

System for Grammatical relations in Urdu

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Abstract

Languages of the world exhibit tremendous diversity when it comes to defining their grammatical traits. Some of them act to be accusative while others behave ergative. The one's those are classified as ergative often have in fact dual personalities, which means occasionally they show nominative-accusative patterns and sometimes they display ergative-absolutive system. These are termed as split-ergative languages, whereby syntactic and/or morphological ergative patterns are conditioned by the grammatical context, typically person or the tense/aspect of the verb. This paper provides an analysis of split ergativity in Urdu using standard mechanisms of structural case and agreement licensing.

Keywords: Grammatical Relations, Case Markers, Nominative, Accusative, Dative, Ergative, Absolutive, Split Ergative, Transitive, Intransitive

1. Introduction

Languages vary in cases that mark arguments, and lexical and syntactic conditions on specific cases. They also differ in the way the arguments of a verb are projected syntactically, as subject or objects or oblique arguments. In many of these, subject exhibit nominative case on the nominal phrase and person/number agreement on the finite verb. Urdu concurs to this format partially. Finite verb agreement is only found with nominative DPs. This is not an unusual constraint in languages with a single set of agreement features (number, gender or person), reflected on the verbal complex consisting of 'V' and tense/aspect inflection [Davison 2003].

In Urdu a split occurs between perfect and imperfect aspect. A verb in the perfect aspect makes its arguments to be marked using an ergative system, while the imperfect aspect triggers accusative marking. Urdu has an ergative case on agents in perfective aspect for transitive and ditransitive verbs, while for other cases agents appear in nominative case. So the split-ergativity in Urdu is triggered by the case-markers specifically by ergative that

appears on the subjects of transitive verbs when it carries perfect morphology.

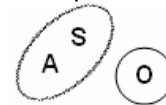
2. Literature Review

2.1. Background

In 1979 [Dixon] classified three core semantico-syntactic relations:

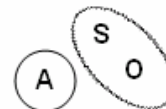
- Nominal argument of intransitive clause : **S**
- Agent like argument of transitive clause : **A**
- Patient like argument of transitive clause : **O**

Languages that treat **S** and **A** same morpho-syntactically and **O** differently are said to have nominative-accusative system. On contrary the grammatical pattern in which subject of intransitive clause **S** and object of transitive clause **O** get similar treatment while **A** is different is known as ergative-absolutive system. Examples:-



Avan-Ø ooDjinAA. He-Nom ran. He ran	Avan-Ø puLLayE paattAA. He-Nom boy-Acc saw. He saw the boy
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Ex 1: Nom| Acc-Spoken Tamil [Hoop]



Arnaq-Ø yruar-tuq. Woman-Abs dances The woman dances.	Angutem tangrr-aa arnaq-Ø. Man-Erg sees woman-Erg The man sees the woman.
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Ex 2: Erg | Abs - Y'upik [Hoop]

Split Ergative languages combine the two systems. The languages that display partly ergative behavior employ different syntax and/or morphology (usually accusative) in some other context. As a matter of fact most of the so-called ergative languages are actually split-ergative.

The split in ergative languages is triggered by some of the following sentence properties [Dixon 1994]:

- Presence of a discourse participant. First or second person pronoun appears but exhibit nominative-accusative behavior. Example: Diyrbal.
- Use of tenses and/or aspect in verbs. Example: Indo-Iranian family of languages.
- Few languages displays ergative-absolutive prototype with respect to case marking, but nominative-accusative pattern in connection with agreement. Example: Sinaugoro.
- Agentivity of intransitive subject. Arguments of active verbs behave like transitive agents and those of inactive verbs act like transitive objects. Example Dakota.

Georgian, Warlpiri and Polish are few other languages that demonstrate split ergativity. The example given below shows split ergative behavior of Georgian:-



Student-i midis Student-Nom goes The student went	Student-i ceril-s cers Student-Nom letter-Acc writes The student writes the letter
---	--

Ex 3: Nom | Acc-Georgian [Payne]

Student-i mivida Student-Abs went The student goes	Student-ma ceril-i dacera Student-Erg letter-Abs wrote The student wrote the letter
--	---

Ex 4: Erg | Abs-Georgian [Payne]

In the following sections we will study how Urdu exhibits split ergativity.

