Implications of case and agreement patterns in three Caucasian dialects spoken in Turkey: Pazar Laz, Ardasheni Laz and İnegöl (Adjarian) Georgian^{*}

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1. INTRODUCTION

• Frequently attested alignment patterns in the morphological marking of arguments (i.e. case or verbal indexing) include **neutral**, **accusative**, and **ergative** alignments (Comrie, 1978; Dixon, 1994). The different alignments of S (the sole argument of an intransitive verb), A (the 'agentive' argument of a transitive verb), and P (=O) (the 'patientive' argument of a transitive verb) give us these three basic types.



• In addition to these basic types, there is also a combination of ergative and accusative alignments, namely **split-S** alignment (as a subtype of **active alignment**). In split-S alignment, S may be aligned *either* with P (ergative alignment) or with A (accusative alignment). Split-S alignment manifests itself along the parameters of case-marking and person/number agreement, depending on the following factors: specificity of arguments, tense-aspect-modality specification and the type of verb.



• In this work, we will consider four dialects of the South Caucasian (*Kartvelian*) language family: standard dialect of Georgian, İnegöl dialect of Georgian (Adjarian), Pazar dialect of Laz and Ardasheni dialect of Laz.

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• We will discuss the implications of case marking patterns attested in these dialects with respect to the alignment types noted above and sources of alignment splits. Using the evidence in these dialects, certain typological correlations will be also considered.



İnegöl Georgian¹ is spoken by immigrants from Batumi Pazar and Ardasheni Laz^2 are spoken in neighboring regions

2.DATA³

2.1 Pazar Laz (PL)⁴

(1) a. Himu- k /Bere- k	çitabi-Ø	do-t'k'-u	$A = \{-k\}$
he/child-ERG	book-NOM	pv-read-3A.PST	$\mathbf{P} = \{\emptyset\}$
'He/The child re	ad the book.'		
b. Himu- k /Bere- k	i-bgar-s		$S_A = \{-k\}$
he/child-ERG	prv-cry-3S.PRS	5	
'He/The child is	crying.'		
c. Him-Ø/Bere-Ø	ğur-u		$S_P = \{ \emptyset \}$
he/child-NOM	die-3S.PST		
'He/The child d	ied.'		

• In PL, case marking patterns illustrated in (1) indicate a **split-S** alignment where S is aligned either with A or P, depending on the verb.⁵ Thus, we must identify two sets of arguments S_P (aligned with P) and S_A (aligned with A).

¹ There are a number of Georgian dialects spoken in İnegöl. Our informant is a descendant of immigrants from Xulo, Batumi.

² See Kutscher (to appear) for an overview of Laz and its genetic affiliation.

³ The abbreviations used in this work are as follows: A: agent(ive), ASP: aspect, DAT: dative, ERG: ergative, NOM: nominative P: patient(ive), PL: plural, PRS: present tense, PST: past tense, S: sole argument of intransitive verb, 1, 2, 3: first, second, third persons

⁴ Our data for Pazar Laz include over 15 hours of recording of free dialogues, storytelling, questionanswer pairs, some of which have been carried out during the field methods course on Pazar Laz (taught by Balkız Öztürk and Markus Pöchtrager) at Boğaziçi University, 2010. The data for Ardasheni Laz, İnegöl Georgian are from elicitation sessions with informants. Standard Georgian data come from elicitation sessions with informants and cited works.

	\leq
$A = \{-k\}$	$(S \rightarrow P)$
$\mathbf{P} = \{ \boldsymbol{\emptyset} \}$	
$S = \{-k\}$ or $\{\emptyset\}$, depending on the verb	A)

However, split-S alignment applies only to third person arguments since first and second ٠ person pronouns do not bear case marking as illustrated in (2).⁶ Thus, PL exhibits **neutral** alignment for first and second person pronouns.

(2)	a.	Ma	si	ce-k-ç-i	$A = \{\emptyset\}$
		Ι	you	pv-2P-beat-1A.PST	$\mathbf{P} = \{\emptyset\}$
		'I beat	you.'		
	b.	Ma	v-i-nçi	r-Ø	$S_A = \{\emptyset\}$
		Ι	1S-prv	-swim.PRS	
		I am sv	vimmin	g.'	
	c.	Si	c-ol-i		$S_P = \{\emptyset\}$
		you	pv-fall	-2S.PST	
		'You fe	ell dowr	ı'	

To summarize the case alignment pattern in PL, first and second person pronouns have ٠ neutral alignment as they are not case-marked, while third person arguments (pronouns and full NPs) have split-S alignment. That is, the alignment of S is dependent on the verb. Thus, we have identified two split conditions at work in PL:

1-**Person** [1=2/3]

2-Verb Category [S_A/S_P].

