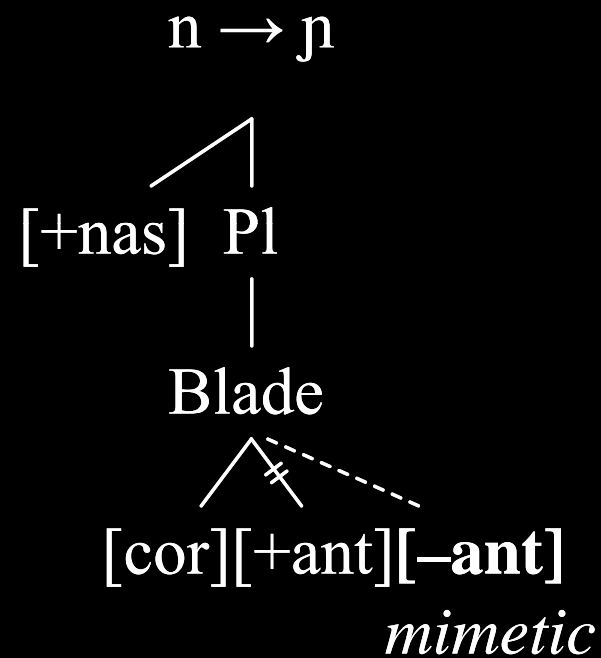
huna	huna-huna	‘limp’
dosa	doʃa-doʃa	‘in large amounts’
noso	noʃo-noʃo	‘slowly’
neta	netʃa-netʃa	‘sticky’



Japanese mimetics



Japanese mimetics



Sanskrit (Indo-Aryan)

- a. -na: present

mṛd-na: 'be gracious'

iṣ-ṇa: 'seek'

- b. -na passive participle

b^hug-na- 'bend'

pu:ṛ-ṇa 'fill'

vṛk-ṇa- 'cut up'

- c. -a:na middle participle

marj-a:na- 'wipe'

puṛ-a:ṇa 'fill'

kṣved-a:na- 'hum'

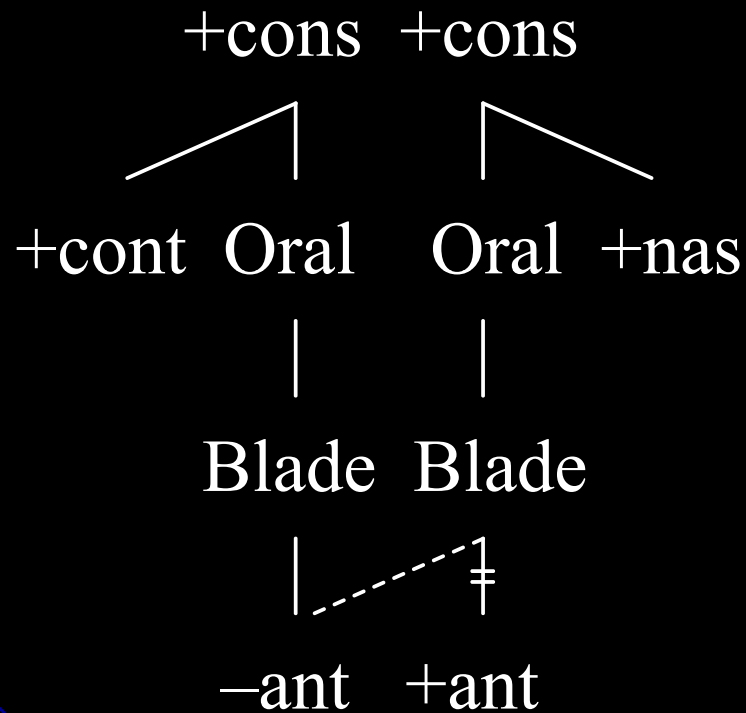
kṣub^h-a:ṇa 'quake'

- d. -ma:na middle participle

kṛt-a-ma:na 'cut'

kṛp-a-ma:ṇa 'lament'