2.2. Case Markers in Urdu

This section talks about the case system that prevails in Urdu then we will highlight the case alternations which circumstance the split in Urdu. Most of the material covered in this section has been taken from [Butt and King] and [Davison].

There are six cases in Urdu. These are shown in table below:-

Cases Markers in Urdu		
Nominative	∅	∅
Ergative	ne	نے
Accusative	ko	کو
Instrumental	se	سے
Genitive	k-	ک-
Locative	me, par, tak, se	میں، پر، تک، سے

Table 1: Case Markers in Urdu [Butt and King]

In this paper we are primarily concerned with the first three. Let us briefly go through how these case markers appear on subjects in Urdu.

Nominative Case

The nominative case marker can occur in all the tenses in transitive and intransitive forms. Example:

a.	Aslam-∅	roya	
	Aslam-Nom	weep-Perf	
	Aslam	wept	
b.	Aslam-∅	rota	hai
	Aslam-Nom	weep-Impf	be-Pres
	Aslam	weeps	
c.	Aslam-∅	roy-e-ga	
	Aslam-Nom	weep-Fut	
	Aslam	will weep	

Ex-5: Intransitive Nominative Forms

a.	Aslam-Ø	saib-Ø	kha gya
	Aslam-Nom	apple-Nom	eat go-Perf
	Aslam ate apple		
b.	Aslam-Ø	saib-Ø	khata hai
	Aslam-Nom	apple-Nom	eat-Impf be-Pres
	Aslam eats apple		
c.	Aslam-Ø	saib-Ø	khayee ga
	Aslam-Nom	saib-Nom	eat -Fut
	Aslam will eat apple		

Ex-6: Transitive Nominative Forms

Ergative Case

The ergative case marker (ئے) comes with subject of transitive verbs when the verb carries perfective aspect (-a/-i/-e), subject exhibits nominative case otherwise [Butt and King]. When the verb is in perfect tense they are ergative in case they express volitionality [Ex-7a]. The subject of un-accusatives whether perfect or non-perfect can not have ergative case. They are always nominative [Ex-7b]. The ergative case also shows up with an infinitive in combination with a present or past form of hai (ہے) "be" [Ex-7c].

a.	Aslam-ne	gaaya
	Aslam-Erg	sing-Perf
	Aslam sang	
b.	Aslam-Ø/*-ne	gaaye-e-ga
	Aslam-Nom/*Erg	sing-Fut (Non-Perf)
	Aslam will sing	
c.	Aslam-ne	gaana hai
	Aslam-Erg	sing-Inf be-Pres
	Aslam will sing	

Ex-7: Intransitive Ergative Forms

The subject of transitive verbs, with perfective case will always shows ergative behavior [Ex-8a]. The subject of unergative might optionally acquire ergative [Ex-5a-7a].

a.	Aslam-ne/*-Ø	chai-Ø	banai
	Aslam-Erg/*Nom	tea-Nom	make-Perf
	Aslam made the tea		
b.	Aslam-Ø/*ne	chai-Ø	banayee ga
	Aslam-Nom/*Erg	tea-Nom	make-Fut
	Aslam will make the tea		
c.	Aslam-ne	chai-Ø	banani hai
	Aslam-Erg	tea-Nom	make-Inf be-Pres
	Aslam will make the tea		

Ex-8: Transitive Ergative Forms

Dative/Accusative Case

The Dative ko (کو) marks a goal or specify the experiencer [Ex-9a] as compared to ergative (ئے) which marks agentivity [Ex-9b].

a.	Bachay-ko	billi-Ø	dikhai	dee
	Child-Acc	cat-Nom	sight	give-Perf-F
	The child saw the cat (got the sight of it)			
b.	Bachay-ne	billi-Ø	daikhi	
	Child-Erg	cat-Nom	see-Perf-F	
	The child saw the cat (saw it purposefully)			

Ex-9: Transitive Dative and Ergative Comparison

The presence or absence of 'ko' is related to specificity of the object rather than any relevant property of verb [Mahajan].

3. Methodology

In order to scrutinize grammatical relations three standard parameters are employed:-

- Case Marking
- Verb Agreement
- Constituent Order

A language is analyzed in light these domains one by one. The approach used by [Thomas E. Payne] works by constructing a 3 X 3 matrix. **S**, **A** and **O** operate at x-axis and the above variables function at y-axis. Behavior of **S**, **A** and **O** is examined against each y-axis entry.

