

Unwrapping the Panará verb package*

Bernat Bardagil-Mas
University of Groningen

Abstract: This paper discusses ongoing research on the complex verbal morphology of Panará (Jê). First, I present a detailed description of the phenomena as they appear superficially: the morphological template around verbs, and the two subclasses of postpositions. Then, I formulate an analysis based on agreement and feature-matching relations to derive the opacity of frozen PPs and the transparency of clitic-doubling PPs. Finally, I discuss some of the implications of such an analysis for clitic-doubling languages.

1 Introduction¹

Panará presents three morphosyntactic characteristics that set it apart from the other Northern Jê languages, namely its rich verbal morphology, its constituent order, and the nature of its ergative alignment. This paper examines these three phenomena with a focus on oblique participants, and is organized as follows: Section 2 describes Panará constituent order and the ergative case marking of argument DPs; Section 3 describes postpositions and the configuration of the verb package; Section 4 goes into the details of the participants and categories that are reflected in the verb package in light of head-phrase licensing relations. The conclusion briefly discusses some empirical and cross-linguistic justifications of this approach, as well as some of its broader implications.

1.1 The Panará language

Panará is a language of the Northern branch of the Jê family. It is spoken in Brazil by about 500 people, all of them first language speakers of Panará. Speakers of the language have varying degrees of knowledge of Portuguese as a second language, with the young men showing the highest levels of proficiency. The Panará live in their demarcated indigenous land, an area of about 494,017 hectares north of the state of Mato Grosso, at the headwaters of the Iriri river. I have visited the Panará regularly over the past three years in the oldest and biggest of their four villages, Nãsepotiti. Data used in this paper come from recorded and transcribed texts, as well as controlled elicitation sessions.

*I would like to thank the Panará community, especially my kind informants Perankô, Akâ, Jotikjã, Kuka, Kôpân and my adoptive father Seakjã. Many thanks to Spike Gildea, Myriam Lapierre, Pavel Rudnev, Andrés Salanova and Jan-Wouter Zwart for their comments and feedback. Thanks also to the audiences at WSCLA 21 and the Groningen Syntax Seminars. This research was in part supported by an ELDP small grant. Contact info: bbardagil@gmail.com

¹The following abbreviations are used in the glosses: 1 = first person, 2 = second person, 3 = third person, ABL = ablative, ABS = absolutive, ACC = accusative, ADES = adessive, ALL = allative, CAUS = causative, CNJ = conjunction, COM = comitative, DAT = dative, DU = dual, ERG = ergative, FIN = final, INES = inessive, INS = instrumental, INTR = intransitive, IRR = irrealis, ITER = iterative, LOC = locative, MAL = malefactive, NEG = negative, NFUT = non future, NOM = nominative, PER = perlocative, PL = plural, PRF = perfect, SG = singular, TMP = temporal.

2 Preliminaries: order and case

Panará has long been considered the most deviant language among Northern Jê (Alves and Gildea 2016; Rodrigues 1999; Salanova 2017). This paper focuses on possibly the three most divergent aspects of Panará grammar: constituent order and case marking in this section, and preverbal morphology in Section 3.

Throughout this paper I consider that the preverbal morphemes that cross-reference participants are pronominal clitics. This is supported by their behaviour, which is unlike canonical agreement (Corbett 2006), such as the optionality of the ergative clitic (1), or the ordering of the dual morpheme *mẽ*, which can appear either before or after the ergative clitic (2).

- (1) Pukjora hẽ (ti=) ku-ri apjã. *Optionality of some morphemes*
 Pukjora ERG (3SG.ERG=) eat-PRF turtle
 ‘Pukjora ate a turtle.’

- (2) a. Jy= py= mẽ= ra= kwy. *Flexible morpheme ordering*
 INTR= ITER= DU= 1SG.ABS= go
 ‘The two of us are going back.’
 b. Jy= py= ra= mẽ= kwy.

2.1 Constituent order

One of the characteristics of the grammar of Panará that stands out the most is its constituent order. Whereas in the other Northern Jê languages we find a quite strict verb-final order (Alves 2004; Nonato 2014; Oliveira 2005; Salanova 2007), Panará shows a much more free order of constituents.

- (3) a. Kjětowajĩ jy= titi. [SV]
 candle INTR= burn
 ‘The candle is burning.’
 b. Jy= ra= pôô inkjẽ. [VS]
 1SG= 1SG.ABS= arrive 1SG
 ‘I have arrived.’
 c. Inkjẽ hẽ rê= s= unpa nankãã. [SVO]
 1SG ERG 1SG.ERG= 3SG.ABS- fear snake
 ‘I’m scared of snakes.’
 d. Rê= sapô tepi kjanpo amã. [VO]
 1PL.ERG= cook fish tamal INES
 ‘We prepared the fish in manioc bread.’
 e. Nankãã hẽ inkjẽ ti= ra= nsa-ri. [SOV]
 snake ERG 1SG 3SG.ERG= 1SG.ABS= bite-PRF
 ‘A snake bit me.’