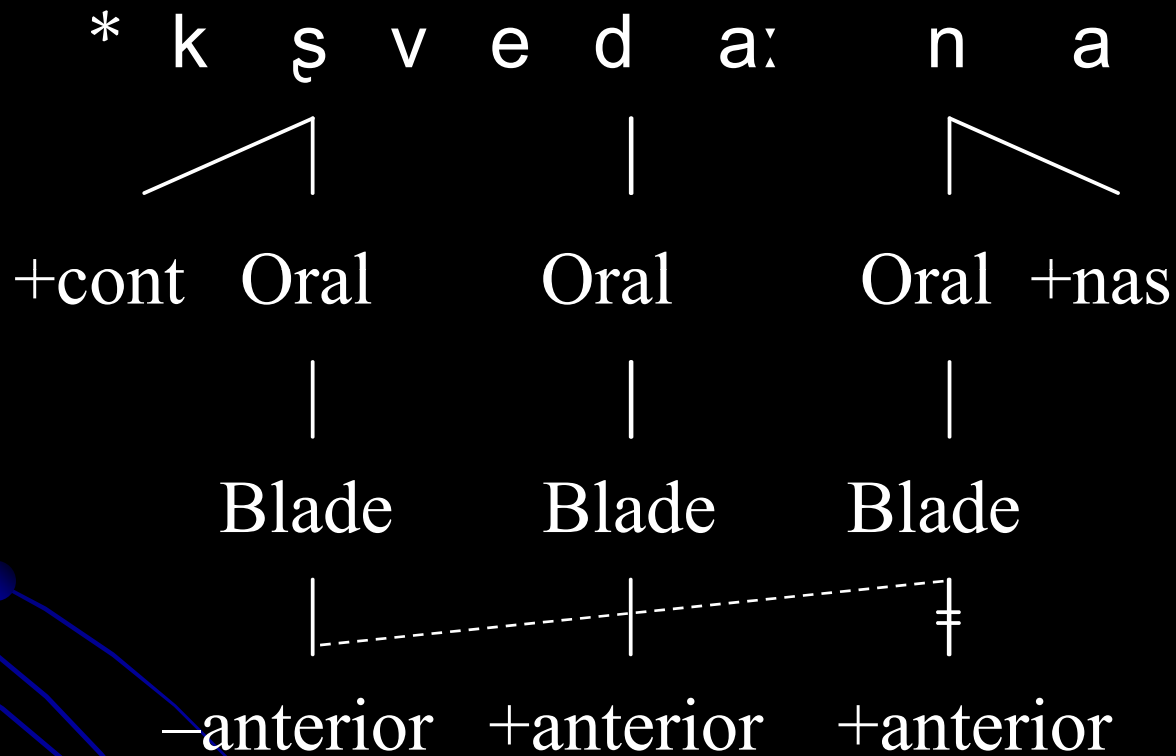
n-retroflexion in Sanskrit



Blocking


- Intervening coronals, e.g. [t] in
kɾt-a-ma:na
(cf. *kɾp-a-ma:na*)
- Blocks the assimilation process!
- This spreading rule is sensitive to contrastive features.
- The spreading [–anterior] is not permitted to cross an intervening [+anterior] feature in order to target a nasal.

“No Crossing”



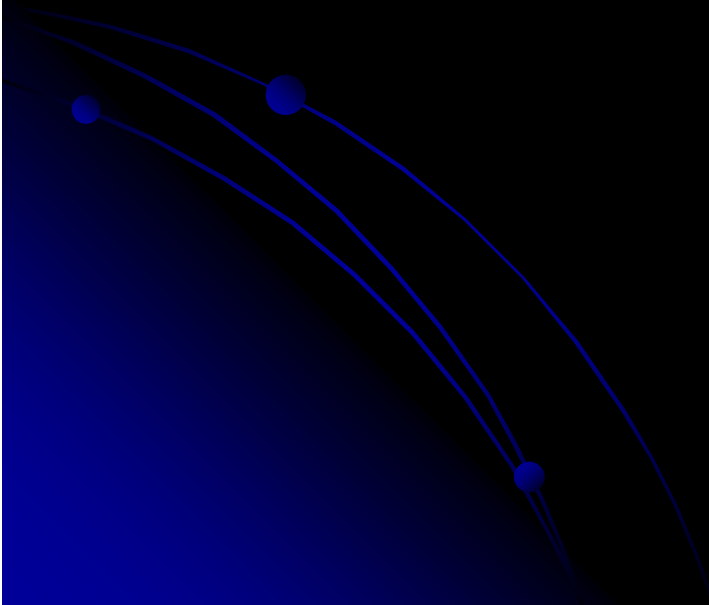
Barbareño Chumash

	[+anterior]	[-anterior]
[-continuant]	t ^s	tʃ
	t ^{sh}	tʃ ^h
	t ^{s'}	tʃ'
[+continuant]	s	ʃ
	s ^h	ʃ ^h



[±anterior] is contrastive in Barbareño

- Minimal pairs, e.g.:
slow 'eagle' vs. *flow* 'goal line'



Sibilant harmony in stems

[+anterior]

sqojis

'kelp'

t^s'axs

'scum'

swoʔs

'feather
ornament'

