

# 'Tense' Marked Obliques in Malagasy\*

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**ABSTRACT:** In Malagasy, spatial deictic adverbials and certain PPs may carry the prefix *t-*. This prefix is usually analyzed as a past tense marker, since oblique predicates take *t-* when denoting past states, while oblique modifiers typically require *t-* when the verb is marked for past tense. It is generally assumed that 'tense matching' is mandatory. Here, however, I present data showing that past tense verbs may take non-*t*-marked obliques (mismatching). When the oblique denotes a goal, mismatching generally indicates that the theme of motion is currently occupying the endpoint of motion, or has not yet reached it. When the oblique denotes an instrument, location, etc., mismatching triggers a past habitual reading. I propose a provisional account of these facts, which treats *t-* as a marker of temporal boundedness and captures the contrast between goal and non-goal obliques in terms of where they merge in the syntactic structure.

In this paper I discuss the distribution of the prefix *t-* in Malagasy, a language of the Philippine type spoken on Madagascar (here I focus on the standard dialect).<sup>1</sup> *T-* attaches to spatial deictics and certain types of PPs and adverbials, and is generally analyzed as a past tense marker. This is illustrated in (1), where the deictic phrase constitutes the main predicate of the sentence (note the absence of a copula). Sentence (1c) shows that when the deictic takes *t-*, the clause receives a past tense interpretation, while (1a,b) show that *t-* absent when the clause has a present tense or irrealis/future interpretation (future/irrealis being marked by the particle *ho*):<sup>2</sup>

- (1) a. *Any anati-n' ny ala ny gidro*  
there inside-Lnk Det forest Det lemur  
"The lemur is there in the forest"
- b. *Ho any anati-n' ny ala ny gidro*  
Irr there inside-Lnk Det forest Det lemur  
"The lemur will be there in the forest"

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\* This paper supersedes my earlier work on this topic, which appeared as Pearson (2000, 2001). These articles were based on work with a single native speaker in Los Angeles. Subsequent fieldwork with multiple speakers in Madagascar (Antananarivo and Nosy Be) showed that the first speaker's judgements were rather idiosyncratic, necessitating a reassessment of the phenomenon.

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<sup>1</sup> Malagasy is a verb-initial language with a relatively fixed word order (traditionally characterised as VOS). Clauses generally consist of a *predicate phrase* followed by a clause-final *trigger* (usually called the *subject*, but analyzed in Pearson 2005 as an A' element). As in other Philippine-type languages, the grammatical function of the topic is indicated by the *voice* form of the verb. In this paper, two voice forms appear in the examples, the *actor-topic* (or 'active') form, used when the external argument of the clause acts as trigger; and the *theme-topic* (or 'passive') form, used when an internal argument is the trigger. For more on the Malagasy voicing system, as well as general information on the morphosyntax and word order of the language, see Keenan (1976), Guilfoyle et al. (1992), Pearson and Paul (1996), Paul (1998), Pearson (2005), Rasoloson and Rubino (2005), and references cited therein.

<sup>2</sup> The following abbreviations are used in the examples: 1s = 1<sup>st</sup> singular pronoun/enclitic, 12 = 1<sup>st</sup> inclusive pronoun/enclitic, 3 = 3<sup>rd</sup> (singular/plural) pronoun/enclitic, AT = actor-topic, Det = determiner, Irr = irrealis, Lnk = linker, Loc = locative proclitic, Pst = past, TT = theme-topic. The *t-* prefix is glossed simply as "T" throughout.

- c. *T-any anati-n' ny ala ny gidro*  
 T-there inside-Lnk Det forest Det lemur  
 “The lemur was there in the forest”

*T-* turns out to have rather complex effects on interpretation. Its presence or absence seems to be determined sometimes by tense, sometimes by aspect or aspectual focus. In this talk I describe the distribution of this prefix in detail, and present the beginnings of a unified analysis. I argue that *t-* attaches to spatio-temporal predicates and marks them as temporally bounded. The apparent differences in function of *t-* are an effect of where the predicate merges within the larger clause.