- f. Joopy ti= pĩ-ri toopytũ hẽ. [OVS]
 jaguar 3SG.ERG= kill-PRF old.man ERG
 ‘The old man killed a jaguar.’
- g. Ti= sisy-ri m̃ara Põka hẽ. [VOS]
 3SG.ERG= hit-PRF 3SG Põka ERG
 ‘Põka hit him.’
- h. Ka= s= anpũ ka hẽ m̃ara nankã. [VSO]
 2SG.ERG= 3SG.ABS- see 2SG ERG 3SG snake
 ‘You saw that snake.’

Although not every single logical order of S, O and V is attested, we do encounter verb-initial, verb-medial and verb-final configurations very often in both collected texts and during participant observation. Panará thus deviates from the typological statement commonly known as Mahajan’s generalization, after Mahajan (1994) and pointed out by Trask (1979), according to which verb medial languages are rarely ergative: “SVO languages are never ergative. Ergativity is found only in verb final and verb initial languages” (Mahajan 1994:p. 318).

The freedom of order exhibited by Panará clauses, uncharacteristic of Northern Jê languages, indicates that the postverbal position is not a dedicated one. It appears to be a default position for argument DPs, if anything.² As for the preverbal position, it is clearly not associated with any specific argument. It is more likely sensitive to discourse structure and information packaging. We can then assume that Panará clauses are ordered as in (4), with a *verb package* that can be preceded and followed by argument phrases.

- (4) [(DP) Mood=cl=cl=V (DP)]
verb package

There is however enough evidence to flesh out the structure of Panará sentences a little better. First, we find the verb in a position higher than its counterparts in other Northern Jê languages. As seen for Mẽbêngõkre in (5), the verb is entrenched in the VP. This is not the case in Panará, where we have seen that the verb does not need to appear in the typical Jê head-final position.

- (5) a. Kukryt nẽ ba arým ku- bĩ. (Mẽbêngõkre)
 tapir NFUT 1SG.NOM already 3.ACC- kill
 ‘I killed tapir.’
- b. *Ba nẽ ba arým ku- bĩ kukryt.
 1SG.NOM NFUT 1SG.NOM already 3.ACC- kill tapir

Second, Panará phrasal negation is found in a position between the verb package and the postverbal DPs, compatible with the standard view of negation being external to the VP:

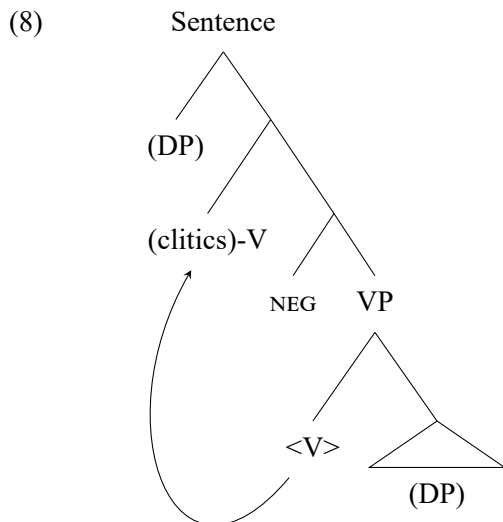
²Perhaps as a topic position, since protagonists of stories and tales tend to appear postverbally.

- (6) Inkjê hê re= k- anpũ pjoo ka. (Panará)
 1SG ERG 1SG.ERG= 2SG.ABS- see NEG 2SG
 ‘I didn’t see you.’

Mêbêngôkre negation consists of a negative predicate that selects the negated clause as its dependent, and which appears linearly after the main verb (7a). It could thus be argued that Mêbêngôkre *kêt* and Panará *pjoo* occupy the same position as main predicates. However, Panará presents a different construction that could be considered truly analogous to Mêbêngôkre negation, namely a mood-inflected *pjoo* that occurs following the negated clause (7b).

- (7) a. [Ije a pumuj] kêt. (Mêbêngôkre)
 1SG.ERG 2SG.ABS see-PRF NEG
 ‘I don’t see you.’
- b. [Mâra hê ti= kukrê] jy= pjoo. (Panará)
 3SG ERG 3SG.ERG= eat INTR= NEG
 ‘He doesn’t eat.’

