

Periphrastic verbal forms and clause structure in Agul

Dmitry Ganenkov {d.ganenkov@gmail.com}
Timur Maisak {timur.maisak@gmail.com}
Solmaz Merdanova {merdanov@rambler.ru}

Department of Caucasian languages, Institute of Linguistics (Moscow)

*We regret not being able to attend the meeting and will be grateful for any comments
that would help us to see your impression of the matters discussed in this paper.*

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1. Introduction

AGUL (also spelled AGHUL, native name [aʂu'l č'al]) is a language of the Lezgic branch within the Nakh-Daghestanian (or East Caucasian) family. Its closest relatives are Tabassaran and Lezgian; other Lezgic languages are Tsakhur, Rutul, Budugh, Kryz, Archi and Udi. There are more than 20,000 native speakers of Agul in Russia, mainly in mountain villages in South Daghestan. This study is based on the dialect spoken in the village of Huppuq¹.

Agul is an ergative language with (predominantly) agglutinative morphology and a rich case system (about 30 cases, including numerous locative forms). The basic word order is SOV, dependents precede heads. There is neither nominal class (gender) category, nor person agreement.

The goal of this paper is to discuss the structure of finite clause in Agul. Since Agul possesses a number of verbal periphrastic forms, this cannot be achieved without thorough examination of syntactic behaviour of various periphrastic expressions (cf. other studies investigating constituent structure of periphrastic forms in English and French Abeillé and Godard 2002, Falk 1984, Falk 2008).

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2. Synthetic, primary periphrastic and secondary periphrastic verbal forms

Every non-stative verb in Agul has two aspectual stems (perfective vs. imperfective) marked by vocalic suffixes (-*u*, -*ü*, -*i* vs. -*a*, -*e*); a few aspectual stems are suppletive²:

	PF	IPF		PF	IPF
'do, make'	<i>aq'-u-</i>	<i>aq'-a-</i>	'write'	<i>lik'-i-</i>	<i>lik'-a-</i>
'become'	<i>x-u-</i>	<i>x-a-</i>	'die'	<i>k'-i-</i>	<i>k'-e-</i>
'read, learn'	<i>ruχ-u-</i>	<i>ruχ-a-</i>	'go, come'	<i>ad-i-</i>	<i>ʃ-a-</i>
'boil, cook'	<i>rüx-ü-</i>	<i>rüx-e-</i>	'give'	<i>i-</i>	<i>ic'-a-</i>

Synthetic forms include all basic non-finite categories (converbs, participles, infinitive, masdar) and some non-indicative forms³. Converbs and most participles are derived from each of the two aspectual stems. (Below, the citation form of participles is the substantivized form in *-f*, which is also used in periphrastic constructions.)

	PF	IPF
Infinitive	—	<i>ruχ-á-s</i>
Converb	<i>ruχ-ú-na</i>	<i>ruχ-á-j</i>
Participle1	<i>ruχ-ú(-f)</i>	<i>ruχ-á(-f)</i>
Participle2	<i>ruχ-ú-naje(-f)</i>	<i>ruχ-á-je(-f)</i>
Participle3	<i>ruχ-ú-nde(-f)</i>	<i>ruχ-á-jde(-f)</i>
Optative Participle	—	<i>ruχ-á-že(-f)</i>
Masdar (action nominal)	<i>ruχ-ú-b</i>	—
Jussive	<i>ruχ-ú-raj</i>	—
Future Conditional	<i>ruχ-ú-či</i>	—
Prohibitive	—	<i>ma-rüχ-a</i>

The overwhelming majority of finite forms, including all indicative forms, are **periphrastic in origin**. They are built on one of the 7 non-finite forms that are framed in (2) and one of two auxiliaries — the nominal copula *e* or the locative verb *a* ‘be inside’, whose use is illustrated below:

- (3) *ba*dad *šahar* p:ara *gürček*, p:ara *bat’ar* *šahar* *e*.
 Baghdad city much beautiful much good-looking city COP
Baghdad is a very beautiful, good-looking city.

- (4) *sa* *gada* *lelingrad.di* *a*, uč.i-n *xir* qa-j...
 one son Leningrad(IN) {IN}be:PRS self-GEN wife {POST}be-CONV
One son lives (=is) in Leningrad, with his wife...

The models of primary periphrasis (“main verb + auxiliary”) are the following:

- converb + locative verb,
- converb + nominal copula,
- participle1/2 (subst.) + nominal copula,
- infinitive + nominal copula.

² Stative verbs (including *ha-* ‘know’, *it:a-* ‘be ill, ache’, *guč'a-* ‘be afraid’, *k:ande-* ‘want, love, need’, nominal copula and a group of locative statives) have only one stem, which roughly corresponds to the imperfective stem of non-stative verbs. (We do not consider them below.)

³ The only synthetic form which is not based on the aspectual stem is the Imperative, which is usually identical with the verbal root; several verbs have vocalic Imperative suffixes or suppletive Imperative forms. Statives do not have Imperatives.

As the auxiliary appears in the present or the past tense, it gives the paradigm of 18 **primary periphrastic forms**⁴: 8 forms with converbs, 8 forms with participles and two forms with the infinitive (cf. Table 1). The use of some of these forms is illustrated in (5)-(10) below.

The auxiliary follows the non-finite form. Negative periphrastic forms use suppletive negative auxiliaries (cf. copula *dawa*, locative verb *adawa* in the Present, and copula *duj*, locative verb *aduj* in the Past), while synthetic forms derive negative equivalents by means of a prefix *d-* || *da-*: cf. negative infinitive *d-aq'-a-s*, negative imperfective converb *d-aq'-a-j* etc.

Presumably, periphrastic forms go back to nominal predictions (like ‘X is the one who does it’) and locative predictions (like ‘X is in the process of doing’). However, it is clear that we deal with periphrastic forms as members of tense and aspect paradigm, and not with free syntactic combinations of non-finite forms and stative verbs at least for two reasons:

- the predicate’s argument structure and case marking is determined by the main verb, not but the nominal copula or locative verb,
- the combinations of non-finite forms and auxiliaries are rather idiomatic and denote the situation named by the main verb (with the associated tense-aspect and modal semantics), they are not identity or locative statements.

• General Present

(5)	axp:a	bagajmi	ha-ge	miras-ar-i	χ-a-ja	χunča-jar.
	then	in.the.morning	ha-DEMG	relative-PL-ERG	bring-IPF-PRS	tray-PL

Then in the morning {of the wedding ceremony} relatives bring trays with the gifts.

• Present Resultative

(6)	Hup:aqan-di	k'-i-na-a	qat:k'.a-s	ad.i-naje	ušri.
	shepherd-ERG	kill-PF-RES-PRS	steal.IPF-INF	come.PF-PART2	thief

The shepherd killed the thief, who came to steal.

• Present Habitual (here, as ‘historical present’)

(7)	...me	xir.a-s	ag.-a-j-e	ʔemk'.
	DEMM	wife-DAT	see-IPF-CONV-COP	dream

...and this woman has (= sees) a dream.

• Experiential

(8)	...aw,	ha-gi-štii	unx-u-f-e	sara	za-s.
	yes	ha-DEMG-ADV	hear-PF-A-COP	PTCL	I-DAT

Yes, at least this is what I heard.

• Present Generic

(9)	za-s	ge	žiga	k:anx.a-f-t:awa	p.u-ne.
	I-DAT	DEMG	place	like.IPF-A-COP:NEG	say.PF-PFT

I don't like this place, said she.

• Future

(10)	zun	hal	qat:aq'-a-s-e	č.a-s	sa	hakijat	žaq'.ala-k-as.
	I	now	tell-IPF-INF-COP	you(SG)-DAT	one	tale	sparrow-SUB/CONT-ELAT

And now I will tell you a fairy-tale about one sparrow.

⁴ Below we show that the primary periphrastic forms have morphologized to such a considerable degree that in most instances they appear as synthetic forms, rather than strictly speaking periphrastic.

Table 1. Primary periphrastic forms.