## 1. Obliques

The prefix *t-* attaches to a number of different elements. For example, spatial deictic adverbials, equivalent to “here” and “there” in English, all take *t-*. The most common deictic adverbials are listed in Table 1. Other elements which take the *t-* prefix are given in Table 2. For convenience, I will use the term **oblique** to refer to any expression formed with the items in Tables 1 and 2.<sup>3</sup>

TABLE 1. Deictic adverbials

BARE		T-MARKED		
visible	invisible	visible	invisible	
<i>ety</i>	<i>aty</i>	<i>tety</i>	<i>taty</i>	‘here’ (in contact with speaker)
<i>eto</i>	<i>ato</i>	<i>teto</i>	<i>tato</i>	‘here’ (close to speaker)
<i>eo</i>	<i>ao</i>	<i>teo</i>	<i>tao</i>	‘here’ (within domain of speaker)
<i>eny</i>	<i>any</i>	<i>teny</i>	<i>tany</i>	‘there’ (away from speaker)
<i>ery</i>	<i>ary</i>	<i>tery</i>	<i>tary</i>	‘there’ (far from speaker)

TABLE 2. Other oblique(-forming) elements

BARE	T-MARKED	
<i>aiza</i>	<i>taiza</i>	‘where?’
<i>amin’</i>	<i>tamin’</i>	‘to, with, at, from’
<i>aloha</i>	<i>taloha</i>	‘before, earlier’
<i>aoriana</i>	<i>taoriana</i>	‘after, later’

Concerning the elements in Table 2: *aiza* acts as an interrogative operator, while *aloha* and *aoriana* function both as temporal adverbials and as prepositions. *Amin’* is a sort of all-purpose preposition in Malagasy, used to express a variety of semantic roles, including instrument (2a), goal or location (2b), and manner (2c):

- (2) a. *Manoratra taratasy amin’ ny penina ny mpianatra*  
 AT.write letter with Det pen Det student  
 “The student is writing a letter with a/the pen”

<sup>3</sup> There are other semantically similar elements in Malagasy which one might pre-theoretically call oblique phrases, but which are never prefixed with *t-*. In this paper, only phrases capable of taking *t-* will be referred to as obliques.

- b. *Mamelatra ny tsihy amin' ny gorodona i Ketaka*  
 AT.spread Det mat on Det floor Det Ketaka  
 “Ketaka is spreading the mats on the floor”
- c. *Miteny amin=panetran-tena foana izy*  
 AT.speak with=modesty always 3  
 “S/he always speaks modestly”

Note that all expressions of spatial location must include one of the deictic elements in Table 1. A deictic can occur by itself, as in (3a). It can also select a bare NP marked with the locative clitic *an-* (3b), or a PP headed by a preposition such as *amin'* or *anaty* (3c,d):<sup>4</sup>

- (3) a. *Ety ny boky*  
 here Det book  
 “The book is here”
- b. *Any am=pianarana ny ankizy*  
 there Loc=school Det children  
 “The children are at school”
- c. *H-ihaona any amin' ny tetezana isika*  
 Irr-AT.meet there at Det bridge 12  
 “We will meet at the bridge”
- d. *H-alatsa=ny any anaty lavabato ny vahitady*  
 Irr-TT.lower=3 there inside cave Det vine.rope  
 “They will lower the vine rope into the cave”

In the following discussion, obliques which take the prefix *t-* will be referred to as **t-marked**, or in the **t-form**, while obliques without *t-* will be referred to as **bare**.

## 2. T-marking and ‘tense matching’

I now turn to the distribution of t-marking. When the oblique functions as the predicate of a clause, t-marking appears to correlate with tense: the oblique is bare when the clause is present tense or irrealis, and t-marked when the clause expresses a past state of affairs. This is illustrated by the sentences in (1), repeated below as (4):

- (4) a. *Any anati-n' ny ala ny gidro*  
 there inside-Lnk Det forest Det lemur  
 “The lemur is there in the forest”

<sup>4</sup> Pearson (2001) presents evidence that the deictic forms a constituent with the following locative phrase or PP. I also present evidence that the elements in Tables 1-2, despite taking ‘tense’ marking, should not be treated as verbs, and that sentences like (3c,d) do not pattern as serial verb constructions.