2.2 Ardasheni Laz (AL)

(3) a.	Bere-Ø child 'The child is c	ts'ari-Ø water Irinking water.	ş-um-s drink-ASP-3A.PRS	$A = \{\emptyset\}$ $P = \{\emptyset\}$
b.	Bere-Ø child 'The child is c	i-bgar-y prv-cry-3S.PR rying.'	S	$S_A = \{\emptyset\}$

⁵ In other words, S_A corresponds to the sole argument of an unergative verb while S_P corresponds to that of an unaccusative verb.

⁶ Quantified first and second person pronouns bear case morphology, though. Note that personal pronouns qualify as full NPs when they are quantified and can take case markers.

şk'u iri-k v-inçir-t e.g. we all-ERG

c. Bere-Ø do-ğur-u child pv-die-3S.PST 'The child died.'

 $S_P = \{ \emptyset \}$

• Ardasheni Laz has lost its case morphology. As all arguments appear in their bare forms, as illustrated in (3), case marking alignment in AL is **neutral.**⁷



2.3 Standard Georgian (SG)

• As in Pazar Laz, in the standard dialect of Georgian, only third person arguments are distinguished for case. However, unlike PL, SG is noted for its <u>aspect-based</u> case alignment difference. In Series I, which roughly corresponds to the imperfective aspect, SG has the accusative alignment (S=A/P) as illustrated in (4).

(4) a.	St'udent'-i student-NOM 'The student y	ts'eril-s letter-DA' wrote the letter.'	ts'er-s T write-3A.PRS	$A = \{-i\}$ $P = \{-s\}$
b.	Bavshv-i child-NOM 'The child is s	tsur-av-s swim-ASP-3S.PF swimming.'	RS	$S_A = \{-i\}$
c.	Bavshv-i child-NOM 'The child is c	mo-di-s pv-come-3S.PRS coming.'		$S_P=\{\text{-}i\}$

• However, in Series II, which is composed of the aorist and the optative, case alignment is of the split-S type (A=S_A/S_P=P) as illustrated in (5).⁸

(5) a.	St'udent'-ma	ts'eril-i	da-ts'er-a	$A = \{-ma\}$
	student-ERG	letter-NOM	pv-write-3A.PST	$P = \{-i\}$
	'The student v	wrote the letter	r.'	
b.	Bavshv-ma child-ERG	i-tsur prv-sy	-a wim-3S.PST	$S_A = \{-ma\}$
	'The child sw	am.'		

⁷ In Ardasheni Laz neutral alignment applies to all persons (including personal pronouns), unlike in Pazar Laz.

⁸ In order to simplify the discussion, we are restricting our discussion to Series I and II.

c. Bavshv-i mo-vid-a child-NOM pv-come-3S.PST 'The child came.'

$$S_P = \{-i\}$$

- To summarize, SG has three conditions for case alignment splits:
- 1- **Person** [1=2/3]
- 2- **TAM** [Series I: S=A/P] [Series II: $A=S_A/S_P=P$]
- 3- Verb Category $[S_A/S_P]$.



2.4 İnegöl Georgian (İG)

• İG is spoken by fourth and fifth generation immigrants from Batumi. The case marking pattern of İG differs from SG in one important respect: in Series II, S_P argument is marked ergative (therefore aligned with A) when it is specific/definite as illustrated in (6).

(6) a. Bağv-ma child-ERG	xink'al-i ç'am-a xink'al-NOM eat-3A.PST	$A = \{-ma\}$ $P = \{-i\}$
'The child ate	e the xink'al.'	
b. Ğarç-ma baby-ERG	i-t'ir-a prv-cry-3S.PST	$S_A = \{-ma\}$
'The baby crie	ed.'	
c. Ber-ma old-ERG	mo-k'd-a pv-die-3S.PST	$S_P = \{-ma\}$
'The old (man	/woman) died.'	
d. Ber-i old-NOM	mo-k'd-a pv-die-3S.PST	$S_P = \{-i\}$
'An old (man/	woman) died.'	