		Perfective	Imperfective
Converb	+ present copula <i>e</i>	<i>ruχun-e</i> (< * <i>ruχuna e</i>)	<i>ruχaj-e</i>
Converb	+ past copula <i>ij</i>	<i>ruχun-ij</i> (< * <i>ruχuna ij</i>)	<i>ruχaj-i</i> (< * <i>ruχaj ij</i>)
Converb	+ present <i>a</i> ‘is in’	<i>ruχuna-a</i>	<i>ruχaj-a</i>
Converb	+ past <i>aji</i> ‘was in’	<i>ruχuna-ji</i> (< * <i>ruχuna aji</i>)	<i>ruχaj-i</i> (< * <i>ruχaj aji</i>)
Participle1	+ present copula <i>e</i>	<i>ruχuf-e</i>	<i>ruχaf-e</i>
Participle1	+ past copula <i>ij</i>	<i>ruχuf-ij</i>	<i>ruχaf-ij</i>
Participle2	+ present copula <i>e</i>	<i>ruχunajef-e</i>	<i>ruχajef-e</i>
Participle2	+ past copula <i>ij</i>	<i>ruχunajef-ij</i>	<i>ruχajef-ij</i>
Infinitive	+ present copula <i>e</i>	—	<i>ruχas-e</i>
Infinitive	+ past copula <i>ij</i>	—	<i>ruχas-ij</i>

Apart from the primary periphrastic forms, Agul possesses a rich set of **secondary periphrastic forms**, which contain as the auxiliary the regular verb *xas* ‘be, become’ in one of the 18 primary forms. The lexical use of *xas* is illustrated below:

- (11) ürsün šuj birgadir x-u-ne.
 Ursun man team.leader become-PF-PFT
The man from Ursun became team-leader.

Secondary forms are also built on one of the 7 non-finite forms which are framed in (2), cf. Table 2. However, they are much more peripheral than those of the core indicative paradigm, and their formation is more restricted: among 126 theoretically possible combinations, only about a half can be really used in speech, and only some of them are really frequent. In particular, the problematic secondary forms are:

- most forms that consist of a participle of the main verb and the auxiliary *xas* ‘become’ in one of the primary forms, based on a participle (e.g. *?ruχaf xuf-e*),
- most forms that include the auxiliary *xas* ‘become’ in one of the primary forms, based on a past auxiliary (e.g. *?ruχaf xun-ij*),
- most forms with the infinitive of the main verb (only forms with the auxiliary in the Perfective Past and Experiential are grammaticalized with the ‘avertive’ meaning).

The use of some of secondary forms forms is illustrated below.

- Imperfective Converb + *xas* (Imperfect)
- (12) te čiwin.i-q, gažin.i-q kalašan – zat’ qit’-a-j x-a-ji.
 DEMT jug-POST jug-POST shawl thing {POST}tie-IPF-CONV become-IPF-PST
{During wedding ceremony} they used to tie a shawl or a thing like that to a jug, a jug.
- Imperfective Converb + *xas* (Present Resultative)
- (13) hür.i-s hamisha χar jarh-a-j x-u-na-a.
 village-DAT always hail beat-IPF-CONV become-PF-RES-PRS
The hail has often beaten the village.
- Imperfective Converb + *xas* (Experiential)
- (14) muja-d-pu k:las ha-ti-sa-? ruχ-a-j x-u-f-e.
 eight-A-ORD class ha-DEMT-LOC-IN study-IPF-CONV become-PF-A-COP
We studied there in the eighth class.

- Perfective Converb + *xas* (Present Habitual)

(15) ...wuri	alčaq-u-na	x-a-j-e	mi-sa-?
	{SUPER-LAT}scatter-PF-CONV	become-IPF-CONV-COP	DEMM-LOC-IN

...it turned out that all (the birds) could be found there.

- Perfective Converb + *xas* (Future)

(16) wun	qaj-i-guna,	zun k'ež	lik'-i-na	x-a-s-e.
you(SG)	RE:come-PF-TEMP	I	letter	write-PF-CONV

When you come, I will have written the letter.

- Infinitive + *xas* (Perfective Past)

(17) gada-ji	naft:	uχ-a-s	x-u-ne.
boy-ERG	kerosene	drink-IPF-INF	become-PF-PFT

The boy almost drank (=was just about to drink) kerosene.

3. Ambiguous nature of periphrastic forms

Being originally periphrastic, forms from Table 1 have morphologized to a considerable degree and most often appear in speech as **contracted/synthetic** (“monolectic”) word forms:

- (former) main verbs and auxiliaries are adjacent and cannot be separated by other material, or occur in the reversed order (auxiliary + main verb);
- these forms represent single prosodic words, where (former) auxiliaries are atonic, or bear secondary stress;
- in some cases, typical word-internal sandhi occur:

/d/ > /t/ in the negative auxiliary after voiceless consonants, here the substantivization marker /f/ and the infinitive marker /s/:

ruxaf-tawa (< *ruxaf dawa), *ruxaf-truj* (< *ruxaf duj),
ruxas-tawa (< *ruxas dawa), *ruxas-truj* (< *ruxas duj), etc.

- in some cases, (former) auxiliaries undergo vowel change which blurs their original form:

/a/ > /e/, /u/ > /i/ in the negative auxiliary after imperfective converb marker /j/:

ruxaj-dewa (< *ruxaj dawa), *ruxaj-diij* (< *ruxaj duj)

- in some cases, (former) main verb and auxiliary undergo fusion that blurs morpheme boundaries (and in one case leads to syncretism):

Contraction of the perfective converb with the copula:

ruxune (< *ruxuna e), *ruxundawa* (< *ruxuna dawa), etc.

Contraction of forms with the locative auxiliary:

ruxaa (< *ruxaj a), *ruxadawa* (< *ruxaj adawa), etc.

Due to the fusion, affirmative Past Habitual and Imperfect are syncretized:

ruxaji (< *ruxaj aji) = *ruxaji* (< *ruxaj ij)

{NB: the negative forms are different, cf.

ruxaduj (< *ruxaj aduj) vs. *ruxaj-diij* (< *ruxaj duj)}

Table 2. Secondary periphrastic forms with participles and converbs.