- b. *Ho any anati-n' ny ala ny gidro*  
Irr there inside-Lnk Det forest Det lemur  
“The lemur will be there in the forest”
- c. *T-any anati-n' ny ala ny gidro*  
T-there inside-Lnk Det forest Det lemur  
“The lemur was there in the forest”

When the oblique is properly contained within a verbal predicate, the correlation between t-marking and tense is less straightforward. The usual generalization is that the form of the oblique is directly dependent on the tense of the verb: if the verb is in the present or irrealis form, as in (5a,b), the oblique must be bare, and if the verb is in the past form, as in (5c), the oblique must be t-marked.<sup>5</sup>

- (5) a. *Mamaky ny boky any an=tokotany ny mpianatra*  
AT.read Det book there Loc=garden Det student  
“The student is reading the book in the garden”
- b. *H-amaky ny boky any an=tokotany ny mpianatra*  
Irr-AT.read Det book there Loc=garden Det student  
“The student will read the book in the garden”
- c. *N-amaky ny boky t-any an=tokotany ny mpianatra*  
Pst-AT.read Det book T-there Loc=garden Det student  
“The student read the book in the garden”

If *t-* is a tense marker, then it would seem that the oblique must match the verb in tense: the *t-* form (redundantly) marks the clause as [+Past], while the bare form indicates [–Past]. As expected, *t-*marked obliques are disallowed in present tense and irrealis clauses:

- (6) a. \* *Mamaky ny boky t-any an=tokotany ny mpianatra*  
AT.read Det book T-there Loc=garden Det student  
“The student is reading the book in the garden”
- b. \* *H-amaky ny boky t-any an=tokotany ny mpianatra*  
Irr-AT.read Det book T-there Loc=garden Det student  
“The student will read the book in the garden”

However, when the verb is in the past tense things become more complex, showing that the ‘tense matching’ requirement is not absolute. In some cases, speakers report that only the *t-* form of the oblique is acceptable in past tense clauses, as in (7). But in other cases, the oblique can appear in *either* the *t-* form *or* the bare form. This is illustrated by (8c) and (8d), both of which are grammatical. (Interestingly, the acceptability of sentences like (8d) comes as a great surprise

<sup>5</sup> Verbs in the present tense are unmarked, while past tense is marked with the prefix *n(o)-*, and future/irrealis with the prefix *h(o)-*. In the actor-topic (AT) form, *n-* and *h-* replace the AT prefix *m-*; in all other forms, *n-* and *h-* are used before a consonant while *no-* and *ho-* are used before a vowel.

to some speakers, who were taught the tense matching rule in school. Nevertheless, all ten of the speakers I consulted agreed without hesitation that such sentences are fully natural. I have also found examples in texts.)

- (7) a. *N-andidy ny mofo t-amin' ny antsy i Naivo*  
 Pst-AT.cut Det bread T-with Det knife Det Naivo  
 “Naivo cut the bread with the knife”
- b. \* *N-andidy ny mofo amin' ny antsy i Naivo*  
 Pst-AT.cut Det bread with Det knife Det Naivo  
 “Naivo cut the bread with the knife”
- (8) a. *Miditra ao an=trano ilay vehivavy*  
 AT.enter there Loc=house that woman  
 “That woman is going into the house”
- b. \* *Miditra t-ao an=trano ilay vehivavy*  
 AT.enter T-there Loc=house that woman  
 “That woman is going into the house”
- c. *N-iditra t-ao an=trano ilay vehivavy*  
 Pst-AT.enter T-there Loc=house that woman  
 “That woman went into the house”
- d. *N-iditra ao an=trano ilay vehivavy*  
 Pst-AT.enter there Loc=house that woman  
 “That woman has gone into the house”

The possible combinations of tense marking and t-marking are given schematically in (9): Present and irrealis verbs require bare obliques, while past tense verbs can take either the t-form (9c) or the bare form (9d). For the remainder of this paper, when discussing obliques in verbal predicates, I will confine my attention to the clause types in (9c,d).