- Further evidence for the definiteness/specificity condition for the ERG-NOM alternation on S_P arguments in Series II is given in (7)-(8). (7) shows that only ergative marked S_P NPs can occur with a possessor while (8) shows that only ergative marked S_P NPs can be preceded by a universal quantifier.

b. *Çem-i my-NC	/-Ø DM/-ERG	bağv-i child-NOI	М	ts'q'al-şi water-into	ça-vard-a pv-fall-3S.PS	*S _P = {-i} Г
(8) a. Bitev all 'All the	drox-eb-n cow-PL-E cows died.	na ERG	mo-k'e pv-die	d-en -3PL.S.PST		$S_P = \{-ma\}$
b. *Bitev all	drox-eb-i cow-PL-N	IOM	mo-k' pv-die	d-en -3PL.S.PST		$S_P = \{-i\}$

- To summarize, İG has <u>four</u> conditions for case alignment splits:
- 1- **Person** [1=2/3]
- 2- **TAM** [Series I: S=A/P] [Series II: $A=S_A/S_P=P$]
- 3- Verb Category $[S_A/S_P]$.
- 4- **Specificity** [Specific S_P/Non-Specific S_P]



Summary of DATA

Case Marking	AL		PL		SG		İG	
Patterns								
Person	3		3 3		3		3	
TAM	SI	SII	SI	SII	SI	SII	SI	SII
А	Ø	Ø	-k	-k	-i	-ma	-i	-ma
$\mathbf{S}_{\mathbf{A}}$	Ø	Ø	-k	-k	-i	-ma	-i	-ma
S _P [specific]	Ø	Ø	Ø	Ø	:	:	:	-ma
S _P [non-specific]					-1	-1	-1	-i
Р	Ø	Ø	Ø	Ø	-S	-i	-8	-i

Alignment	AL	PL	SG	İG
Types				
Neutral	+	+	+	+
Split-S	-	+	+	+
Accusative	-	-	+	+
(S _P Split)	-	-	-	+

Alignment Split Conditions	AL	PL	SG	İG
Person	-	+	+	+
Verb Category	-	+	+	+
TAM	-	-	+	+
Specificity (of S _P)	-	-	-	+

3. DISCUSSION

• The conditions identified for the alignment splits attested in PL, SG, and İG can be grouped into three main groups; NP-induced, Verb-induced, and TAM-induced splits.

3.1 NP-induced splits

a. Person split

• The person split observed in SG, PL, and İG is in line with the nominal hierarchy. First and second person pronouns are not case-marked. Since they are the highest two NPs on the nominal hierarchy, they are predicted to be unmarked (Dixon, 1994).

1>2>3>proper nouns>common nouns high ← low nominal hierarchy

b. Specificity split

- Specificity split is seen in İG: Specific S_P is aligned with A while non-specific S_P is aligned with P.
- If we consider specificity as a continuum, we can observe that an argument that is higher on the specificity scale is likely to be aligned with A (accusative alignment; S=A).
- However, non-specific arguments are less likely to be A arguments, therefore they are aligned with P (ergative alignment; S=P). (Dixon, 1994)

accusative align.(S=A) ergative align. (S=P)

high 4 low

Specificity Hierarchy

• This split is only true for S_P arguments in Series II in IG. Interestingly however, another dialect of Georgian spoken by the Batumi immigrants in Bursa (Turkey) appears to confirm

the proposed pattern regarding the specificity split.⁹ This dialect has lost its TAM-based and verb-based splits. Instead, specificity seems to be what determines the case marking pattern. See (9).

- (9) a. Garet bağana-m t'ir-is outside child-ERG cry-3S.
 'The child is crying outside'
 - b. Garet bağana-y t'ir-is outside child-NOM cry-3S 'A child is crying outside'
 - c. Nene-m bağana-y k'ots'n-is mother-ERG child-NOM kiss-3S 'The mother is kissing the child.'
- The case marking pattern illustrated above aligns specific S with A and non-specific S with P, as predicted by the specificity hierarchy presented above.