PF / IPF converb <i>ruχuna / ruχaj</i>	PF / IPF participle1 <i>ruχuf / ruχaf</i>	PF / IPF participle2 <i>ruχunajef / ruχajef</i>	← Main verb Auxiliary ↓
<i>ruχuna xune</i>	<i>ruχuf xune</i>	<i>ruχunajef xune</i>	<i>xune</i>
<i>ruχaj xune</i>	<i>ruχaf xune</i>	<i>ruχajef xune</i>	
<i>ruχuna xunij</i>	<i>ruχuf xunij</i>	? <i>ruχunajef xunij</i>	<i>xunij</i>
<i>ruχaj xunij</i>	? <i>ruχaf xunij</i>	? <i>ruχajef xunij</i>	
<i>ruχuna xunaa</i>	<i>ruχuf xunaa</i>	<i>ruχunajef xunaa</i>	<i>xunaa</i>
<i>ruχaj xunaa</i>	? <i>ruχaf xunaa</i>	<i>ruχajef xunaa</i>	
? <i>ruχuna xunaji</i>	<i>ruχuf xunaji</i>	? <i>ruχunajef xunaji</i>	<i>xunaji</i>
? <i>ruχaj xunaji</i>	? <i>ruχaf xunaji</i>	? <i>ruχajef xunaji</i>	
<i>ruχuna xufe</i>	? <i>ruχuf xufe</i>	? <i>ruχunajef xufe</i>	<i>xufe</i>
<i>ruχaj xufe</i>	? <i>ruχaf xufe</i>	? <i>ruχajef xufe</i>	
<i>ruχuna xufij</i>	? <i>ruχuf xufij</i>	? <i>ruχunajef xufij</i>	<i>xufij</i>
<i>ruχaj xufij</i>	? <i>ruχaf xufij</i>	? <i>ruχajef xufij</i>	
<i>ruχuna xunajefe</i>	? <i>ruχuf xunajefe</i>	? <i>ruχunajef xunajefe</i>	<i>xunajefe</i>
<i>ruχaj xunajefe</i>	? <i>ruχaf xunajefe</i>	? <i>ruχajef xunajefe</i>	
? <i>ruχuna xunajefij</i>	? <i>ruχuf xunajefij</i>	? <i>ruχunajef xunajefij</i>	<i>xunajefij</i>
? <i>ruχaj xunajefij</i>	? <i>ruχaf xunajefij</i>	? <i>ruχajef xunajefij</i>	
<i>ruχuna xaje</i>	<i>ruχuf xaje</i>	<i>ruχunajef xaje</i>	<i>xaje</i>
<i>ruχaj xaje</i>	? <i>ruχaf xaje</i>	<i>ruχajef xaje</i>	
<i>ruχuna xaji</i>	<i>ruχuf xaji</i>	<i>ruχunajef xaji</i>	<i>xaji</i>
<i>ruχaj xaji</i>	? <i>ruχaf xaji</i>	<i>ruχajef xaji</i>	
<i>ruχuna xaa</i>	<i>ruχuf xaa</i>	<i>ruχunajef xaa</i>	<i>xaa</i>
<i>ruχaj xaa</i>	? <i>ruχaf xaa</i>	<i>ruχajef xaa</i>	
<i>ruχuna xaji</i>	<i>ruχuf xaji</i>	<i>ruχunajef xaji</i>	<i>xaji</i>
<i>ruχaj xaji</i>	? <i>ruχaf xaji</i>	<i>ruχajef xaji</i>	
<i>ruχuna xafe</i>	<i>ruχuf xafe</i>	<i>ruχunajef xafe</i>	<i>xafe</i>
<i>ruχaj xafe</i>	? <i>ruχaf xafe</i>	<i>ruχajef xafe</i>	
<i>ruχuna xafij</i>	<i>ruχuf xafij</i>	? <i>ruχunajef xafij</i>	<i>xafij</i>
<i>ruχaj xafij</i>	? <i>ruχaf xafij</i>	? <i>ruχajef xafij</i>	
<i>ruχuna xajefe</i>	<i>ruχuf xajefe</i>	? <i>ruχunajef xajefe</i>	<i>xajefe</i>
<i>ruχaj xajefe</i>	? <i>ruχaf xajefe</i>	? <i>ruχajef xajefe</i>	
<i>ruχuna xajefij</i>	<i>ruχuf xajefij</i>	? <i>ruχunajef xajefij</i>	<i>xajefij</i>
<i>ruχaj xajefij</i>	? <i>ruχaf xajefij</i>	? <i>ruχajef xajefij</i>	
<i>ruχuna xase</i>	<i>ruχuf xase</i>	<i>ruχunajef xase</i>	<i>xase</i>
<i>ruχaj xase</i>	<i>ruχaf xase</i>	<i>ruχajef xase</i>	
<i>ruχuna xasij</i>	<i>ruχuf xasij</i>	<i>ruχunajef xasij</i>	<i>xasij</i>
<i>ruχaj xasij</i>	? <i>ruχaf xasij</i>	<i>ruχajef xasij</i>	

Some of the originally periphrastic forms can now have only this contracted/synthetic shape. Such forms are e.g. negative Present Habitual and negative Past Habitual, which originally include converb and nominal copula. The components of such forms have lost any autonomy.

However, most other primary forms can appear both as contracted/synthetic and as “true” periphrastic. In the latter case the component parts (a converb/participle/infinitive and an auxiliary) are at least prosodically, or both prosodically and syntactically, autonomous.

Originally periphrastic constructions occur as two-word combinations in the following cases:

- for those forms that include the auxiliary *a* (locative verb) the use of the autonomous, non-contracted auxiliary is just a **free option**, without any special semantic or pragmatic nuance; two-word variants are much rarer and are mostly used by elder speakers:

(18)	c'eh-er	uz-a-j	a	sa	azal.i-?	hup:aqan-ar-i.
	goat-PL	milk-IPF-CONV	{IN}be:PRS	one	cattle.pen-IN	shepherd-PL-ERG
‘Shepherds milk goats in cattle-pens.’ (Present)						

- auxiliary appears as an autonomous form with contrastive stress in the construction with the **predicate topicalization**; this is possible even for Perfective Past and Remote Past, but not for their negative counterparts, neither for negative Present Habitual and Past Habitual:

(19)	ax.a-j	á	li-št:-ar	gada-ji...
	say.IPF-CONV	{IN}be:PRS	DEMG-ADV-PL	boy-ERG
‘As for saying, the boy does say such things... {but, e.g., never does as he says}’ (Present)				

(20)	hal	mi	q'-a-je-f	é	sühür.
	now	DEMM(ERG)	do-IPF-PART2-A	COP	witchcraft
‘And he does practise witchcraft.’ (Participial Present)					

(21)	ag-u-naje-f	é	mi-s,	up.u-či	mi-s	guč'-x.a-s-e.
see-PF-PART2-SUBST COP DEMM-DAT say.PF-COND DEMM-DAT afraid-become.IPF-INF-COP ‘He did see (this), but if they tell him, he will get afraid.’ (Participial Resultative)						

(22)	rux-u-n	é	zun,	amma	χuralas	haraq'.u-ndawa.
	read-PF-CONV	COP	I	but	by.heart	learn.PF-PFT:NEG

‘As for reading, I did read it, but I didn’t learn it by heart.’ (Perfective Past: note that there is no such independent form as *ruxun*, which here seems to be just a split-off part of a contracted form *ruxúne*)

- components of most forms appear separately, when used in a number of syntactic constructions, cf. cases when the **additive particle** =*ra* ‘and, also, even’ occurs on the main verb (see below for more details):

(23)	ja	ag-u-f=ra	dawa,	ja	unx-u-f=ra	dawa,
	or	see-PF-A=ADD	COP:NEG	or	hear-PF-A=ADD	COP:NEG

ja zun sa fi=ra a&-a-f=ra dawa.
 or I one what=ADD say-IPF-A=ADD COP:NEG

'I haven't seen and haven't heard it, and I am not going to say anything.' (Experiential Present, Experiential Present, Generic Present – all negative)

Full and contracted variants of originally periphrastic forms are listed in Table 3 (note that the conditions of use of full variants can be different for different forms).

Table 3. Primary periphrastic forms: full and contracted variants.

	Perfective		Imperfective	
	affirmative	negative	affirmative	negative
Converb	Perfective past		Present Habitual	
	<i>ruχun e</i>	—	<i>ruχaj e</i>	—
	<i>ruχune</i>	<i>ruχundawa</i>	<i>ruχaje</i>	<i>ruχajdewa</i>
	Remote past		Past Habitual	
	<i>ruχun ij</i>	—	<i>ruχaj ij</i>	—
Converb	Present Resultative		Present	
	<i>ruχuna a</i>	<i>ruχuna adawa</i>	<i>ruχaj a</i>	<i>ruχaj adawa</i>
	<i>ruχunaa</i>	<i>ruχunadawa</i>	<i>ruχaa</i>	<i>ruχadawa</i>
	Past Resultative		Imperfect	
	<i>ruχuna aji</i>	<i>ruχuna aduj</i>	<i>ruχaj aji</i>	<i>ruχaj aduj</i>
Participle1	Experiential past		Present Generic	
	<i>ruχuf e</i>	<i>ruχuf dawa</i>	<i>ruχaf e</i>	<i>ruχaf dawa</i>
	<i>ruχufe</i>	<i>ruχuft:awa</i>	<i>ruχafe</i>	<i>ruχaft:awa</i>
	Non-actual Experiential		Past Generic	
	<i>ruχuf ij</i>	<i>ruχuf duj</i>	<i>ruχaf ij</i>	<i>ruχaf duj</i>
Participle2	Participial Resultative		Participial Present	
	<i>ruχuna ajef e</i>	<i>ruχuna ajef dawa</i>	<i>ruχaj ajef e</i>	<i>ruχaj ajef dawa</i>
	<i>ruχunajefe</i>	<i>ruχunajeft:awa</i>	<i>ruχajefe</i>	<i>ruχajeft:awa</i>
	Participial Past Resultative		Participial Imperfect	
	<i>ruχuna ajef ij</i>	<i>ruχuna ajef duj</i>	<i>ruχaj ajef ij</i>	<i>ruχaj ajef duj</i>
Infinitive	<i>ruχunajefij</i>	<i>ruχunajeft:uj</i>	<i>ruχajefij</i>	<i>ruχajeft:uj</i>
	—		Future	
	<i>ruχas e</i>		<i>ruχas e</i>	<i>ruχas dawa</i>
	<i>ruχase</i>		<i>ruχase</i>	<i>ruχast:awa</i>
	Irrealis		<i>ruχas ij</i>	<i>ruχas duj</i>
	<i>ruχasij</i>		<i>ruχasij</i>	<i>ruχast:uj</i>