	S	A	O
Case Marking			
Verb Agreement			
Constituent Order			

Table 2: Inspecting Grammatical Relations

A language is examined by looking at intransitive and transitive clauses. Against all the three parameters in y-axis behavior of **S**, **A** and **O** is noted to see if **S** acts more like **A** or **O**.

4. Results and Discussion

From the study of sections 2.1 and 2.2 and the examples contained within it can be implied that Urdu demonstrates split ergative format. To elaborate further let us try to fill the above defined matrix.

4.1. Case Markers

Urdu shows ergative morphology in the perfective and nominative-accusative otherwise. Consider the following example:-

a.	Ali-∅	bhagay ga		
	Ali-Nom	run-Fut		
		Ali will run		
b.	Ali-∅	sota	hai	
	Ali-Nom	sleep-Impf	be-Pres	
		Ali sleeps		
c.	Ali-∅	guldaan-ko	uthayee ga	
	Ali-Nom	vase-Acc	pick-Fut	
		Ali will pick up the vase		
d.	Ali-∅	Hamid-ko	jagata	hai
	Ali-Nom	Hamid-Acc	wake-Imp	be-Pres
		Ali wakes Hamid		

Ex-10: Nom | Acc Behavior of Urdu

The above example shows the case where Urdu shows nominative-accusative pattern. The subject of intransitive clause and transitive clause coincide.

Criteria	S	A	O
Case Marking	∅	∅	ko

Table 3: Nom-Acc Case Marking

Now consider another example where Urdu shows a completely different behavior:-

a.	Ali-∅	bhaga		
	Ali-Nom	run-Perf		
		Ali ran		
b.	Ali-ne/*-∅	kahani-∅	sunai	
	Ali-Erg/*Nom	story-Abs	tell-Perf	
		Ali told the story		

Ex-11: Erg| Abs Behavior of Urdu

The verb with perfective case will not allow nominative subjects. They acquire subjects with ergative behavior. This is clear from example [Ex-11-b] where the verb 'sunai' demands ergative case 'ne' with subject 'Ali' and is prohibiting 'Ali' to occur with nominative case. So 'Ali-∅ kahani-∅ sunai' is not a valid clause.

Therefore the **S** of intransitive clause and **A** of transitive clause do not coincide in this case. However **O** 'kahani-∅' of transitive verb 'sunai' coincides with **S** 'Ali-∅' since both have nominative case hence showing ergative-absolutive format.

	S	A	O
Case Marking	∅	ne	∅

Table 4: Erg-Abs Case Marking

4.2. Agreement on Verbs

All Urdu nouns belong to one of the two nouns gender, masculine and feminine. A verb in the

clause agrees to the gender of noun. In [Ex-12] for example verb 'laugh' agrees with gender of subject.

a.	Larka-∅ Boy -Nom-M-Sg The boy laughed	hansa laugh-Perf-M-Sg
b.	Larki-∅ Girl-Nom -F-Sg The girl laughed	hansi laugh-Perf -F-Sg

Ex-12: Gender Agreement

The singular masculine form takes 'a' sound while the singular feminine form takes 'i' sound. In case of plural or singular form with 2nd or 3rd level of honor they take 'ay' (sound of bari yai) and 'een' (sound of choti yai with noon ghuna). The difference of singular and plural and honor level, however, is not relevant to this discussion.

The verb in perfective aspect (which takes ergative case) does not agree with agent of transitive clause. It rather agrees with the other argument of a multi-argument clause. In other cases nominative-accusative pattern is observed. Let us traverse through examples that we used in previous section:-

a.	Ali-∅ Ali-Nom-M Ali sleeps	sota sleep-M-Impf	hai be-Pres
b.	Nida-∅ Ali-Nom Ali sleeps	soti sleep-F-Impf	hai be-Pres
c.	Ali-∅ Ali-Nom-M Ali wakes Hamid	Hamid-ko Hamid -Acc-M	jagata hai wake-M-Imp
d.	Nida-∅ Nida-Nom-F Nida wakes Hamid	Hamid-ko Hamid-Acc-M	jagati hai wake-F -Imp

Ex-13: Nom|Acc Format on Verb Agreement

The verb 'sleep' gender agrees with **S** of intransitive clause similarly verb 'wake' agrees with **A** and not **O**

of transitive clause thus showing nominative accusative pattern.