[−anterior]

fofo

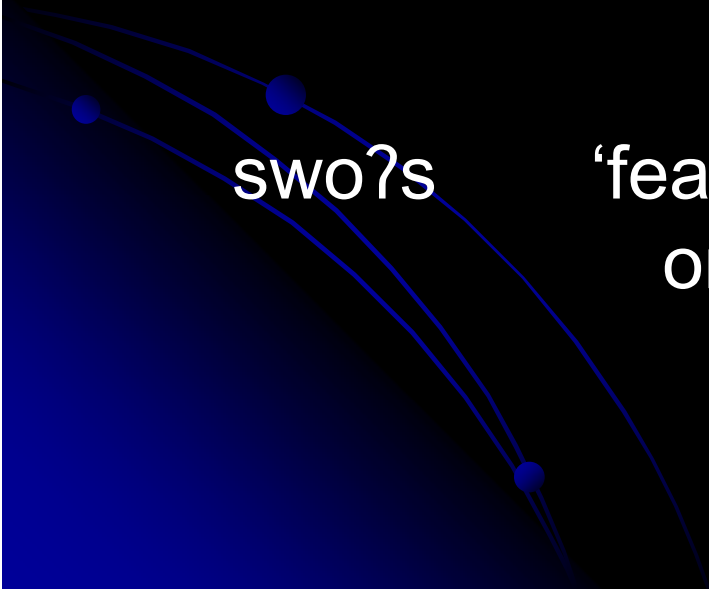
'flying
squirrel'

t^humaf

'Santa
Cruz
Islander'

t^ʃimujaf

'escurpe'
(a fish)



Barbareño prefixes with sibilants

[+anterior]

s- '3rd person
subj.'

saʔ- 'future'

su- 'causative'

sili- 'desiderativ
e'

[−anterior]

ij- 'dual subject'

itʃ- 'associative'

uj- 'with the
hand'

Barbareño suffixes with sibilants

[+anterior]

-us

'3rd sg.
benef.'

[-anterior]

-ʃiʃ/-ʃaʃ

'reflec./recip.'

-Vtʃ

'affected by'

-Vʃ

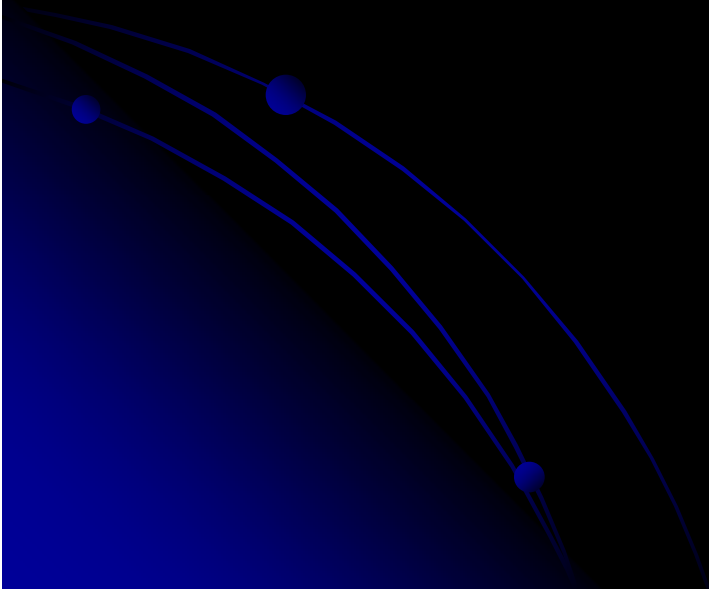
'resultative'

-ʃ

'imperfective'

(i)-waʃ

'past'



Barbareño regressive sibilant harmony

[+anterior]

/s-iniwe/

3-kill

siniwe

'he killed (it)'

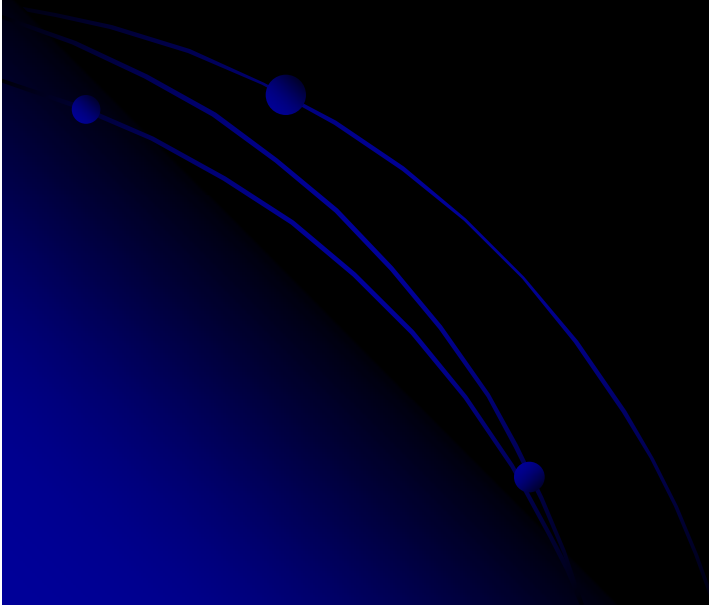
[-anterior]

/s-iniwe-ʃiʃ/

3-kill-reflex.