3.2 Verb-induced splits

- Verb category/type is said to be the basic criterion in split-S alignment. Depending on the verb, S is aligned with P or A. However, the distribution is certainly *not* random.
- For the split-S alignment in PL, SG, and İG, *volition, animacy, agentivity* etc. cannot account for the distribution of ergative-nominative case on S arguments.
- What determines the distribution is the compositional meaning of the verb (i.e. lexical aspect).
- One approach to 'lexical aspect' uses the binary features for initial and terminal bounds (Ritter and Rosen, 2000). In this framework, having an initial bound corresponds to having a causer, initiator, or agent. Thus, animacy and volition are not relevant.

Terminal	Initial	Event Type	Verb	Case Marking
Bound ¹⁰	Bound		Class ¹¹	
+	+	Accomplishment	Class 1	A-ERG P-NOM
-	+	Activity	Class 3	S _A -ERG
+	-	Achievement	Class 2	S _P -NOM

Mapping of event structure and case marking

⁹ Unfortunately, we were unable to have further access to this dialect. We nevertheless include the data for its significance.

¹⁰ Having a terminal bound means being telic.

¹¹ See Harris (1981) for Georgian and Holisky (1991) for Laz. See also Lacroix (2009) and

Öztürk&Pöchtrager (forthcoming) for alternative accounts of verb classes in Arhavi and Pazar Laz respectively.

- Using the perspective in this framework, we claim that the split-S alignment in SG, PL, and IG is sensitive to the event type (i.e. formally checks if the event has an initial bound or not).
- If the event *does* have an initial bound (causer, agent, or initiator), S is marked ergative (therefore aligned with A). If the event does not have an initial bound, S is marked nominative (therefore aligned with A).
- In (10a), an inanimate causer is interpreted as A (i.e. initial bound) and marked ergative, while in (10b), S argument of an event with initial bound but no terminal bound is aligned with A and marked ergative.

(10) a. Me	dğes ts'vim	a-m da-m-a-ğon-a		
	me-(NOM) 'The rain m	today rain-E	RG pv-1-CAUS-be sad-3A.PST lay.'	(SG)	
	b. Biç'i-k i-xoron-am-s boy-ERG prv-xoron-ASP-3S.PRS 'The boy is dancing <i>horon</i> '				
•	Initial Bounds Terminal Bounds	A=S _A P=S _P	marked same: ergative marked same: nominative		

- S interpreted as initial bound= S_A [S=A accusative alignment]
 S interpreted as terminal bound=S_P [S=P ergative alignment]
- The typological implication of the discussion so far is that SG, PL, and İG are languages which group *activities* and *accomplishments* together. Thus, having no initial bound (as in achievements) leads to ergativity (split).

3.3 TAM-induced splits

• SG and IG have TAM-induced splits in that ergativity (S=P) is not attested in Series I (imperfective aspect). This is again in line with the cross-linguistic tendency of ergativity to occur with perfective aspect and past tense (Dixon, 1994).

4. Consequences of the Linguistic Shifts between Dialect Pairs PL-AL and SG-İG

4.1 Case loss in AL: Loss of ergativity in cross-referencing patterns

• Due to the loss of case morphology in AL, case marking alignment is neutral. One likely observable consequence of this seems to be the availability of S_P argument for the inversion construction (in Series III) (Öztürk 2010). In the inversion construction, P cross-referencing morphology is employed to cross-reference A and S arguments.¹² S_P arguments are not available for this in PL, but are available in AL. This appears to be the consequence of the

¹² See Haris 1981, Öztürk 2011 and Demirok 2011 for different accounts of inversion in Georgian and Laz.

elimination of the split-S case marking alignment. See the example in (11) which is acceptable only in AL.

 (11) Hako dido bere u-ğur-ap-un here many child 3-die-PERF-3S
 'Here many children have died.'

4.2 Specificity Split: Ergative Case Extended to Specific SP in İG

- One possible interpretation of the extension of ergative case to specific S_P in İG is the increase in the scope of accusative alignment (S=A). This is because the majority of S arguments are aligned with A in İG. This may be the precursor of a shift towards a more accusative system in general.
- In İG, case and cross-referencing patterns in psychological predicates which employ inversion have a potential reflection of such a shift.
- Both in SG and İG, experiencer arguments in psychological predicates (Class IV) are dativemarked. The stimulus arguments are marked nominative in SG, as in (12a). However, they are obligatorily ergative-marked in İG, as illustrated in (12b).