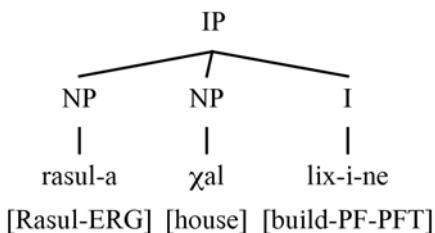
The number of parts into which a periphrastic form splits depends on the original structure of the form. Maximally, a periphrastic form can repeat the original structure. For forms originally consisting of more than two parts, several split variants are possible:

(24)	form	original structure	split variant(s)
	ruχaje	ruχaj e	ruχaj e
	ruχajefe	ruχaj ajef e	ruχaj ajef e ruχaj ajefe ruχajef e
	ruχaj xajefe	ruχaj xaj ajef e	ruχaj xaj ajef e ruχaj xajef e ruχaj xaj ajefe

4. Syntactic structure of the finite clause headed by a contracted / morphologized verbal form

The structure of the finite clause headed by a contracted / morphologized verbal form is not very interesting. With regard to word order, the verbal head of a transitive clause does not seem to form a constituent with the object NP. Other syntactic tests (coordination, focus construction etc.) are not applicable to finite verb. By the presumption of innocence, this suggests a flat structure like the following:

Figure 1. Flat structure of the finite clause headed by a morphologized form

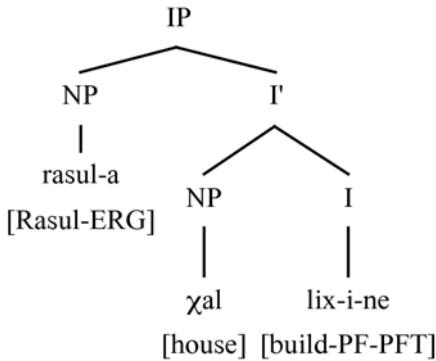


As for word order, all six logically possible orders are grammatical (the choice between different order depends on information structure):

- (25) a. rasul-a χal lix-i-ne.
 Rasul-ERG house build-PF-PFT
 ‘Rasul built a house.’
- b. rasula lixine χal.
- c. lixine rasula χal.
- d. lixine χal rasula.
- e. χal lixine rasula.
- d. χal rasula lixine.

However, some ellipsis facts (not to be discussed here) indicate that the object NP may be structurally closer to the head than the subject NP, suggesting a structure like shown on Figure 2.

Figure 2. Hierarchical structure of the finite clause headed by a morphologized form



In any case, structural assymmetries between subject and object NPs are not so strong.

5. Syntactic structure of periphrastic constructions

In contrast to morphologized forms, syntactic behaviour of periphrastic forms points to a more complex constituent structure than Figures 1 and 2 demonstrate. Moreover, periphrastic forms do not show a uniform behaviour with respect to syntactic tests.

In order to reveal the constituent structure of clauses headed by periphrastic forms in Agul, we use the following syntactic tests:⁵

- Insertion of the additive particle =*ra* ‘and, also, even’ between V and I
- Head ellipsis (gapping)
- I as morphosyntactic locus (embedding of the clause with a periphrastic form under the matrix verb *haa* ‘know’)
- VP coordination
- Word order

Below we confine the discussion to several primary and secondary periphrastic forms:

A. Durative Present in two variants:

A1. *ruxaj xaa* (imperfective converb of V + *xaa*)

A2. *ruxaj xaj a* (imperfective converb of V + imperfective converb of *xas* + *a*)

B. General Present (*ruxaa*: imperfective converb + *a*)

C. Present Habitual (*ruxaje*: imperfective converb + *e*)

D. Generic Present (*ruxafe*: imperfective participle 1 + *e*)

E. Participial Present in two variants:

E1. *ruxajef e* (imperfective participle 2 + *e*)

E2. *ruxaj ajefe* (imperfective participle 2 + Participial Present of *a*)

F. Future (*ruxase*: infinitive + *e*)

G. Perfective Past (*ruxune* < **ruxuna e*)

⁵ Below and until section 7, we use I as a label for the finite part and V as a label for the non-finite part (converb, participle, infinitive) of periphrastic forms. In case there are several non-finite parts they are distinguished by means of a subscript index.

5.1. Insertion of the additive particle =ra between V and I⁶

(26)

- A1. gada-ji kitab **ruχ-a-j=ra** x-a-a.
boy-ERG book read-IPF-CONV=ADD become-IPF-PRS
- A2. gada-ji kitab **ruχ-a-j** x-a-j=ra a.
boy-ERG book read-IPF-CONV become-IPF-CONV=ADD {IN}be:PRS
'The boy is also reading a book.'
- B. gada-ji kitab **ruχ-a-j=ra** a.
boy-ERG book read-IPF-CONV=ADD {IN}be:PRS
'The boy is also reading a book.'
- C. gada-ji kitab **ruχ-a-j=ra** e...
boy-ERG book read-IPF-CONV=ADD COP:PRS
'The boy also reads a book.'
- D. gada-ji kitab **ruχ-a-f=ra** e...
boy-ERG book read-IPF-S=ADD COP:PRS
'The boy reads a book.'
- E1. gada-ji kitab **ruχ-a-je-f=ra** e...
boy-ERG book read-IPF-PART2-S=ADD COP:PRS
- E2. gada-ji kitab **ruχ-a-j=ra** a-je-f-e...
boy-ERG book read-IPF-CONV=ADD {IN}be-PART-S-COP
'The boy also reads a book.'
- F. gada-ji kitab **ruχ-a-s=ra** e...
boy-ERG book read-IPF-INF=ADD COP:PRS
'The boy will also read a book.'
- G. *gada-ji kitab **ruχ-u-n=ra** e...
boy-ERG book read-PF-PFT=ADD COP:PRS
'The boy also read a book.'

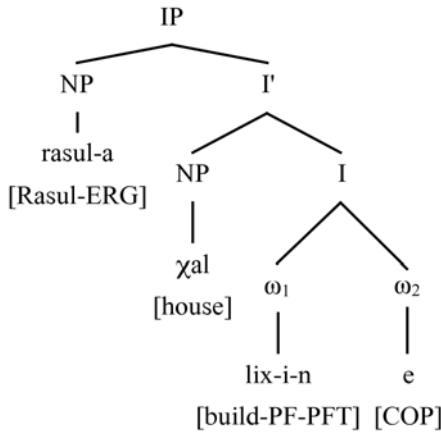
These examples show that the additive particle can be inserted between V and I in almost all periphrastic forms, except for Perfective Past (and also Remote Past). This can be taken as evidence that most forms are periphrastic not only prosodically, but also syntactically, i.e. parts of periphrastic forms occupy two different terminal nodes in the phrase structure.⁷

On the contrary, Perfective Past is interesting in that it demonstrates purely prosodic split into two phonological words, which do not count as words in syntax. This behaviour is confirmed by all the tests we employ here (examples see below), so that we propose the structure on Figure 3 for 'periphrastic' Perfective Past.

⁶ Below we mostly ignore the pragmatic information conveyed by periphrastic realizations and give only translations of propositional content of the corresponding forms.

⁷ Some languages, such as Portuguese and Udi, are known to have 'mesoclitics' or 'endoclitics', i.e. clitics that can appear inside (synthetic) words, cf. Luís 2009. However, here, we assume that the insertion of =ra is not the case of mesoclisis/endoclisis in Agul and that it cannot be placed inside a word.

Figure 3. ‘Periphrastic’ Perfective Past⁸.