ʃinweʃiʃ

'he killed himself'



Ctd.

/k-saʔ-tiwoliʔlaj/

1-future-flute

ksaʔtiwoliʔlaj

'I'll play the
flute'

/k-saʔ-tiwoliʔlaji-n-f/

1-fut.-flute-verb-
imp.

kfaʔtiwoliʔlajitʃ

'I'll play the
flute'

Ctd.

/k-saʔ-su-kuj/

ksaʔsukuj

1-future-caus.-boil

'I will boil it'

/s-su-kuj-aʃ/

ʃⁿujujaʃ

3-caus.-boil-result.

'boiled islay'

[s] assimilates [-anterior] from [ʃ] or [tʃ]

/k-sunon-ʃ/ kʃunonʃ 'I am obedient'

/k-sunon-us/ ksunonus 'I obey him'

/saxtun-itʃ/ ʃaxtuniʃ 'to be paid'

/saxtun/ saxtun 'to pay'



[s] assimilates [-anterior] from [ʃ] or [tʃ]

/s-ilakʃ/

ʃilakʃ

‘it is soft’

/s-am-motʃ/

ʃammotʃ

‘they paint it’

/s-kuti-waʃ/

ʃkutiwaʃ

‘he saw’

/s-ixut/

sixut

‘it burns’

/s-aqunimak/

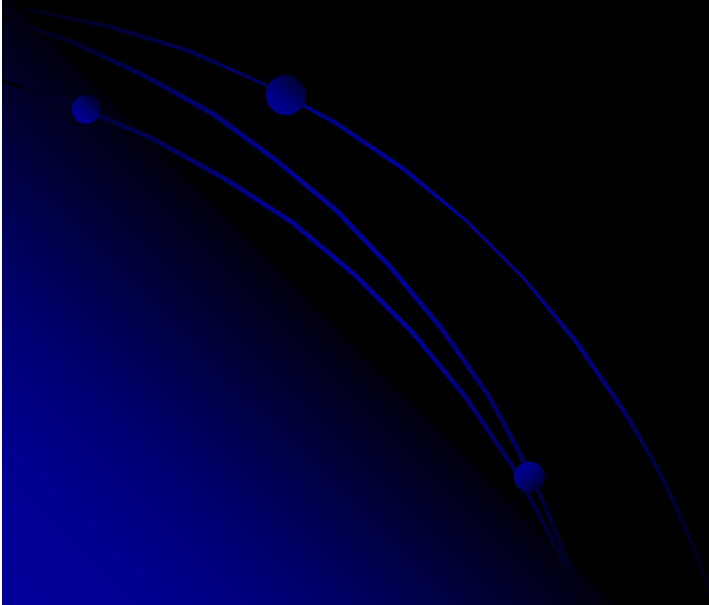
saqunimak

‘he hides’

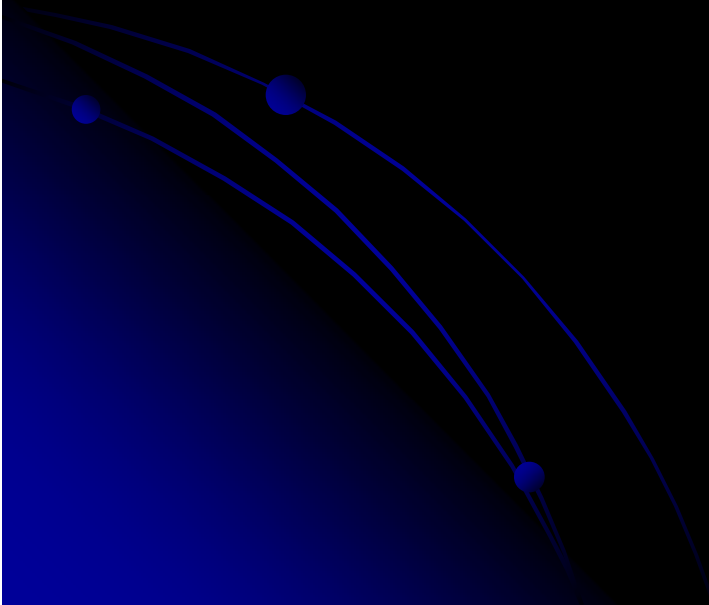
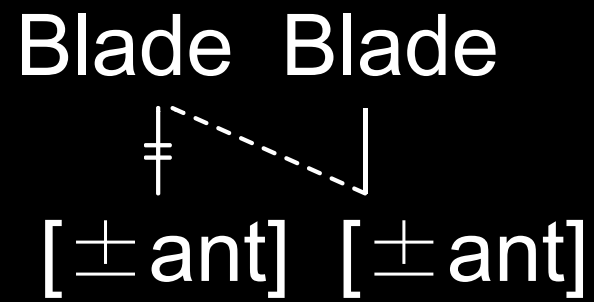
[ʃ] assimilates [+anterior] from [s]