- (9) a. **PRES-Verb ... Ø-Oblique**  
 b. **IRR-Verb ... Ø-Oblique**  
 c. **PAST-Verb ... T-Oblique**  
 d. **PAST-Verb ... Ø-Oblique**

### 3. Goal obliques and ‘present relevance’

For the most part, speakers agree that the presence or absence of t-marking in past tense clauses affects the meaning. However, the nature of the effect seems to vary with the semantic role of the oblique, with goal obliques patterning differently from obliques that express instrument, location, source, et cetera. Consider first the examples in (8c,d) above: Here, the oblique occurs with a verb of motion, and expresses the goal or endpoint of the movement. In such cases, the form of the oblique depends on something like the ‘present relevance’ of the goal: In (8d), it is under-

stood that the woman is still in the house at the moment of speaking; while in (8c), there is no such implication: more likely she has already left the house. Hence, (8d) would be an appropriate answer to the question “Where is the woman now?”, whereas (8c) would not. (In the English glosses, this contrast is reflected in an approximate way by means of the tense/aspect form of the verb: simple past “went” versus present perfect of result “has gone”.)

A similar pair of examples is given in (10): (10a) means that the lemur is currently at the top of the tree, *or* is on his way there at the moment when the sentence is uttered. On the other hand, (10b) would be used if the event is ‘more in the past’ (to quote one of my consultants): in (10b), there is no implication that the lemur is still in the tree when the sentence is uttered.

- (10) a. *N-iakatra eny amin' ny tompo-n' ilay hazo ilay gidro*  
 Pst-AT.ascend there at Det top-Lnk that tree that lemur  
 “That lemur { has gone / is going } to the top of that tree”
- b. *N-iakatra t-eny amin' ny tompo-n' ilay hazo ilay gidro*  
 Pst-AT.ascend T-there at Det top-Lnk that tree that lemur  
 “That lemur went to the top of that tree”

Finally, consider the examples in (11), containing a transitive motion verb: (11a) would be used if the speaker assumes that the children are at school now, or are on their way. (11b) carries no such inference: it is equally or more likely that the children are no longer at school when the sentence is uttered.

- (11) a. *N-alefa-n' ny vehivavy any am=pianarana ny ankizy*  
 Pst-TT.send-Lnk Det woman there Loc=school Det children  
 “The woman (has) sent the children to school”
- b. *N-alefa-n' ny vehivavy t-any am=pianarana ny ankizy*  
 Pst-TT.send-Lnk Det woman T-there Loc=school Det children  
 “The woman sent the children to school”

To summarize: when a verbal predicate in the past tense contains an oblique denoting a goal or endpoint of motion, that oblique is bare if the utterance time precedes or overlaps with the interval during which the theme of motion occupies the endpoint; otherwise the oblique carries the prefix *t-*. Put another way, the oblique is bare just in case the motion event transpired (or was initiated) in the recent past, such that the endpoint has ‘present relevance’ when the sentence is uttered.

#### 4. Non-goal obliques and habitual aspect

Most of the examples in my data pattern with (9)-(11), and it seems that some speakers allow the bare form in past tense clauses only if the oblique denotes a goal. However, other speakers also allow this pattern when the oblique denotes an instrument, location, or source. Here, though, the bare form does not mark recent past, or ‘present relevance’, but instead something like habitual aspect. Consider (12), where an oblique headed by *amin'* denotes the instrument with which the

event is carried out. Whereas (12a) describes a particular event in the past, (12b) indicates that the speaker was in the habit of cutting wood with an axe:

- (12) a. *N-ikapa hazo t-amin' ny famaky aho*  
 Pst-AT.chop wood T-with Det axe 1s  
 “I chopped wood with a/the axe”
- b. *N-ikapa hazo amin' ny famaky aho*  
 Pst-AT.chop wood with Det axe 1s  
 “I { would / was wont to } chop wood with a/the axe”