5.2. Head ellipsis (gapping)

(27)

- A1. gada-ji kitab **rux-a-j=ra** x-a-a, k'ež lik'-a-j=ra.
boy-ERG book read-IPF-CONV=ADD become-IPF-PRS letter write-IPF-CONV=ADD
- A2. *gada-ji kitab **rux-a-j** **x-a-j=ra** a, k'ež
boy-ERG book read-IPF-CONV=ADD become-IPF-PRS=ADD {IN}be:PRS letter
lik'-a-j **x-a-j=ra**.
write-IPF-CONV become-IPF-CONV=ADD
'The boy was reading a book and writing a letter.'
- B. gada-ji kitab **rux-a-j=ra** a, k'ež lik'-a-j=ra.
boy-ERG book read-IPF-CONV=ADD {IN}be:PRS letter write-IPF-CONV=ADD
'The boy is reading a book and writing a letter.'
- C. gada-ji **rux-a-j=ra** e, lik'-a-j=ra.
boy-ERG read-IPF-CONV=ADD COP:PRS write-IPF-CONV=ADD
'The boy (usually) reads and writes.'⁹
- D. gada-ji **rux-a-f=ra** e, lik'-a-f=ra.
boy-ERG read-IPF-S=ADD COP:PRS write-IPF-S=ADD
'The boy (usually) reads and writes.'
- E1. gada-ji **rux-a-je-f=ra** e, lik'-a-je-f=ra.
boy-ERG read-IPF-PART2-S=ADD COP:PRS write-IPF-PART2-S=ADD
- E2. gada-ji **rux-a-j=ra** a-je-f-e, lik'-a-j=ra.
boy-ERG read-IPF-CONV=ADD {IN}be-PART-S-COP write-IPF-CONV=ADD
'The boy (usually) reads and writes.'

⁸ ω stands for phonological word.

⁹ This example and other examples in this subsection are given without an object NP, since such sentences, though grammatically correct, are judged to be too complex and unnatural by native speakers.

- F. *gada-ji **rux-a-s=ra** e, lik'-a-s=ra.
 boy-ERG read-IPF-INF=ADD COP:PRS write-IPF-INF=ADD
 ‘The boy will read and write.’

- G. *gada-ji kitab **rux-u-n=ra** e, k'e᷑ lik'-i-n=ra.
 boy-ERG book read-PF-PFT=ADD COP:PRS letter write-PF-PFT=ADD
 ‘The boy read a book and wrote a letter.’

This diagnostics shows that the copula *e* does not constitute the clausal head by itself in split Durative Present, Future, and Perfective Past, while the auxiliaries *e*, *a* and *xaa* do so in unsplit Durative Present, Present, Habitual, Generic Present, and Participial Present. This result is expected for Perfective Past. We suppose that in split Durative Present and Future the copula forms a verbal cluster (VC) with the preceding non-finite form, which serve together as a complex head, cf. Figures 4 and 5.

Figure 4. Auxiliary as a clausal head.

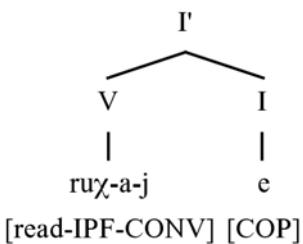
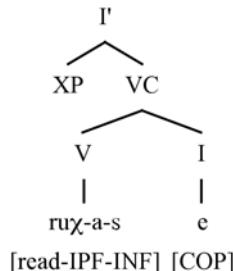


Figure 5. Verbal cluster as a clausal head.



5.3. Morphosyntactic locus

According to Zwicky (1985: 6), the morphosyntactic locus is:

- “the bearer of the morphosyntactic marks of syntactic relations between the construct and other syntactic units”;
 “the constituent on which inflectional features will be marked if the language has the appropriate morphology”.

If the whole clause is embedded under the matrix verb *haa* ‘know’ as its complement, the head of the complement clause is in the form of a substantivized participle.

- (28) za-s ha-a...
 I-DAT know-PRS
 ‘I know...’

- A1. gada-ji kitab **rux-a-j** x-a-f.
 boy-ERG book read-IPF-CONV become-PF:PART1-SUBST
- A2. gada-ji kitab **rux-a-j** x-a-j a-je-f.
 boy-ERG book read-IPF-CONV become-IPF-CONV {IN}be:PRS-PART-S
 ‘that the boy is reading a book.’

- B. gada-ji kitab **rux-a-j** a-je-f.
 boy-ERG book read-IPF-CONV {IN}be-PART-S
 ‘that the boy is reading a book.’
- C. gada-ji kitab **rux-a-j** i-de-f.
 boy-ERG book read-IPF-CONV COP-PART-S
 ‘that the boy (usually) reads a book.’
- D. gada-ji kitab **rux-a-f** i-de-f.
 boy-ERG book read-IPF-S COP-PART-S
 ‘that the boy (usually) reads a book.’
- E1. gada-ji kitab **rux-a-je-f** i-de-f.
 boy-ERG book read-IPF-PART2-S COP-PART-S
- E2. gada-ji kitab **rux-a-j** a-je-f.
 boy-ERG book read-IPF-CONV {IN}be-PART-S
 ‘that the boy (usually) reads a book.’
- F. *gada-ji kitab **rux-a-s** i-de-f.
 boy-ERG book read-IPF-INF COP-PART-S
 ‘that the boy will read a book.’
- G. *gada-ji kitab **rux-u-n** i-de-f.
 boy-ERG book read-PF-PFT COP-PART-S
 ‘that the boy read a book.’

This test yields the same results as the head ellipsis test in all the cases, save A2. This is not unexpected, since it is actually one of typical functions of head to serve as morphosyntactic locus:

- (i) if the auxiliary is a head by itself (unsplit Durative Present, General Present, Present Habitual, Generic Present, and Participial Present), then it naturally can be the morphosyntactic locus;
- (ii) if the auxiliary forms a verbal cluster with the verb (split Durative Present, Future), then we do not expect the auxiliary to be the morphosyntactic locus of the clause.

However, the second expectation is not fully borne out by the facts, since only in Future the auxiliary cannot serve as a morphosyntactic locus. Instead, the verb is in the form of the substantivized participle 1:

- F'. gada-ji kitab **rux-a-f.**
 boy-ERG book read-IPF-S
 ‘that the boy will read a book.’

Contrary to our expectations, clauses with A2 (split Durative Present), when inserted under the matrix verb *haa* ‘know’, have the auxiliary *a* in participle. This contrast between Future and split Durative Present suggests that there are two types of verbal clusters in Agul with different syntactic properties. Note the lexical verb is inside the verb cluster in Future, but outside it in split Durative Present, cf. Figures 6 and 7.

Figure 6. Verbal cluster in Future.

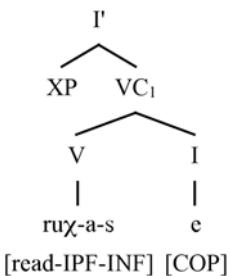
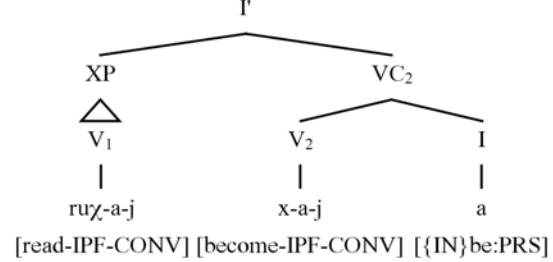


Figure 7. Verbal cluster in split Durative Present.



5.4. Coordination

The particle *=na* is used in Agul to coordinate both lexical categories and maximal projections. In the latter case it attaches to the head of a constituent.

