

Modularity and Clitics

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Introduction

Two ideas I have never understood:

- Lexical Sharing (Wescoat 2005) → but see Bögel (2015)
- Clitics as pieces of Morphology
 - Phrasal Affixes (Case Marking, Ezafe)
 - Pronominal Clitics

Examples — Case and Ezafe

Genitive Case

punjaab=kaa sher
 Punjab=Gen.M.Sg lion.M.Sg.Nom
 'Punjab's Lion'

Urdu

Ezafe — atypical head-initial pattern

sher=e punjaab
 lion.M=Ezafe Punjab.Nom
 'The Lion of Punjab'

Urdu

(Bögel *et al.* 2008, Bögel and Butt 2012)

Examples — Pronominal Clitics

fawad=ne ditti=**s(u)**

Fawad.M.Sg=Erg give.Past.F.Sg=3.Sg

'Fawad gave this to her.' (Akhtar 1997, 3)

Punjabi

xat lɪk^hia=**ne**

letter.M.Sg.Nom write.Past=3.PI

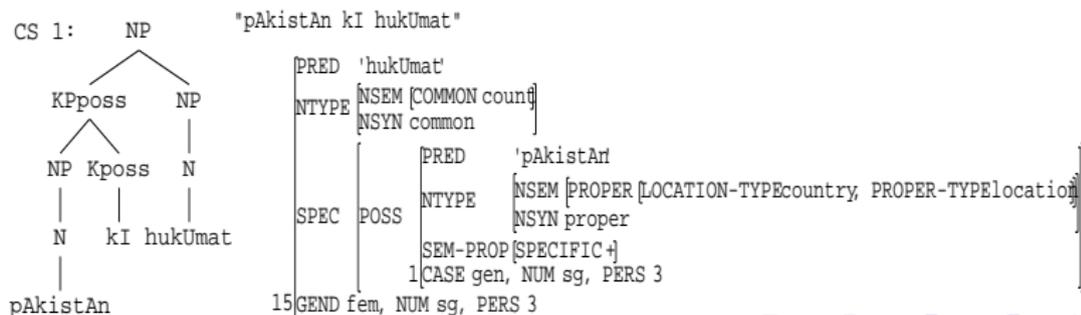
'They wrote a letter.' (Akhtar 1999, 283)

Punjabi

(Butt 2007)

Case Markers as Clitics

- Butt and King (2004) argue that case markers in Urdu should be analyzed as case clitics (not postpositions or pieces of the morphology).
- Since clitics are independent functional items as far as the syntax is concerned (they are “little words”), Butt and King (2004) accord case markers their own terminal node.
- Prosody takes care of the prosodic phrasing, i.e., the “cliticization”.



Case Markers are Clitics

Evidence supporting the analysis that case markers are clitics
(Butt and King 2004):

- 1 Coordination** (cf. Zwicky and Pullum 1983, criterion E): case markers have scope over coordination; inflectional affixes don't. Case markers therefore rather attach to phrases and have to be placed by the syntax.
- 2 Intervening Clitics:** Focus clitics such as *hi/b^hii* 'only/also' may be placed between the case marker and the nominal: Noun=*hi*=case (*sher=hi=kaa*). These cannot separate an affix from its stem.
- 3 Stress:** Case markers do not carry stress and do not affect the placement of stress while affixes may.

Pronominal suffixes as clitics

Pronominals do not have to cliticize on to the verb, can appear elsewhere.

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Punjabi

fawad=ne nε=**s(u)** ditti

Fawad.M.Sg=Erg not=3.Sg give.Past.F.Sg

'Fawad did not give this to her.' (Akhtar 1997, 7)

Punjabi

Areal pattern:

- Have strong and “weak” forms of a pronoun.
- Weak forms cliticize, mainly onto the verb.
- Eventually turn into new verb agreement (Givón 1976).

Pronominal Clitics and Information Structure

- South Asian languages also allow for rampant pro-drop.
- Why have both strong and weak forms of pronouns as well?
- Butt (2007) argues that pronominal clitics are used for backgrounding.
- The default position for backgrounded material is postverbal.
- This is where the pronominal clitics appear by default.

⇒ Information structural analysis (also broadly as per Givón (1976), cf. Bresnan and Mchombo (1987)).