With non-goal-denoting obliques, the bare form seems to be used specifically when the speaker does not have a particular event or time-frame in mind. Compare the sentences in (13), where the oblique denotes a source. Here the adverb *foana* “always” has been added in order to block the sentence from referring to a single event. (13a) denotes a temporally bounded series of events, and hence has an episodic or iterative-like quality: the speaker has a particular period of time in mind during which Naivo repeatedly borrowed pens. (13b), by contrast, seems to denote a general propensity rather than a particular episode. According to one of the speakers I consulted, (13b) sounds like a complaint about Naivo: that he would routinely borrow other people’s pens because he couldn’t be bothered to bring his own.<sup>6</sup>

- (13) a. *N-indrana penina t-amin' ny nama=ko foana i Naivo*  
 Pst-AT.borrow pen T-from Det friend=1s always Det Naivo  
 “Naivo always borrowed pens from my friend(s)”
- b. *N-indrana penina amin' ny nama=ko foana i Naivo*  
 Pst-AT.borrow pen from Det friend=1s always Det Naivo  
 “Naivo was always borrowing pens from my friend(s)”

The distribution of t-marking is summarized in the table below:

TABLE 3. Interpretation of t-marking

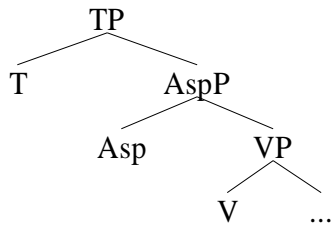
FUNCTION OF OBLIQUE	T-MARKED	BARE
<i>stative predicate</i>	past event	non-past event
<i>goal complement (endpoint of motion)</i>	theme is no longer at endpoint	theme is currently at endpoint, <i>or</i> has not yet reached endpoint
<i>adjunct (instrument, location, source, etc.)</i>	specific past event	ongoing/future event, <i>or</i> habitual event (propensity)

<sup>6</sup> Given the contrast in (12) and (13), it is possible that (7b) above, marked as ungrammatical, is in fact merely pragmatically infelicitous: It is difficult to imagine a situation in which an individual would habitually cut a single loaf of bread with a knife.

## 5. Towards an analysis: *t*- as a marker of boundedness

While I do not have a complete account of the interpretation of *t*-, as summarized in Table 3, I would like to pursue a provisional analysis along the following lines: First, drawing on authors such as Stowell (1996), Demirdache and Uribe-Etxebarria (1997), Pancheva (2002), and others, I will treat tense and aspect as predicates which serve to order temporal arguments. Consider the structure in (14):

(14)



I assume that VP and other eventuality-denoting expressions introduce a temporal argument called the **event time**, which specifies the interval during which the eventuality holds. The event time is bound in the domain of an aspect head Asp, which selects the VP. The Asp head specifies a containment relation between the event time and what I'll call the **evaluation time**, which in turn determines the aspect of the clause: when the event time is properly contained in the evaluation time, the clause is perfective, and when the evaluation time is contained in the event time, the clause is imperfective. The evaluation time is in turn bound in the domain of the tense head T, which anchors the clause deictically by ordering the evaluation time relative to some reference point, typically the **utterance time**.

With this as background, I propose the following analysis of *t*-marking:

- (15) a. Obliques are stage-level predicates. As such, they denote states which hold for a specifiable interval of time, and thus presumably introduce an event time argument.
- b. The *t*- prefix indicates that the oblique's event time is **bounded**—i.e., the interval during which the state denoted by the oblique holds is properly contained within the evaluation time. (Hence, *t*-marking is something like perfective marking on verbs in languages like Russian and Chamorro; cf. Chung & Timberlake 1985.)