(29)

- A1. *?gada-ji [kitab ruχ-a-j]=na [k'ež lik'-a-j] x-a-a.*¹⁰
 boy-ERG book read-IPF-CONV=COORD letter write-IPF-CONV become-IPF-PRS
 'The boy is reading a book and writing a letter.'
- **k'ež [gada-ji lik'-a-j]=na [ruš-a ruχ-a-j] x-u-ne.*
 letter boy-ERG write-IPF-CONV=COORD girl-ERG read-IPF-CONV become-PF-PFT
 'The boy was writing and the girl was reading a letter.'
- A2. **gada-ji [kitab ruχ-a-j x-a-j]=na [k'ež lik'-a-j]*
 boy-ERG book read-IPF-CONV become-IPF-CONV=COORD letter write-IPF-CONV
x-a-j] a.
 become-IPF-CONV {IN}be:PRS
 'The boy is reading a book and writing a letter.'
- B. *ruš-a [jamak rüx-e-j]=na [guni už-a-j] a.*
 girl-ERG food cook-IPF-CONV=COORD bread bake-IPF-CONV {IN}be:PRS
 'The girl is cooking food and baking bread.'
- C. *ruš-a [jamak rüx-e-j]=na [guni už-a-j] e.*
 girl-ERG food cook-IPF-CONV=COORD bread bake-IPF-CONV COP:PRS
 'The girl (usually) cooks food and bakes bread.'
- D. *?ruš-a [jamak rüx-e-f]=na [guni už-a-f] e.*
 girl-ERG food cook-IPF-S=COORD bread bake-IPF-S COP:PRS
 'The girl (usually) cooks food and bakes bread.'

¹⁰ Sentences of this type are grammatically possible, but sound unnatural and too complex to native speakers, so they bear at least one question mark. However, what is important for us here is the asymmetry between subject and object NPs and the contrast between absolute ungrammaticality and at least marginal acceptability. Lexical choice also plays a (not yet understood) role in such contexts.

- E1. ^{?"}ruš-a [jamak rüx-e-je-f]=na [guni už-a-je-f] e.
 girl-ERG food cook-IPF-PART2-S=COORD bread bake-IPF-PART2-S COP:PRS
 E2. ruš-a [jamak rüx-e-j]=na [guni už-a-j] a-je-f-e.
 girl-ERG food cook-IPF-PART2-S=COORD bread bake-IPF-PART2-S {IN}be-PART-S-COP
 'The girl cooks food and bakes bread.'

- F. *gada-ji [kitab-ar ~~rux-a-s~~]=na [k'ež-ar lik'-a-s] e.
 boy-ERG book-PL read-IPF-INF=COORD letter-PL write-IPF-INF COP:PRS
 'The boy will read a book and write a letter.'

- G. *gada-ji [kitab ~~rux-u-n~~]=na [k'ež lik'-i-n] e.
 boy-ERG book read-PF-PFT=COORD letter write-PF-PFT COP:PRS
 'The boy read a book and wrote a letter.'

As shown in A1, the verb forms a constituent (usually called VP) only with the object NP, but not with the subject NP. Notice that the results are exactly the same as in the head ellipsis test: the non-finite form in Future and split Durative Present behaves differently and does not form VP. Again, this correlation is not unexpected, since the auxiliary in these forms already belongs to the verbal cluster, but verbal clusters typically include only heads (or at least non-projecting categories), not maximal projections. See Figures 8 and 9.

Figure 8. VP in clause headed by VC₂.

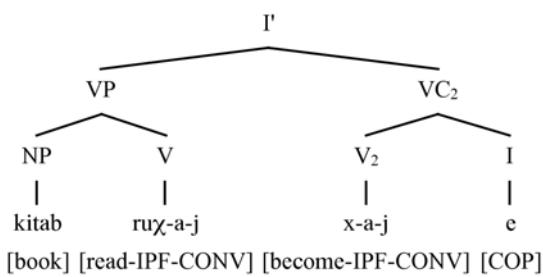
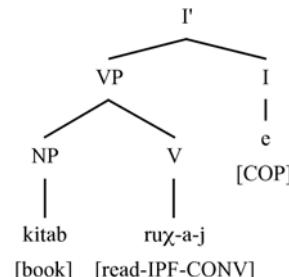


Figure 9. VP in clause headed by the copula.



It can be also noted that coordinating periphrastic forms with a converb as non-finite part give more acceptable sentences than coordinating periphrastic forms with a participle. Seemingly, worse results in the latter case cannot be ascribed to semantic or pragmatic factors.

This fact suggests that the difference arises due to different structural positions of converbs and participles. This is confirmed by the fact that the same periphrastic form Participial Present *rüxejefe* (<*rüxej ajef e*) includes both the converb and the participle. When realized as *rüxejef e*, this form patterns with participial forms of the type *rüxfef e* (cf. D and E1), but when realized as *rüxej ajefe*, it behaves similar to other forms with converb (cf. B, C and E2). Examples E1 and E2 show that both the converb and the participle within this periphrastic form form VP with the object. Three facts, namely

- (i) both the converb and the participle form VP with the object,
- (ii) lower acceptability of coordinated participles,
- (iii) internal structure of the form *rüxej ajef e* (with the converb preceding the participle),

allow us to conclude that

- (a) the converb is closer to the object,
- (b) VP headed by the converb (labelled as VP₁ on Fig. 10–12 below) is the complement of VP headed by the participle (labelled as VP₂ below).

Interestingly, coordinating participles within the original form *rüxej ajef e* yields even less acceptable results than coordinating participles within the form *rüxej ajefe*, see (30). Although syntactically this structure is well-formed, such constructions are considered to be too ‘heavy’ and difficult to produce and parse.

- (30) ??ruš-a [jamak rüx-e-j a-je-f]=na [guni už-a-j
 girl-ERG food cook-IPF-CONV {IN}be-PART-S=COORD bread bake-IPF-CONV
 a-je-f] e.
 {IN}be-PART-S COP:PRS
 ‘The girl cooks food and bakes bread.’

The structure of all the three variants of Participial Present (*rüxej ajef e*) is shown on Figures 10, 11, 12.

Figure 10. *rüxej ajef e*.

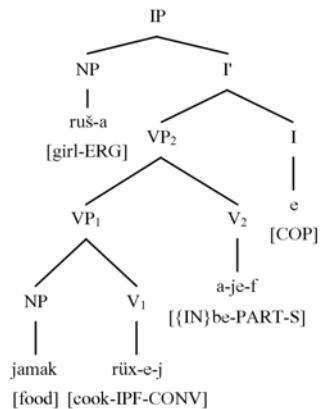


Figure 11. *rüxejef e*.

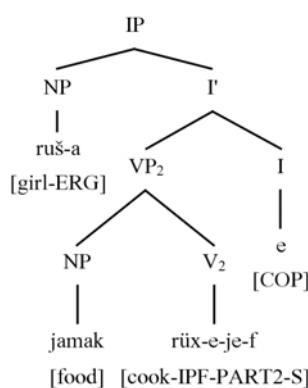
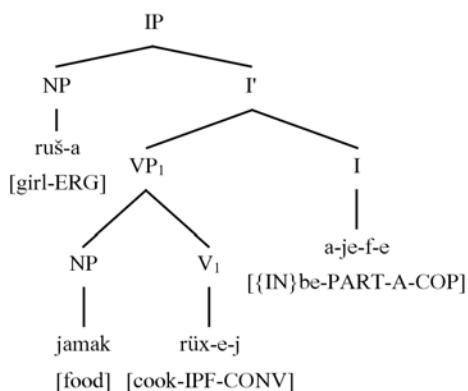


Figure 12. *rüxej ajefe*.



Similarly, other forms have structures shown on Figures 13 and 14.

Figure 13. *rüxej e*.

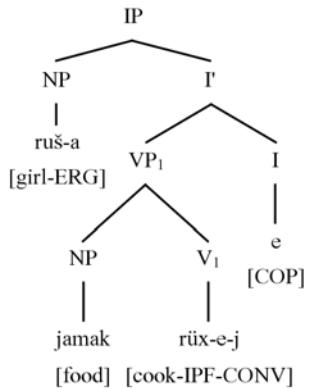
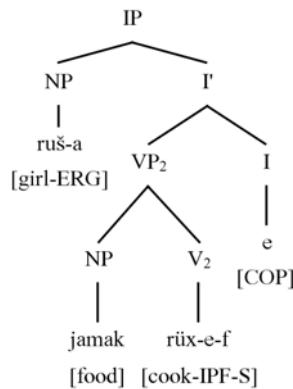


Figure 14. *rüxej e*.



5.5. Word order

In this section we are interested whether the object (or any other) NP can be placed between the non-finite part and the auxiliary.