(12) a. Q'vela	masts'avlebel-i	m-dzul-d-a	sk'ola-și		
all	teacher-NOM	1-hate-PASS-3S	school-in		
'I hated all the teachers in the school.'					

b. Dunya-m	ga-m-dzul-d-a	
worldliness-ERG	pv-1-hate-PASS-3S	
'I hated the worldlin	ness.'	(İG)

• Moreover, as illustrated in (13), the number information of the stimulus arguments is obligatorily cross-referenced on the verb in İG, not in SG.

(13) a. Tkven	me	g-axsov-var-t	
you.PL.DAT	Ι	2P-remember-1cop-PL	
'You(pl) remember me.'			(SG)
b. Tkven	me	g-axsov-var-/*t	
you.PL.DAT I		2P-remember-1cop-SG	
'You(pl) reme	mber me.'		(İG)

• Case marking and cross-referencing patterns imply that stimulus arguments are treated as A in IG, but S_P in SG. The shift seen in psychological predicates requires an interpretation that would only be available in a passive construction, which is more likely to occur in an accusative system.

5. CONCLUSION

- Overall, the four dialects we have discussed exhibit rich linguistic data to study the case alignment and alignment splits in Caucasian languages. A more extensive and comparative study of different languages/dialects would uncover many other significant properties and cross-linguistic correlations.
- Due to lack of sufficient data we are not making a claim regarding a diachronic change as witnessed by these linguistic shifts in marking.
- Even if there is a shift towards an accusative system, this may be due to language contact and/or internal synchronic properties of the linguistic systems at hand.

REFERENCES

Andréason, D. (2001) Active languages. B.A. thesis. Stockholm University

Aronson, H. I. (1990). Georgian : a reading grammar. Corrected edition. Columbus, Ohio: Slavica Publishers.

Comrie, B. (1978). Ergativity. In W. P. Lehmann (Ed.), Syntactic typology: Studies in the phenomenology of language (pp. 329–394). Austin: University of Texas Press.

Demirok, Ö. F. (2011). A minimalist analysis of Laz-Georgian Applicatives. Ms. Boğaziçi University.

Dixon, R. M. W. (1994). Ergativity. Cambridge University Press.

- Emgin, B. (2007). Finiteness and Complementation in Laz. M.A. thesis, Boğaziçi University.
- Harris, A. C. (1981). Georgian Syntax: A study in relational grammar. Cambridge University Press.

Harris, A. C. (1982). Georgian and the Unaccusative Hypothesis, Language 58: 290-306.

Hewitt, B. G. (1995). Georgian: a structural reference grammar. Amsterdam: John Benjamins.

Holisky, D. A. (1991). Laz. The Indigenous Languages of the Caucasus. A.C.Harris (ed.)Delmar NY.

Holisky, D. A. (1981). Aspect and Georgian Medial Verbs. Delmar NY.: Caravan Books.

Kojima, G. and İ. Avcı Bucak'lişi. (2003). Laz Grammar. Chivi Yazıları, İstanbul.

Kutscher, S. (to appear) Lazuri Nena: The Language of the Laz. In Rüdiger Benninghaus (ed.) The Laz people.

Lacroix, R. (2009). Description du dialecte laze d'Arhavi (caucasique du sud, Turquie). Ph.D thesis. Université Lumière Lyon 2.

- Öztürk, B. (2008). The Loss of Case System in Ardesheni Laz and its morphosyntactic consequences. Talk given at Morphological Variation and Change in the Languages of the Caucasus. 13th International Morphology Meeting. University of Vienna. Austria.
- Öztürk, B. (2010). Subjects in Pazar and Ardesheni Laz. *Dilbilim Arastirmalari*. Bogazici University Press.
- Öztürk, B. (2011). Low, High and Higher Applicatives: Evidence from Pazar Laz. Talk given at the Colloquium on Generative Grammar 21, University of Seville.

Öztürk, B. and M. Pöchtrager, (forthcoming) A Grammar of Pazar Laz.

Ritter E. and S. Rosen. (2000). Event Structure and Ergativity. In Tenny C. and J. Pustejovsky (Eds.), *Events as Grammatical Objects*. CSLI Publications.