How the claims in (15a,b) play out in terms of the patterns in Table 3 is determined by the function of the oblique within the larger clause. Consider first sentences like (16), where the oblique functions as the main predicate: T-marking in (16c) indicates that the predicate is bounded, meaning that the beginning and end points of the event time are properly contained within the evaluation time. This is interpreted such that the state of affairs of the lemur being in the forest began in the past and is now over. Absence of *t*-marking in (16a,b) signals that the state of affairs is not over, but ongoing or hypothetical.<sup>7</sup>

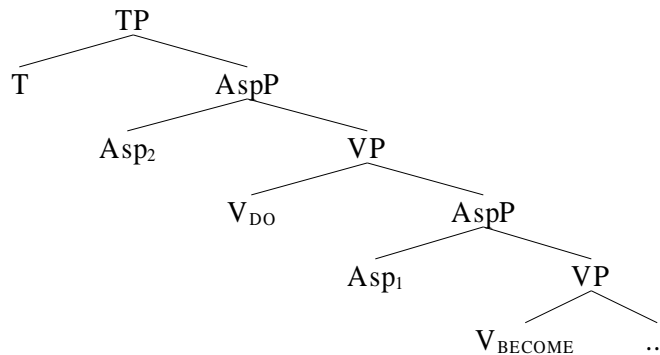
<sup>7</sup> In many languages, boundedness or perfectivity is compatible with future tense, so we might ask why *t*-marking is not possible in (16b). I will assume that Malagasy lacks a true future tense form, and that *ho* in (16b) is a marker of irrealis mood, as the gloss indicates. I speculate that irrealis mood is incompatible with temporal boundedness.



- (16) a. *Any anati-n' ny ala ny gidro*  
 there inside-Lnk Det forest Det lemur  
 “The lemur is in the forest”
- b. *Ho any anati-n' ny ala ny gidro*  
 Irr there inside-Lnk Det forest Det lemur  
 “The lemur will be in the forest”
- c. *T-any anati-n' ny ala ny gidro*  
 T-there inside-Lnk Det forest Det lemur  
 “The lemur was in the forest”

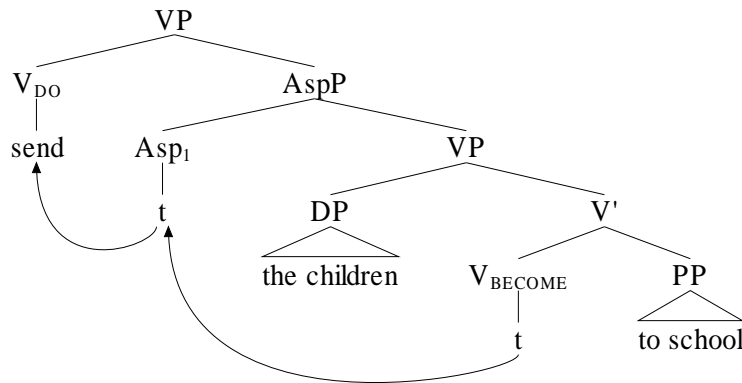
As for the difference between goal obliques and adjunct obliques in verbal predicates, I attribute this to their position of attachment: goal obliques merge low in the structure, while adjunct obliques merge higher. I assume that verbal predicates involve the hierarchy of projections shown in (17): Accomplishment predicates (in the sense of Vendler 1967) have two VP layers, where the higher layer is associated with an activity and the lower layer is associated with a change of state (activity predicates, which are atelic, presumably lack the lower layer; while achievement predicates, which lack duration, lack the higher layer). Each layer introduces its own event time argument, where the higher argument is associated with the time of the activity and the lower argument with the resulting state. The VP layers are each selected by an Asp head: Asp<sub>2</sub> orders the activity time relative to the evaluation time, while Asp<sub>1</sub> orders the result time relative to the evaluation time.

(17)



I assume that goal obliques are generated low in this structure, in the complement of V<sub>BECOME</sub>, as in (18). Here the oblique functions as the delimiter of a telic event, much as resultative secondary predicates do: Just as the adjective phrases in (19a,b) express the state of the patient as a result of the change-of-state event denoted by the verb, so the PPs in (19c,d) express the location of the theme as a result of a change-of-location event:

(18)



- (19) a. The tire<sub>i</sub> went [<sub>AP</sub> PRO<sub>i</sub> flat ]  
 b. He pounded the metal<sub>i</sub> [<sub>AP</sub> PRO<sub>i</sub> flat ]  
 c. The children<sub>i</sub> went [<sub>PP</sub> PRO<sub>i</sub> to school ]  
 d. The mother sent the children<sub>i</sub> [<sub>PP</sub> PRO<sub>i</sub> to school ]