(31)

- A1. ***rux-a-j*** kitab x-a-a gada-ji.
read-IPF-CONV book become-IPF-PRS boy-ERG
- A2. ****rux-a-j*** x-a-j kitab a gada-ji.
read-IPF-CONV become-IPF-CONV book {IN}be:PRS boy-ERG
'The boy is reading a book.'
- B. ***rux-a-j*** kitab a gada-ji.
read-IPF-CONV book {IN}be:PRS boy-ERG
'The boy is reading a book.'
- C. ****rux-a-j*** kitab e gada-ji.
read-IPF-CONV book COP:PRS boy-ERG
'The boy (usually) reads a book.'
- D. ****rux-a-f*** kitab e gada-ji.
read-IPF-S book COP:PRS boy-ERG
'The boy (usually) reads a book.'
- E1. ****rux-a-je-f*** kitab e gada-ji.
read-IPF-PART2-S book COP:PRS boy-ERG
- E2. ****rux-a-j*** kitab a-je-f-e gada-ji.
read-IPF-PART2-S book {IN}be-PART-S-COP boy-ERG
'The boy (usually) reads a book.'
- F. ****rux-a-s*** kitab e gada-ji.
read-IPF-INF book COP:PRS boy-ERG
'The boy (usually) reads a book.'

- G. *rux*u*-n kitab e gada-ji.
 read-PF-PFT book COP:PRS boy-ERG
 'The boy read a book.'

As is expected, the object NP cannot be placed between the auxiliary and the non-finite verb in Future and split Durative Present, where both components form the cluster. However, contrary to our expectations, the object NP cannot be placed also between the auxiliary and the non-finite verb in C, D, E1, E2, where the auxiliary is the head. Note that all of these forms have the copula as the auxiliary, while A1 and B (with the auxiliary *a* and *xas*) allow insertion of the object NP. We take this contrast as evidence for existence of two different heads (and projections):

- (i) the copula *e* is of type I₁,
- (ii) the auxiliaries *a* and *xas* are of type I₂.

Recall that in 5.2 we distinguished between two types of verbal clusters (between clusters with *e* and *xas*). The word order facts in this section give the same result distinguishing between the copula *e* and the auxiliary *xas*. In addition, the word order test indicates that the locative verb *a* belongs to the type of head as *xas*.

5.6. Summary of syntactic diagnostics

- Additive particle between V and I
 Whether V and I are separate syntactic words or not
- Head ellipsis
 Whether I is the head or it forms a verbal cluster with a non-finite verb
- I as morphosyntactic locus
 Distinguishes between two types of verbal clusters: one headed by the copula and the other headed by *xas*
- Coordination
 Whether V and the object NP form VP
- Word order
 Distinguishes between two types of heads: *e* vs. *a, xas*

		A	A1	B	C	D	E1	E2	F	G
1.	Additive particle between V and I	+	+	+	+	+	+	+	+	–
2.	Head ellipsis	I	VC	I	I	I	I	I	VC	
3.	I vs. VC as morphosyntactic locus	+	VC ₂	+	+	+	+	+	VC ₁	
4.	Coordination: VP?	?+	–	+	+	?+??	?+??	+	–	
5.	Word order	H ₂	H ₂	H ₂	H ₁					

The most important result of these tests is that they do not give contradictory results, but confirm and, hence, support each other.

6. Semantic motivation of syntactic structure

As a result of applying syntactic diagnostics above, we found the following distinctions between syntactic structures of different periphrastic forms:

- (i) two types of VPs: VP₁ and VP₂,
- (ii) two types of heads: I₁ and I₂,
- (iii) each of I₁ and I₂ can be either a separate syntactic word or a verbal cluster.

So far, we have distinguished between them by means of numerical indices. However, an important question is whether we can find some meaningful labels for different syntactic objects. In short, we think that this is indeed possible, although we cannot yet provide a full and articulated answer to this question (partly due to space limitations, partly because this requires further investigation). Nevertheless, we give some preliminary labellings based on semantics and syntax of primary periphrastic forms:

- the copula *e* (I₁) expresses the distinction between events that are relevant to the actual state of affairs and events that are not (any longer) relevant to the actual SoA (present *e* vs. past *ij*) and roughly can be labelled as T(ense);
- the locative verb *a* and the auxiliary *xas*: State (very preliminarily)
- VP₁ distinguishes between perfective and imperfective events (perfective vs. imperfective converb) and should be labelled as Asp(ect);
- VP₂ is occupied by participles which we (preliminarily) label as Fact(ive);
- Future (infinitive + *e*) expresses reference to future events as well as various modal meanings. A possible solution as to how label the infinitive can be Mod (future/modal meanings minus relevance to the actual SoA).

These labels allow us to provide (meaning)fully annotated syntactic trees for all primary periphrastic forms. Figure 15 shows the structure of Present, whereas Figure 16 shows the general structure of periphrastic forms with the copula *e* (non-finite forms that can appear in a certain position are shown in the terminal nodes).

Figure 15. Present.

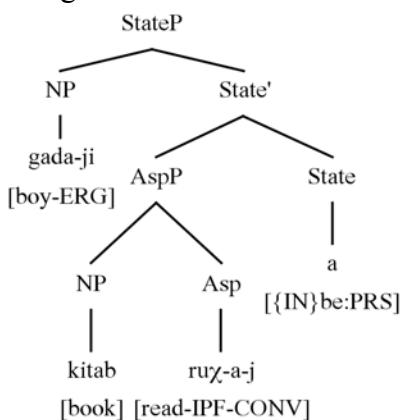
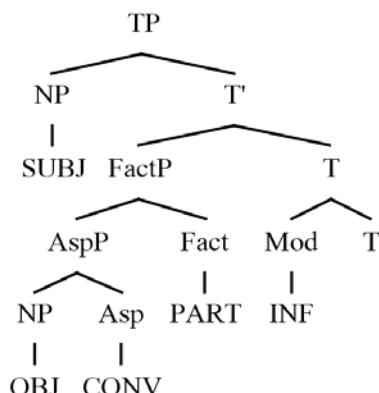


Figure 16. Periphrastic forms based on the copula *e*.



Below we present how the general structure shown on Figure 16 is realized in Present Habitual, Generic Present, Participial Present, and Future.

Figure 17. Participial Present.

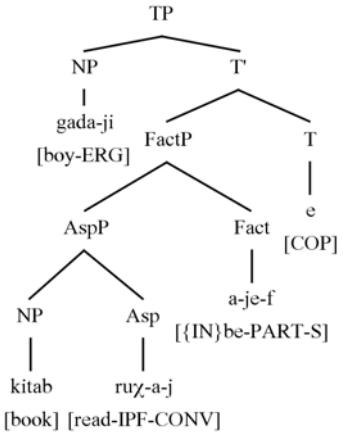


Figure 18. Generic Present.

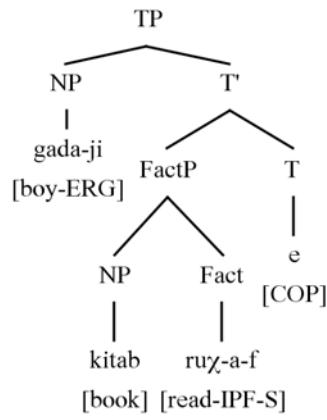


Figure 19. Present Habitual.

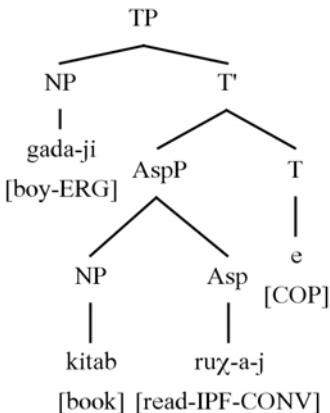
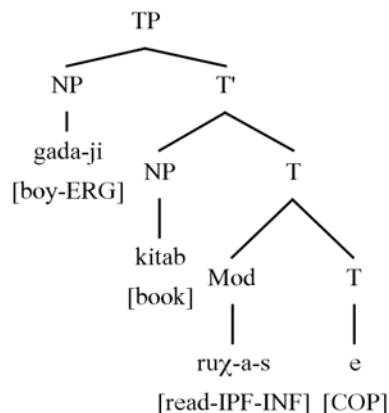


Figure 20. Future.