Taking into account the position of the verb in Panará as compared to Mêbêngôkre and other Northern Jê languages, and the surface position of phrasal negation between the verb and the postverbal arguments, I propose that the Panará verb package stands outside of the VP and that the structure of Panará sentences is as in (8).³



There is also some evidence for a further layered VP, including a *v* projection licensing causation/transitivity, discussed in more detail in the next section.

³I am not making any claims regarding head-directionality in the VP.

2.2 Ergativity

This section presents briefly the direct arguments of Panará and their case marking. In (9) we can see the basic pattern of argument marking in Panará, which is mostly ergative.

- (9) a. **Ka** [jy= a= tẽ].
 2SG INTR= 2ABS= fall
 ‘You fell down.’
- b. **Ka hẽ** [ka= ra= sisy-ri] inkjẽ.
 2SG ERG 2ERG= 1ABS= hit-PRF 1SG
 ‘You hit me.’

The one argument of intransitive verbs appears in an unmarked form and is also represented with a clitic of the absolutive type next to the verb. For bivalent verbs that prototypically depict a physical action performed by an agent upon a patient (9b), the argument that corresponds to the patient coincides with the intransitive argument in its form: morphologically unmarked and head-marked with the absolutive clitic paradigm on the verb. The agent argument is followed by a postposition *hẽ* and is marked on the verb with the ergative paradigm.

Stepping away from verbs that prototypically depict agent-patient activities, transitive verbs still go hand in hand with the same ergative characteristics of (9b): no intransitive realis *jy*, a *hẽ*-marked subject, and the use of the ergative clitic paradigm to double it.

- (10) **Ka hẽ ka= s= unpa nankã.**
 2SG ERG 2SG.ERG= 3SG.ABS= fear snake
 ‘You are afraid of snakes.’

However, the solid ergative picture presented above has a crevice: Irrealis mood⁴ correlates with a partial alignment split.

- (11) a. **Mãra** [ka= ti= kre] kooma krekjã amã.
 3SG IRR= 3SG.NOM= sing now night INES
 ‘He is going to sing tonight.’
- b. **Pykooma mãra hẽ** [ka= ti= a= sisy-ri] ka.
 morning 3SG ERG IRR= 3SG.NOM= 2ABS= hit-PRF 2SG
 ‘Tomorrow he will hit you.’

As opposed to (9), in irrealis sentences there is a different proclitic paradigm that doubles both types of subjects, those of intransitive (11a) and transitive (11b) verbs. Note that the marking of NPs remains unchanged: ergative followed by *hẽ*, absolutive unmarked. As a result, Panará presents two overlapping dimensions of alignment:

⁴The category so far identified as mood (Bardagil-Mas 2015; Dourado 2001, 2002) does not behave like a prototypical realis/irrealis split, but it does not align well with a future/non-future system either. In this paper, I remain agnostic as to what TAME category is really active in Panará clauses, and I will continue to use the realis/irrealis label proposed in the literature so far.

Table 1: Panará case marking

	Marking on arguments	Marking on verbs
Realis	ergative	ergative
Irrealis	ergative	accusative

The case system briefly presented so far sets Panará ergativity apart from the way in which it surfaces in other Northern Jê languages. It is the only language in the branch that presents a compact ergativity in the marking of argument DPs: the alignment split is limited to the marking of arguments on the predicate head. In Mëbêngôkre and Apinayé (Salanova 2007), the split is manifested on the choice of form of weak and strong pronouns: accusative in matrix clauses, ergative in dependent clauses with nonfinite verbal forms. In Kĩsêdjê (Nonato 2014) there is a similar finiteness-based pronoun case split. In Timbira Apaniekrà (Alves 2004), the alignment pattern is ergative in past-tensed clauses, and nominative in aspect- or polarity-selected clauses, while there is also an active-stative pattern. In contrast, Panará ergative marking stands out as unexpectedly robust: Ergativity has an overt realization on all NPs, not just on pronominal paradigms, and this case marking system is uniformly ergative, with no split.

A typical Jê feature is the existence of long and short forms of verbs, which are correlated with a finite/non-finite reading and, as was just mentioned, with alignment patterns. Panará also presents what at first glance could be considered as such, a longer form of verbs suffixed with *-ti/-ri*, as seen in (12):

- (12) a. Māra hẽ s= anpũ-ri māra.
 3SG ERG 3SG.ABS= see-PRF 3SG
 ‘He saw him.’
- b. Inkjẽ hẽ re= k= anpũ pjoo ka.
 1SG ERG 1SG.ERG= 2SG.ABS= see NEG 2SG
 ‘I didn’t see you.’