	S	A	O
Gender Agreement	Ali-M	Ali-M	Hamid-M
	Nida-F	Nida-F	Hamid-M

Table 5: Nom-Acc Gender Agreement on Verbs

In the perfective tense where **A** is marked with ergative case the verb instead agrees with **O** (patient like argument of multi-clause). Consider the following example:-

a.	Ali-∅ Ali-Nom-M Ali ran	bhaga run-Perf-M
b.	Ali-ne/*-∅ Ali-Erg/*Nom-M Aslam told the story	kahani-∅ sunai story-Abs-F tell-Perf-F
c.	Nida-ne/*-∅ Nida-Erg/*Nom-F	darwaza-∅ khola door-Abs-M open-Perf-M

Ex-14: Erg|Abs Format on Verb Agreement

	S	A	O
Gender Agreement	Ali-M	Ali-M	Kahani-F
	Ali-M	Nida-F	Darwaza-M

Table6: Erg-Abs Gender Agreement on Verbs

The predicates 'sunai (tell-F)' and 'khola (open-M) in [Ex-14b-c] agree with the **O** arguments ['kahani (story-F) and 'darwaza (door-M)' respectively] of the clause and not with it's **A** argument 'Ali' with ergative case marker. So in this case **O** of transitive clause and **S** of intransitive clause follow identical pattern hence exhibiting ergativity.

4.3. Constituent Order

Urdu normally follows AOV and SV structure. But this is no hard and fast rule, often changing the order structure to OAV instead produce exactly the same meaning. See the example below:-

a.	Aslam-ne	Sultan-ko	mara	(AOV)
	Aslam-Erg	Sultan-Acc	beat-Perf	
	Aslam beat Sultan			
b.	Sultan-ko	Aslam-ne	mara	(OAV)
	Sultan-Acc	Aslam-Erg	beat-Perf	
	Aslam beat Sultan			

Ex-15: Constituent Order in Urdu

Another extreme example which is not that common can be of AVO and OVA.

a.	Chor-∅	machayee	shor-∅	(AVO)
	Thief-Nom	make	noise-Nom	
b.	Shor-∅	machayee	chor-∅	(OVA)
	Noise-Nom	make	Thief-Nom	

Ex-16: Constituent Order in Urdu-II

So we can not rely on the constituent order when studying split ergative behavior of Urdu.

If we try to sum up all that we have discussed and filling up [Table-2] with Urdu data we get [Table-7]. In the section ‘Gender agreement on verbs’ we have also added the ‘pred:’ for predicate to give a clearer picture of it.

Ali(M)	Nida(F)	Darwaza(M)
↑	↑	↑
Pred: Run(M)	Pred: Open(M)	Pred: Open(M)

Table6: Chunk of Table 7 Agreement Visualized

Criteria	S	A	O
Case Marking Nom-Acc	-∅	-∅	-ko
Case Marking Erg-Abs	-∅	-ne	-∅
Gender Agreement On Verbs Nom-Acc	Ali-M	Ali-M	Hamid-M
	Pred: Sleep-M	Pred: Wake-M	Pred: Wake-M
	-----	-----	-----
	-----	-----	-----
	Nida-F	Nida-F	Hamid-M
Pred: Sleep-F	Pred: Wake-F	Pred: Wake-F	
Gender Agreement On Verbs Erg-Acc	Ali-M	Ali-M	Kahani-F
	Pred: Run-M	Pred: Tell-F	Pred: Tell-F
	-----	-----	-----
	-----	-----	-----
	Ali-M	Nida-F	Darwaza-M
Pred: Run-M	Pred: Open-M	Pred: Open-M	
Constituent Order	X	X	X

Table 7: Split Ergative Format in Urdu

5. Conclusion

This paper evaluated Urdu as split-ergative language. The analysis was based on standard check-list of three fundamental parameters i.e. case markers, verb agreement and constituent order. We found out that a split pattern in Urdu is triggered by ergative case marking. The ergative case marker is requirement of perfective tense which does not allow nominative case marking to occur on subjects. Other than that nominative-accusative format is observed. We also found that with ergative case markers the verb starts agreeing with object of transitive/intransitive clauses which otherwise agree with subject again showing a split behavior. Much work has been done on non-nominative subjects in Urdu but this paper is first explicit attempt to prove Urdu a split-ergative language. Further research can be conducted by examining the patterns generated by other case markers in Urdu.

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