Since goal obliques are low in the structure, their event time argument is bound in the domain of the lower aspect head, Asp<sub>I</sub>, and hence picks out the result time—that is, the time during which the theme is at the endpoint of the motion event. Consider the examples in (20): In (20a), t-marking indicates that the time at which the lemur is at the top of the tree is properly contained within the evaluation time—which, since the verb is in the past tense, is ordered before the utterance time. Hence the lemur is no longer at the top of the tree when the sentence is uttered. In (20b), the absence of t-marking indicates that the time at which the lemur is at the top of the tree is *not* properly contained within the evaluation time, and hence does not precede the utterance time. And yet the verb is marked for past tense, showing that the activity of ascending has been initiated (cf. the discussion of (21) below). The two possible interpretations of (20b) follow from these ordering relations: either the lemur is currently at the top of the tree (the activity precedes the utterance time, while the resulting state overlaps the utterance time), or the lemur is on its way to the top of the tree (the activity overlaps the utterance time, while the resulting state follows the utterance time).

- (20) a. *N-iakatra eny amin' ny tompo-n' ilay hazo ilay gidro*  
 Pst-AT.ascend there at Det top-Lnk that tree that lemur  
 “That lemur { has gone / is going } to the top of that tree”
- b. *N-iakatra t-eny amin' ny tompo-n' ilay hazo ilay gidro*  
 Pst-AT.ascend T-there at Det top-Lnk that tree that lemur  
 “That lemur went to the top of that tree”

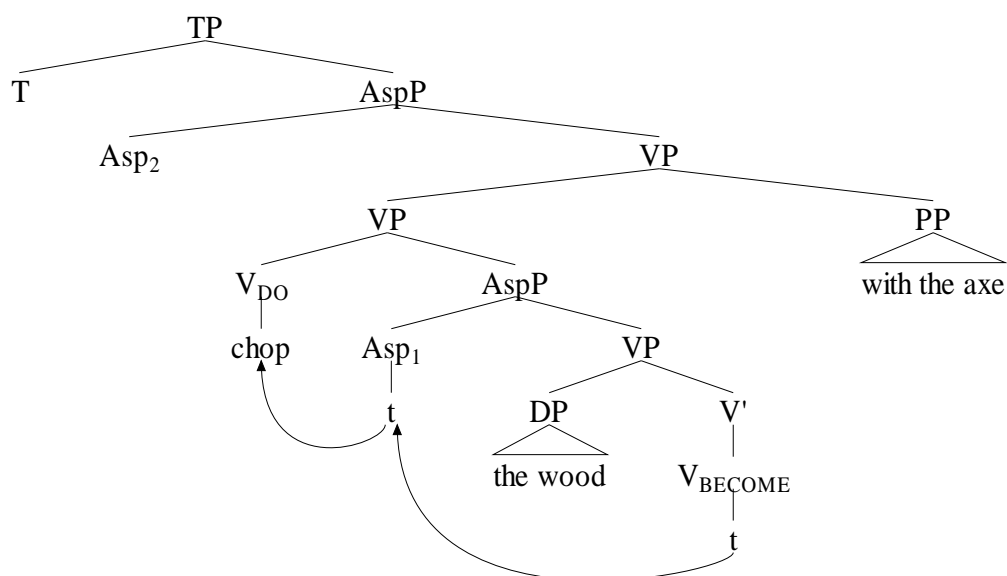
In order for this account to work, I must assume that tense marking on verbs in Malagasy only serves to order (the beginning point of) the activity time relative to the utterance time. Hence, past tense marking signals merely that an event has been initiated. The fact that telic events in the past tense are normally interpreted as completed is a matter of implicature rather than entailment in this language. This is suggested by examples like (21a) (from Phillips 1996; see also Travis

1996 for discussion). As the English gloss implies, (21a) is most naturally taken to mean that the child actually caught the dog, rather than merely setting out to catch it; however, this interpretation can be cancelled without creating a logical contradiction, as shown by the fact that (21b) is semantically well-formed. All that is required is that the activity associated with catching have been initiated.