One might think that verbs with *-ti/-ri* are an equivalent of Jê long forms. However, the alternation of long and short forms has no impact on the properties of case marking in the clause, or on its dependent/matrix condition. At most, it could be said to correlate with the aspectual interpretation of the verb; something probably not faithfully reflected in the crude translations and glosses, and which will need to be looked at carefully in further field research. However, it has no morphosyntactic effects, as opposed to what we observe in Mëbêngôkre (13):

- (13) a. [Ba keke]. (Mëbêngôkre)
 1SG.NOM laugh.Short
 ‘I laugh.’
- b. [Ba a pumu].
 1SG.NOM 2SG.ACC see.Short
 ‘I see you.’

- c. [I keket] kêt.
1SG.ABS laugh-Long NEG
'I don't laugh.'
- d. [Ije a pumu] kêt.
1SG.ERG 2SG.ABS see-Long NEG
'I don't see you.'

In Mëbêngôkre, the ergativity-triggering long form of the verb appears when in the context of a dependent clause, illustrated here with selection by the negative existential *kêt*. See Salanova (2007) for an extended discussion.

Panará presents an ergative case system, a trait of the Jê family and the Northern branch. However, the specific nature of ergative case in Panará appears to be one more characteristic that sets it apart from its sister languages.

3 Non-core participants

In Panará there are a series of oblique cases that are marked by means of postpositions. At first glance, these are quite flexible in their positioning in the clause. They appear heading the PP in a position adjacent to it, as expected, but also among the preverbal morphology. In some cases, discussed in more detail below, the presence of P in the verb package allows the PP object to appear stranded (13b).

- (14) a. Kwakriti jy= ty inkjê pêê.
spider.monkey INTR= die 1SG MAL
'My spider monkey died.'
- b. Kwakriti jy= ra= pêê= ty inkjê (pêê).
spider-monkey INTR= 1SG.ABS= MAL= die 1SG MAL
'My spider monkey died.'

This flexible positioning is not limited to one postposition, as seen in (15), where the allative and final postpositions are both in the incorporated position, and the PPs themselves are omitted.

- (15) Jy= tâ= su= ra= pôô panãra.
INTR= ALL= FIN= 3PL.ABS= arrive Panará
'The Panará arrived (there) (to get it).'

Although Dourado (2004) claims that these PPs are applicatives, there is no valency alteration involved in this phenomenon. As seen in (16), the comitative participant is not actually a direct object, and *kwy* remains a monovalent intransitive verb.

- (16) Inkjê jy= ria= kô= ra= kwy kamera.
1SG INTR= 2PL.ABS= COM= 1SG.ABS= go 2PL
'I will go with you-pl.'

Panará does present a true valency-increasing operation, related to a morpheme that is homophonous to the instrumental-comitative postposition: a causative *ho*. Note the sentences in (17).

- (17) a. Ka jy= a= sōti.
 2SG INTR= 2SG.ABS= sleep
 ‘You sleep.’
- b. Ka hē ka= ho= sōti ka jōpāã.
 2SG ERG 2SG.ERG= CAUS= sleep 2SG child
 ‘You made your child sleep.’

The causative *ho* construction in (17b) presents the following differences relative to the stranded nouns in the constructions seen above (14b):

1. The phrase linked to *ho* (*ka jōpāã*) cannot occur as a PP
2. The subject acquires ergative marking
3. The verb lacks the realis modal clitic for intransitive predicates

This indicates quite clearly that *sōti* is transitivised as a result of the causativisation and seizes a direct object, which is to say that this construction actually constitutes a valency increase, unlike the phenomenon that is discussed in this section.

The postposition doubling/incorporation phenomenon was previously described by Dourado (2004), as well as in an article on a related issue in Mëbêngôkre (Carol and Salanova 2012). The main puzzle here is the fact that not all postpositions present the same behaviour. The remainder of this paper will be devoted to exploring reliable criteria to predict this division.

The following is an exhaustive list of the postpositions of Panará:

- (18) a. **Ablative**
 Jy= sūkwâ mū pēê.
 INTR= descend high ABL
 ‘She came down from high up.’
- b. **Adessive**
 Mãmã pēê jy= kwy suasêrĩ hã haty tã.
 CNJ ABL INTR= go hunt ADES forest ALL
 ‘Then he went hunting to the forest.’
- c. **Allative**
 Jy= ra= kwy inkô tã.
 INTR= 1SG.ABS= go water ALL
 ‘I’m going to the river.’
- d. **Comitative**
 Kara jy= mē= a= kwy inkjê kōō.
 2.DU INTR= DU= 2SG.ABS= go 1SG COM
 ‘You two went with me.’

e. **Final**

Jy= ra= pôô Kânko **su**.
INTR= 1SG.ABS= arrive Kanko FIN
'I came looking for Kanko.'