Urdu *Ezafe* as a clitic

Bögel *et al.* (2008): *Ezafe* is a clitic

- Like the case clitics it can have scope over coordination.
- Inflectional affixes or other elements of word-level morphology in Urdu are not able to do this.
- Coordination with *Ezafe*

[ye maal o daulat]=e dunyaa
 this material and wealth=Ez world
 'this material and wealth of the world' (from *zarb-e-kaleem* by Muhammad Iqbal)
- Coordination with Case

[maal or daulat]=ko kumaa-o
 material and wealth=Acc earn-Imp.Rude
 'Earn/gather material and wealth!'
- The *Ezafe* attaches to constituents rather than words.

Help from Persian?

- **But:** Urdu *ezafe* is on its way towards fossilization → only part of the high language.
- So difficult to conduct tests.
- Borrowed from Persian → help from there?
- Persian also turns out to have pronominal clitics (Samvelian and Tseng 2010) → maybe also help from there?

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 - Main argument for lexical treatment of *Ezafe*: **haplology criterion**.
 - Samvelian does not admit the coordination criterion as evidence for the separation of affixes and clitics (cf. Miller 1992, Zwicky and Pullum 1983), arguing that it is only one-directional.

Persian Ezafe

Persian Ezafe Example

mojgân-e [az rimel sangin]-e maryam

eyelid.PI-Ez of mascara sangin-e Maryam

'Maryam's mascara-laden eyelids'

Samvelian (2007:635)

Persian

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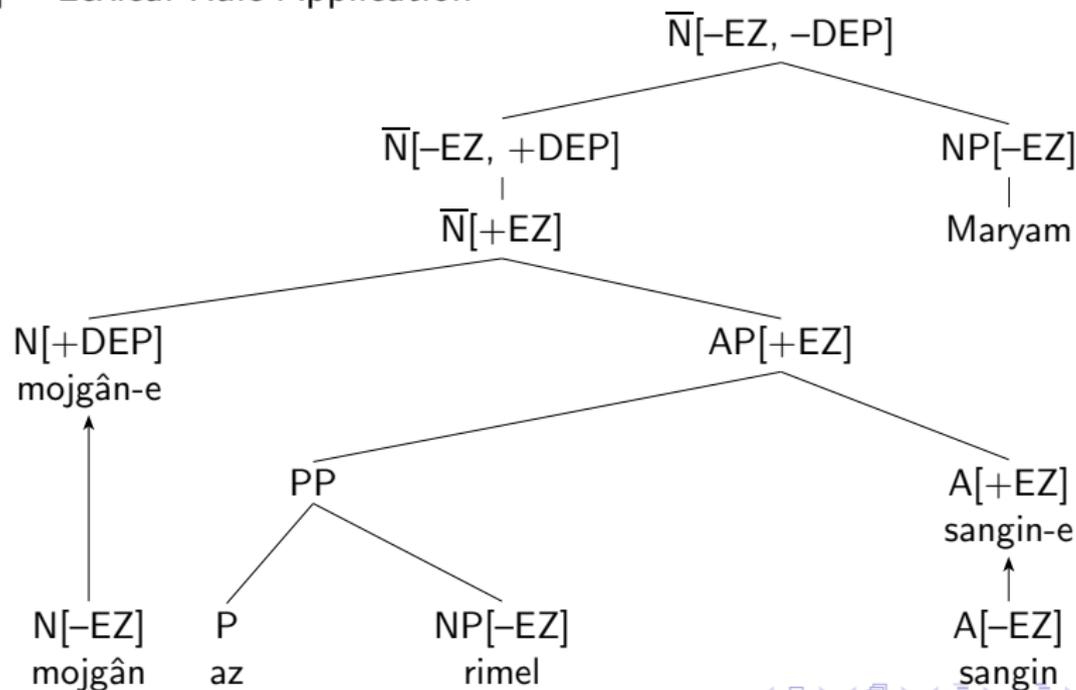
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- When a dependent is found, the [+DEP] feature can be reset to [-DEP].

Persian Ezafe — Samvelian

↑ = Lexical Rule Application



In Contrast...Prosody-Syntax Mismatch

- Bögel and Butt (2012), Bögel *et al.* (2008) analyze the Urdu *ezafe* as a head in the syntax.

Syntax:	[sher	[e	punjaab]]
	lion	'of'	Punjab
Prosody:	[[sher	e]	punjaab]

- Prosodically it cannot stand on its own and therefore cliticizes onto the preceding element (no enclitics in Urdu).
- A case of prosody-syntax mismatch.
- But **not** one of phrasally attaching items within the same component that takes care of word level morphology.