/s-iʃ-tifi-jep-us/ sistisijepus ‘they two show him’

/p-iʃ-al-nan’/ piʃanan’ ‘don’t you two go’



Sibilant harmony



[t, n, l]??

a. ʃ-api-tʰo-it
s-api-t^so-us

‘I have good luck’
‘he has good luck’


b. k-funon-ʃ
k-sunos-us

‘I am obedient’
‘I obey him’

c. ha-ʃ-xintila-waʃ
ha-s-xintila

‘his former Indian name’
‘his Indian name’

Nonsibilant coronals [t, n, l]

- They do not trigger assimilation of [±anterior].
 - They do not undergo assimilation of [±anterior].
 - They do not block the assimilation of [±anterior].
- 

Explanation

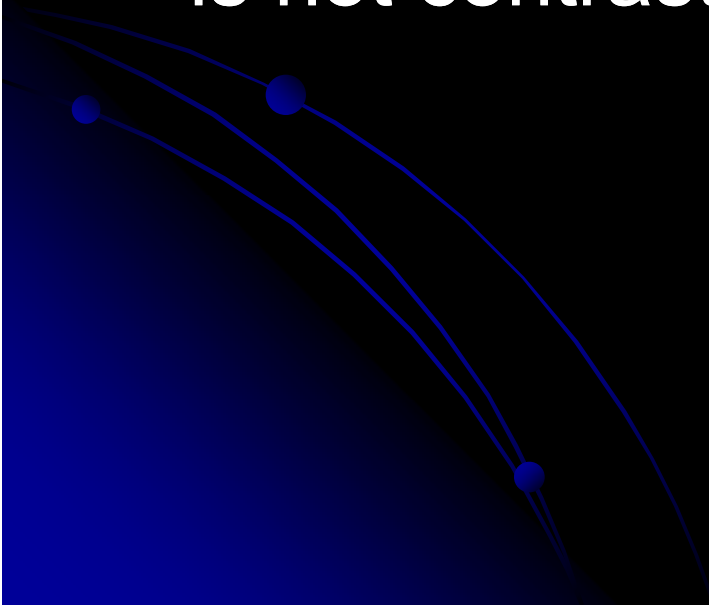
- [+anterior] is *contrastive* for [t, n] in Sanskrit (they contrast with /t̪, n̪/, respectively)
- [+anterior] is *not contrastive* for [t, n, l] in Chumash (they do not contrast, nor do they alternate, with [t̪, n̪, l̪] in this language)

That is:

- In both languages, segments that are contrastively-specified for [\pm anterior] fully participate in [\pm anterior] assimilation (as “source”, “target”, or “blocker”).
- But segments in which [\pm anterior] is not contrastive are inert to [\pm anterior] assimilation: they do not trigger it, nor undergo it, nor block it.

Underspecification?

Many researchers suggest that [+anterior] is inert on [t, n, l] in Chumash because these segments are actually *unspecified* for this feature, again because this feature is not contrastive in them.



Michif (Canada's Métis)

French *Michif*

sɛʃ ʃɛʃ 'dry'

savaʒ ʃava:ʒ 'First Nations' (F. *sauvage*)

ʃasi sa:si: 'window' (F. *chassis*)

ʃɛz sɛz 'chair'

ʒezy zezy 'Jesus'

Tsuut'ina (Athapaskan, Alberta)

- a. /si-tʰogo/ → ʃitʰógò 'my flank'
- b. /na-s-ɣatʰ/ → naɣátʰ 'I killed them again'
- c. /mi-tˢ'i-di-s-wuʃt/ → mítʰ'idifwùʃt 'someone whistled at him'
- d. /i-si-s-jí/ → ɪʃíʃí 'I thawed it out'
- 