f. **Inessive**

Nāsisi mī isy **amã** kjanpo **amã**.
sweet caiman fire INES tamal INES
'Caiman is tasty roasted or baked with manioc bread.'

g. **Instrumental-comitative**

Nankã rê= **ho=** pa-ri inkjê hê kãrijô **ho**.
snake 1SG.ERG= INS= kill-PRF 1SG ERG tobacco INS
'I killed snakes with tobacco.'

h. **Locative**

Aty **rĩ** ra= paapê panãra.
forest LOC 1PL.ABS= live Panará
'Us Panará used to live in the forest.'

i. **Perlative**

Ikjyti **kõõ** ra= pan, rê= pa-ri.
tapir PER 3PL.ABS= walk 3PL.ERG= kill-PRF
'We would go after a tapir, we would kill it.'

j. **Temporal**

Suankia **tân** kiãrãsã hê ti= ra= sô-ri sãti suankiaramerân.
old TMP agouti ERG 3SG.ERG= 3PL.ABS= give-PRF peanut old.PL.DAT
'A long time ago, the agouti gave peanuts to the ancients.'

Setting aside for now specific postpositions, Panará PPs show four levels of behaviour:

1. Postposition in situ
2. Postposition in situ, absolutive clitic
3. Postposition in situ, absolutive clitic + incorporated P
4. PP object stranded, absolutive clitic + incorporated P

Dourado (2002) presents a clean division between the postpositions that tolerate incorporation and those that do not, as shown in Table 2.

She also mentions the difficulty of establishing which version of the homophonous postpositions is in play in cases of inessive/locative and instrumental-comitative/instrumental PPs, and admits to a certain arbitrariness of this split. A further problem with this approach is that it cannot address the relationship between the homophones that incorporate and those that do not. In the next section an alternative analysis is presented, and its predictive advantages and disadvantages are explored.

4 The verb package

As seen in Section 2, Panará verbs are nested inside a complex morphological unit that I descriptively call the verb package (Table 3).

Table 2: Postposition allomorphs (Dourado 2002), with updated Panará spelling

	Incorporation	No incorporation
<i>mã</i>	dative/benefactive	—
<i>pêê</i>	malefactive	ablative
<i>kõ</i>	comitative	locative (water)
<i>(r)amã</i>	inessive	locative
<i>ho</i>	instrumental-comitative	instrumental

Table 3: Major parts of the verb package

Position	Slot	Function
Prefix	1	mood – realis, irrealis
	2	dual number ergative, nominative dual number
	3	reciprocal, reflexive
	4	iterative, direction
	5	postposition
	6	absolutive, accusative dual number
	7	noun, classifier, dative
Verb	8	one or more, in a serial construction
Suffix	9	aspect

In the previous sections, we have seen some evidence that suggests a connection between the verb and a higher functional position, in which it surfaces with mood and participant morphology. We have also seen that an applicative-looking phenomenon with no valency alteration is in play with some adjunct PPs. In this section, I argue that the landing position for the verb corresponds to a functional category ξ , most likely related to mood or tense, and that this results from a type of Agree relation between ξ and the VP. The same phenomenon is also responsible for the continuum of applicative-like constructions.

I will adopt as a hypothesis an approach to opacity via Agree (Den Dikken 2017; Rackowski and Richards 2005), as defined in (19).

(19) **Opaque domain**

in $[\alpha \dots \pi \dots [\Delta \dots \beta \dots]]$, Δ is an opaque domain for a relation between α and β iff:

- Δ dominates β , and
- $\Delta \neq \alpha$ a goal in an Agree relation with an asymmetrically c-commanding probe π

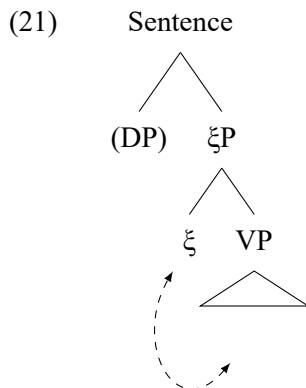
This definition of opacity implies that being in an Agree relation keeps a phrase active enough in the derivation that it does not yet become an atomic syntactic element with an inaccessible internal configuration. At first glance, (19) provides a good mechanism to derive both the tentative clausal

structure of Panará and the applicative-like constructions. Both of these cases will be discussed with more detail immediately, but let us first lay out in general terms the idea that will be explored: Panará sentences have a rich series of feature-checking processes between middle-field functional categories and phrases, the heads of which can or must be spelled out at the site of the functional head.