Phrasal Affixation — Anderson

- No integration of prosody in Samvelian's analysis (except indirectly via the EDGE feature).
- The notion of a phrasal affix is articulated by Anderson (2005).
- Anderson is centrally aware of prosody and the phonological component.
- Argues that clitics must be recognized as not being subject to only syntactic manipulation, but as being sensitive to phonological considerations.
- **Also:** points out that a subset of clitics behave like inflectional and derivational morphology, but at a phrasal level.

Phrasal Affixation — Anderson

Anderson on Phrasal Affixes

... by treating special clitics not as lexical items inserted and moved around in the syntax, but rather as phonological material inserted (like affixes) into the phonological content of a phrase. Special clitics express the morphosyntactic properties of a phrase (the content of its functional categories, more or less), or else indicate (in the “derivational” case) modifications to the semantics, discourse properties, and the like, of the phrase. (Anderson 2005, 89)

Phrasal Affixation — Anderson vs. HPSG

- Anderson sees clitics as “morphology of phrases”.
- Develops an OT-account that makes reference to prosody, edges and lexical integrity.
- Looks quite different from what would be needed for “ordinary” morphology.
- The HPSG account bases itself on Anderson’s ideas.
- However, the phrasal affix is dealt with via the same formal tools and representations as that for word level morphology.
- A one off?

Pronominal Clitics — Miller and Sag

- Miller and Sag (1997) treat pronominal clitics as affixes.
Je vous les donne. → *Je-vous-les-donne.*
- The sequences consists of a verb with three affixes: *je*, *vous* and *les*.
- The clitics are arranged in paradigm tables and the words they can attach to must be lexically marked as being able to take the clitics.
- Formal tools: Morphophonological function that takes the verb as input and outputs the verb plus the affixes (clitics).
- Otherwise uses the usual architectural assumptions of HPSG (lexical rules, inheritance hierarchies) and the same representations.

⇒ No separate morphological component.

Pronominal Clitics — Persian Pronominal Clitics

- Persian has pronominal clitics with an interesting distribution (Samvelian and Tseng 2010).
- Usually cliticized onto the verb, but can appear in a limited set of other positions.

Persian Pronominal Clitic

[ru-ye miz] gozâšt-im=aš
 on-EZ table put-1PL-3SG
 We put it on the table.

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Persian Pronominal Clitics

- Samvelian and Tseng (2010) spend quite a bit of time arguing that the pronominal clitics are affixes.
 - Insertion of glide and assimilation between clitic and host.
 - **But:** this can happen within prosodic phrases (not established or investigated) — no argument per se for affixhood.
 - Only one clitic per host → could have to do with foot structure (not established or investigated)
 - Positional restrictions → could have to do with information structure as in Punjabi (not considered)
- **Suspicion:** They are forced into a dubious take on clitics because of the underlying architectural assumptions of HPSG.

Arguments I Don't Understand

- One argument that we have seen advanced in favor of treating clitics/phrasal affixes as being part of the morphological component is that clitics/PAs need access to word-level properties of their host, such as POS, number or gender in order to be able to ensure well-formedness.

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- For example, the Urdu genitive would seem to need access to word properties (find a noun, figure out its number and gender) — “a property that disqualifies it as a clitic” (Anderson 2005, Samvelian 2007 etc.)
- But since **any** type of agreement (e.g., subject-verb, modifier-head) that is generally dealt with in the syntax needs access to information about number, gender, POS, etc., we do not understand this argument. [any help very welcome!]

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Haplology — how does that indicate morphological status?

Architectural Considerations

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- Clitics are however **prosodically** deficient: depend on a host and must be integrated into the prosodic hierarchy (cf. Anderson 2005):
 - prosodic incorporation into the head noun on the left
 - **LFG** with its modular projection architecture allows for a thorough analysis without engendering a need to generate clitics within the morphology (as in HPSG).

Question

- We teach linguistics in a modular way (Phonetics, Phonology, Morphology, Syntax, Semantics, Pragmatics)
- Why does research not follow this otherwise assumed modularity?

Note on Diachrony and Phrasal Affixes

- In **synchronic** terms, the distinction between phrasal affixes vs. other clitics thus seems to be unnecessary.

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- In **synchronic** terms, the distinction between phrasal affixes vs. other clitics thus seems to be unnecessary.
- In **diachronic** terms, however, phrasal affixes seem to be those clitics which are on their way to becoming part of the morphological component (i.e., morphological affixes) — they represent a construction in transition, which accounts for many of their special properties.

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