Hierarchical structure as on Fig. 17–20 of functional heads can be thought of as constituting extended verbal projection. The object NP is generated as the complement to the lowest generated head within the extended verbal projection, while the subject NP is generated as the specifier of the highest head.

Two further points should be highlighted. First, we assume that the nodes are generated only if there is phonologically pronounced material to be placed in it. Cf. absence of AspP in Generic Present (Fig. 18), absence of FactP in Habitual (Fig. 19) and absence of both in Future (Fig. 20).

Second, there is no such head as V in our structure. The lexical verb is generated in the lowest present functional head associated with a given periphrastic form. This allows us to avoid unnecessary complications related to empty VP, namely, why the verb is generated in this position in some forms, but is not there in others.

These two points imply that if a periphrastic form does not have fully articulated syntactic structure, i.e. if phonological fusion of two (or more) functional heads occurs, the lexical verb is generated in the highest of fusing nodes. Ultimately, this means that synthetic / morphologized forms are located in T. As an example, consider three variants of Participial Present on Fig. 21–23 (cf. the full structure on Fig. 17).

Recall that different realizations of the same form (Participial Present in this case) display different syntactic behaviour (see section 5.6). This fact is readily explained under our syntactic representation, since forms that behave in the same way have the same structural representation. Cf. Habitual (Fig. 19) and Generic Present (Fig. 18), on the one hand, and two variants of Participial Present (Fig. 21 and 22).

Figure 21. Participial Present (*ruχaj ajefe*).

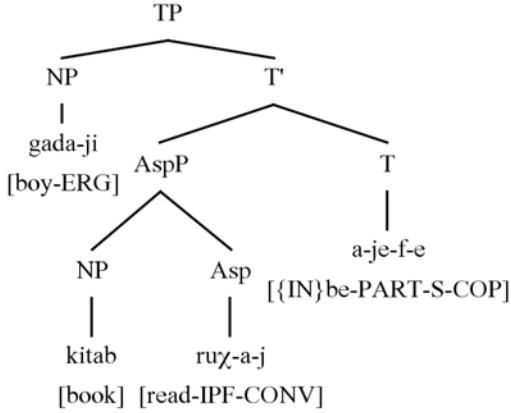


Figure 22. Participial Present (*ruχajef e*).

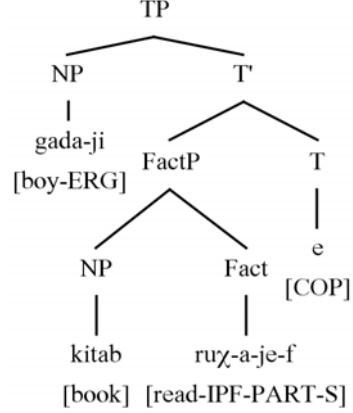
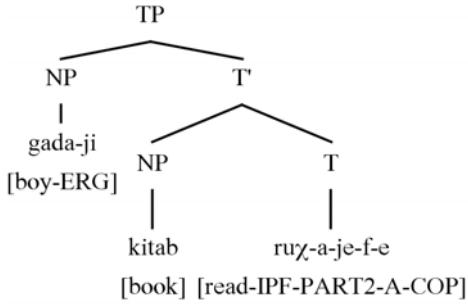


Figure 23. Participial Present (*ruχajefe*).

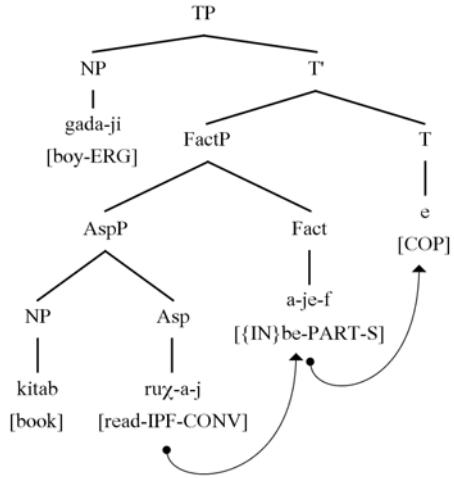


7. Diachronic interpretation

From a diachronic point of view, single-word realizations similar to one on Fig. 23 can be viewed as a result of morphologization of original periphrastic forms like that on Fig. 17 with intermediate stages shown on Fig. 21 and 22. The morphologization process consists of two steps that can be represented as ‘diachronic head-to-head movement’, see Fig. 24 (NB! We do not assume that structures on Fig. 21, 22, 23 are surface representations resulting from application of something like ‘Move α’ to the structure on Fig. 17).

Notice that the intermediate structures on Fig. 21 and 22 show that (i) the two steps are independent of each other and (ii) single-word realization occur as the result of two subsequent ‘movements’. As far as motivation for such simplification is concerned, we can safely assume that something like ‘Economy of expression’ (Bresnan 2001) is operative here, leading to realizations containing less words.

Figure 24. Morphologization of original periphrastic form.



8. Co-existence of single-word and periphrastic realizations

Another point of interest here is co-existence of single-word realizations and synonymous periphrases which differ in some pragmatic / information structure features. This indicates that they do not exclude each other, as is often supposed, and no special principles excluding their co-existence are needed (cf. morphological blocking in Andrews 1990). Rather, cross-linguistic tendency towards complimentary distribution between single-word realizations and periphrastic forms is in fact just one of possible diachronic paths of evolution.

Synthetic expressions arising as a pragmatically marked way of expression, gradually loose their marked status due to constant inflation / bleaching processes. We suppose that at this point there are two alternative options. Either periphrastic expressions disappear, or both forms may co-exist, but now periphrasis becomes pragmatically marked. We cannot exclude that in the latter case at some further time point the distinction between synthetic and periphrastic expressions can be lost due to the fact that alternative realizations are no longer seen as conveying different pragmatic information.

9. Syntactic structure of secondary periphrastic forms

So far we have said nothing about the structure of clauses headed by secondary periphrastic forms. As is seen from the table in section 6, the auxiliary *e* / *a* forms a cluster with the non-finite part of the auxiliary *xas* and the non-finite part of it forms VP with the object NP. Diachronically, this obviously results from insertion of the primary periphrastic form of the verb *xas* as the head of the structure on Fig. 16. The inflected verb *xas* itself, when realized peripherastically, has the same structure (except that no object NP generated).

However, there is evidence (we will not go into details here, since this requires further study) that when the whole primary periphrastic form is inserted as the head of a secondary periphrastic form, (i) the hierarchy of functional heads, and (ii) the difference between two heads T and State are lost, so that the internal structure of the head is almost flat (though infinitive stands apart again). Observed syntactic behaviour together with diachronic considerations gives a preliminary general structure of secondary periphrastic forms on Fig. 25, while Figure 26 is the syntactic representation of Durative Present.

Figure 25. General structure of secondary periphrastic forms.

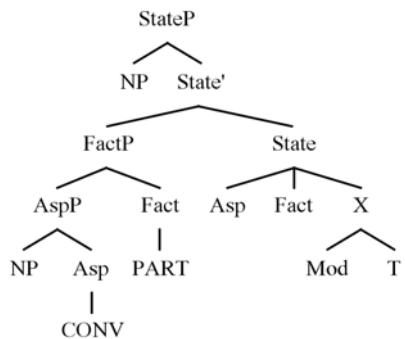
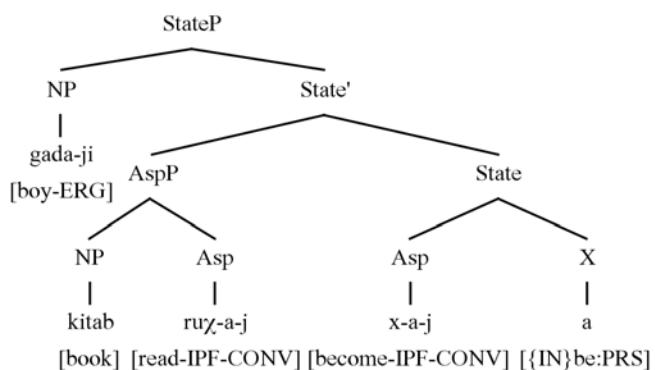


Figure 26. Durative Present.



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