Panará finite sentences are, minimally, the verb or predicate head preceded by some morphology indicating various clausal categories, such as mood/tense, participants, postpositions, as well as reciprocity, reflexivity, negation, evidentiality and some class nouns. Inside this verb package, absolutive clitics like 1SG.ABS *ra=* in 20a are obligatory, but ergative clitics like 3SG.ERG *ti=* in 20b are potentially omitted while still yielding a grammatical sentence.

- (20) a. Inkjê jy= *(ra=) pôô.
 1SG INTR *(1SG.ABS=) come
 ‘I have arrived.’
- b. Pukjora hê (ti=) ku-ri apjã.
 Pukjora ERG (3SG.ERG=) eat-PRF turtle
 ‘Pukjora ate a turtle.’

In addition to the verb package, Panará sentences can have DPs, PPs and adverbials both preceding or following it. Based on the available evidence, I adopt the assumption that preverbal XPs are not occupying an A position. As for postverbal elements, we have already explored the idea that they find themselves in their base positions, rather than being right-extrapolated. Doing so also brings to the table the question of whether the verb package position is an instance of head movement or phrasal movement (remnant movement, given the fact that the verb would leave its arguments behind). The answer is that it is in fact neither of these: The VP is targeted for agreement by ξ , with two consequences: (a) the VP becomes a transparent domain, and (b) an agreement chain is created between the VP and ξ .

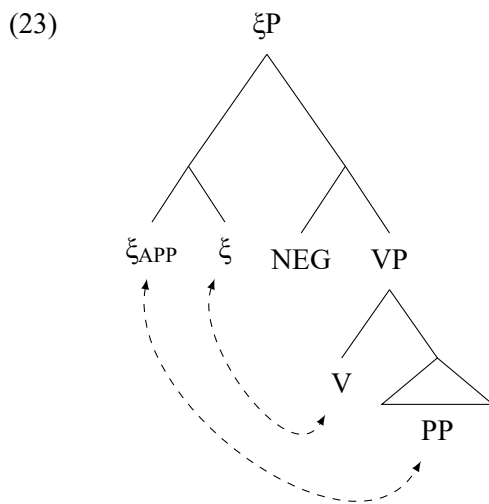


The position in which the Panará verb surfaces actually corresponds to ξ , which is to say, the upper end of the agreement chain. Why this happens is still unclear, but a descriptive constraint can be put forward:

- (22) **Full package requirement (FPR)**
 The head of an agreeing XP surfaces at the agreement chain’s higher position

The FPR warrants one additional observation: The verb package has some specification for being filled with visible material with a priority scale. Certain elements (the verb, the absolutive, the dative) are unconditionally required to be reflected in it, while other elements (the ergative, some PPs) have the option of being there or not. In the case of PPs, some have the option of also appearing in the lower position of the agreement chain. In this paper I will not attempt to syntacticise the FPR. I rather adopt it as a descriptive observation.

A combination of the hypothesis in (19) and the observation in (22) is sufficient to explain the applicative-like continuum of Panará PPs. Some postpositions need to agree with a functional head in the vicinity of ξ , for now ξ_{APP} , either completely (like dative *mã*) or when a specific type of participant needs to be licensed (like ablative/malefactive *pêê*). At spell-out, this PP has the impulse of reflecting its head in the verb package as per the FPR.



The approach to domain opacity adopted here provides an interesting take on the Adjunct Condition: Adjuncts that are not targeted for agreement are not transparent. Cases of leaky adjuncts (like in Truswell (2011)) can be explained as adjuncts with a tighter connection to the meaning of the predicate, and thus being in a sort of agreement relation:

- (24) a. *What did John drive Mary crazy [before reading *ec*]?
 b. What did John drive Mary crazy [whistling *ec*]?

In (24b) the aspect-flavoured adjunct either agrees or receives case from a case licenser, giving an exception to the Adjunct Condition. For reasons of space and scope, this issue cannot be argued fully in the present paper. It does, however, offer a promising angle from which to approach the issue of Panará postpositions: Panará PPs that cannot appear doubled in the verb package are frozen adjuncts, lacking an agreement relation. Those PPs that can appear doubled by either the head of the PP (the P) or the head of its dependent (the D, that is, the absolutive clitic) are active and transparent due to being licensed in a feature-checking relation with a functional head in the vicinity of the middle field.

A similar situation could explain what has sometimes been called “functional clitics”, like Spanish dative *le* or Catalan *li*. Dative arguments must be doubled by a clitic if they are animate or affected. In featural terms, these clitics would signal a functional category that is responsible for the licensing of a subtype of datives:

- (25) *(Li) vaig cantar una cançó al mestre. (Catalan)
 *(DAT) past.PRF sing one song DAT.the teacher
 ‘I sang the teacher a song.’

Available Panará data on this issue support the approach laid out in this section. Ablative/malefactive obliques provide a straightforward parallel to Romance dative clitics. With a general semantics of “away from,” the feature-checked version that can double in the verb package and leave the PP object stranded takes affected participants, as in (26).

- (26) a. Tepantê jy= (*pêê=) pôô inkô pêê.
 fish.agentive INTR (*ABL=) arrive water ABL
 ‘The fisherman arrived from the river.’
 b. Kwakriti jy= ra= pêê= tyj inkjê (pêê).
 spider.monkey INTR= 1SG.ABS= MAL= die 1SG (MAL)
 ‘My spider monkey died.’

It could be imagined that the relevant property that triggers the two readings of *pêê*, the ablative and the ξ -licensed malefactive, is animacy rather than affectedness. However, ablatives with an animate participant are still not licensed for doubling in the verb package, as seen in (27a), while a similar malefactive is in effect doubled (27b).

- (27) a. Perankô pêê jy= (*pêê=) ra= pôô.
 Perankô ABL INTR= (*ABL=) 1SG.ABS arrive
 ‘I arrived from Perankô.’
 b. Jy= ra= pêê= a= tēē.
 INTR= 1PL.ABS= MAL= 2SG.ABS= leave
 ‘You left against us [without consulting the community, or against their instructions].’

For instrumental-comitative *ho*, instrumentals appear to always be agreeing adjuncts (28), while comitatives seem to present an animacy asymmetry: Inanimate participants can be doubled in the verb package but the comitative object cannot appear stranded (29a), whereas animate comitatives are both doubled and stranded (29b).

- (28) Nankãã rê= ho= pa-ri inkjê hē karijô *(ho).
 snake 1SG.ERG= INS= kill-PRF 1SG ERG tobacco *(INS)
 ‘I killed snakes with tobacco.’
 (29) a. Mãra jy= (ho=) pôô sō *(ho).
 3SG INTR= (INS=) come food *(INS)
 ‘He arrived with food; he brought food.’
 b. Kamera jy= ra= ho= ria= tē inkjê kri tã.
 2PL INTR= 1SG.ABS= INS= 2PL.ABS= run 1SG village ALL
 ‘You-pl travelled with me to the village.’

Upon closer inspection, allative *tã* turns out to also have a doubling counterpart with different semantics, which so far appears to correspond to a comitative. Although further work is necessary to try to establish the semantic differences between the multiple Panará comitatives, it can be seen that the allative cannot double in the verb package (30a-b), while its comitative version can (30c).

- (30) a. Jy= tã= ra= kwy inkô tã.
 INTR= ALL= 1SG.ABS= go water ALL
 ‘I went to the river.’
- b. Rê= tã= ku-ri kjanpo amã tepi Jôsã tã.
 1SG.ERG= COM= eat-PRF manioc-bread INES fish Jôsã COM
 ‘I ate fish with manioc bread together with Jôsã.’

Dative clitics appear to be a different type of phenomenon. While the dative postposition is *mã*, there is no equivalent of the construction with the postposition and an absolutive clitic in the verb package. Instead, the dative can be doubled with either the absolutive series or a dedicated paradigm that looks suspiciously like the strong pronouns (*kjê*, *ka* and *mã* for singular first, second and third person respectively). The dative then appears to behave like an incorporated participant, rather than an adjunct in an Agree relation. The behaviour of dative *mã*, unlike the rest of the postpositions, and its dedicated number allomorph identical to the ergative (*inkjêmerân* ‘us dative/ergative’ instead of **inkjêmera mã* or **inkjêmera hẽ*) set it apart from the phenomenon addressed in this paper. In the case of ergative participants, evidence like the causative *ho* seems to suggest that a similar feature-checking relation takes place between the ergative DP and *v*. Both ergative and dative remain to be fully addressed in further work.

The picture that emerges for the applicative-like continuum of Panará oblique participants is not very different from that of Catalan or Spanish datives, where clitic-doubling postpositions carry a specific semantic content when they are licensed by ξ_{APP} via Agree. Some gaps remain, but the ongoing analysis of collected texts and elicitation work with informants will allow to paint a complete picture of the phenomenon at hand. Table 4 reflects the aspects that are clear and those that are less so.

Table 4: Panará postpositions

Postposition	Basic semantics	ξ -licensed
<i>pêê</i>	ablative	malefactive
<i>kõ</i>	perlative	comitative
<i>(r)amã</i>	inessive	?
<i>ho</i>	comitative (inanimate)	instrumental, comitative (animate)
<i>rĩ</i>	locative	—
<i>su</i>	final	final
<i>tã</i>	allative	comitative
<i>tân</i>	temporal	?

Panará presents some evidence for domain opacity being related to feature-checking relations and for a non-syntactic head movement by the head of a phrase that enters in this type of relation

with a functional head. At this point of the discussion, some terminological clearing up is necessary. So far, what have been considered Agree relations bear little resemblance with the way agreement is commonly conceptualized as a linguistic phenomenon:

(31) **Agreement**

A variation in the form of a linguistic element in accordance with the presence of another element

The “agreement” relations of adjuncts, and between ξ and the VP, could be said to not really be instances of what we consider agreement. It rather resembles more a relation of licensing, or introduction of syntactic elements. This departs from our establishment of opaque and transparent domains (19), in which goalness is what makes a domain transparent for certain operations. Rather, at least for the cases examined in Panará, it could be the other way around: Syntactic elements that require the contribution of featural content remain active, and transparency is either a requisite or a consequence of that. Data from Panará oblique participants support the suspicion that, despite a clear overlap, Agree and agreement correspond to separate syntactic operations (Preminger 2013).

5 Conclusion

This paper has focused on a puzzling characteristic of Panará morphosyntax, namely the restrictions on the presence of postpositions in the verb package together with clitics that double oblique objects. By taking an approach based on constituent opacity and feature-checking relations, the focus on valency in Panará has shifted from the valency specifications of verbs to the presence of functional content that is responsible for licensing specific types of oblique participants. The status of these PPs as adjuncts or arguments is therefore an open question. The prediction is that Panará doubling postpositions will present some further transparency effects than their frozen counterparts. Other empirical questions concern the universality of a feature-checking approach to opacity, and the source and distribution of the relevant features.

References

- Alves, F. (2004). *O timbira falado pelos Canela Apaniekrá: uma contribuição aos estudos da morfossintaxe de uma língua Jê*. PhD thesis, Universidade Estadual de Campinas, Campinas.
- Alves, F. and Gildea, S. (2016). Reconstructing the source of nominative-absolutive alignment in two amazonian language families. In Barðdal, J., Lujón, E., and Gildea, S., editors, *Reconstructing Grammar: Cognates and Directionality*. Brill, Leiden.
- Bardagil-Mas, B. (2015). Tangled up in mood: Exploring Panará split ergativity. *Linguistics in the Netherlands*, 32:1–15.
- Carol, J. and Salanova, A. (2012). On pseudo-applicatives. *Cahiers Linguistiques d’Ottawa*, 37:22–42.
- Corbett, G. G. (2006). *Agreement*. Cambridge University Press, Cambridge, 1 edition.
- Den Dikken, M. (2017). *Dependency and directionality*. Cambridge University Press, Cambridge.
- Dourado, L. G. (2001). *Aspectos morfossintáticos da língua panará (jê)*. PhD thesis, Universidade Estadual de Campinas, Campinas.

- Dourado, L. G. (2002). Ergatividade em Panará. In Queixalós, F., editor, *Ergatividade na Amazônia*. UnB, Brasília.
- Dourado, L. G. (2004). O avanço de oblíquos em panará. *LIAMES*, 4:43–50.
- Mahajan, A. (1994). The ergativity parameter: have/be alternation, word order and split ergativity. In González, M., editor, *Proceedings of the 24th conference of the North East Linguistic Society (NELS 24)*, volume 1, page 317–331. Cambridge University Press, Amherst, MA, glsa edition.
- Nonato, R. (2014). *Clause-chaining, switch-reference and coordination*. PhD thesis, Massachusetts Institute of Technology, Cambridge, MA.
- Oliveira, C. (2005). *The language of the Apinajé people of Central Brazil*. PhD thesis, University of Oregon.
- Preminger, O. (2013). That's not how you agree: a reply to Zeijlstra. *The Linguistic Review*, 30:491–500.
- Rackowski, A. and Richards, N. (2005). Phase edge and extraction: A tagalog case study. *Linguistic Inquiry*, 36:565–599.
- Rodrigues, A. (1999). Macro-Jê. In Dixon, R. M. W. and Aikhenvald, A., editors, *The Amazonian languages*. Cambridge University Press.
- Salanova, A. (2007). *Nominalizations and aspect*. PhD thesis, Massachusetts Institute of Technology, Cambridge, MA.
- Salanova, A. (2017). Ergativity in Jê languages. In Coon, J., Massam, D., and Travis, L., editors, *Oxford Handbook of Ergativity*. Oxford University Press, New York. To appear.
- Trask, R. L. (1979). On the origin of ergativity. In Plank, F., editor, *Ergativity*, page 385–406. Academic Press, New York.
- Truswell, R. (2011). *Events, Phrases, and Questions*. Oxford University Press, Oxford.