- (21) a. *N-isambotra ny alika ny zaza*  
 Pst-AT.catch Det dog Det child  
 “The child caught the dog”
- b. *N-isambotra ny alika ny zaza, nefa faingana loatra ilay alika*  
 Pst-AT.catch Det dog Det child but quick too that dog  
 “The child set out to catch the dog, but that dog was too quick”  
 lit. “The child caught the dog, but that dog was too quick”

Lastly, consider instrumental obliques and other adjuncts: These presumably merge in some higher position, perhaps adjoined to the higher VP layer, as in (22). In this position the oblique is within the scope of  $Asp_2$ , and outside the scope of  $Asp_1$ ; hence the oblique’s event time argument picks out the time of the activity rather than the time of the resulting state (if any).

(22)



When the oblique is t-marked, as in (23a), the activity time is bounded and the result is a normal past tense reading. When the oblique is bare, however, the activity time is unbounded. In order for a temporally unbounded activity to be compatible with past tense, the predicate must be interpreted as referring not to a specific event or episode in the past, but rather to a past habit or propensity. This gives us the habitual reading found in (23b). (This way of construing an activity as temporally unbounded may be unavailable to some speakers, which would explain why not all speakers accept sentences such as (23b).)

- (23) a. *N-ikapa hazo t-amin' ny famaky aho*  
 Pst-AT.chop wood T-with Det axe 1s  
 “I chopped wood with a/the axe”
- b. *N-ikapa hazo amin' ny famaky aho*  
 Pst-AT.chop wood with Det axe 1s  
 “I used to chop wood with a/the axe”

I conclude this paper by briefly considering some examples of t-marking which do not fit neatly into the analysis outlined above.

## 6. Residual cases

There are a number of examples in my field notes where the choice between the t-form and the bare form seems to be determined not by tense or aspect (‘present relevance’, habituality), but by something like specificity. Compare the sentences in (24) below. One speaker described the difference between (24a) and (24b) as having to do with how precise or deliberate the event is: (24a) might be used if the speaker were aiming for a particular basket, while (24b) might be used if the basket just happened to be there. Another speaker reported that sentences like (24a) focus on the goal, while sentences like (24b) focus on the action. These speakers might be responding to a difference in the boundedness of the goal, but if so, then boundedness is construed rather differently in (24) compared to the examples in section 3. Examples like this suggest that boundedness might be linked to—or even reducible to—notions like specificity, or perhaps **aspectual focus** (in the sense of Erteschik-Shir and Rapoport 1999).

- (24) a. *N-atsipi=ko t-ao anaty harona ny vato*  
 Pst-TT.throw=1s T-there inside basket Det stone  
 “I threw the stone into a/the basket”
- b. *N-atsipi=ko ao anaty harona ny vato*  
 Pst-TT.throw=1s there inside basket Det stone  
 “I threw the stone into a/the basket”

Consider also the pair in (25): One speaker reported that (25a) sounded more ‘precise’ than (25b), such that (25a) would be preferred if the speaker had a particular book in mind. When asked to pair these examples with possible translations into French (the contact language for this speaker), she matched (25a) with a gloss using the *passé composé* form of the verb, while for (25b) she preferred a gloss with the *imparfait* form. In narratives, the *imparfait* is commonly used for backgrounded events while the *passé composé* is used for foregrounded events, suggesting that t-marking might be determined in part by discourse structure.

- (25) a. *N-ametraka boky t-eo amboni-n' ny latabatra aho*  
 Pst-AT.put book T-here on.top-Lnk Det table 1s  
 “I put (the) book(s) on the table” = “J’ai posé le livre sur la table”

- b. *N-ametraka boky eo amboni-n' ny latabatra aho*  
 Pst-AT.put book here on.top-Lnk Det table 1s  
 “I put (the) book(s) on the table” = “Je posais le livre sur la table”

Finally, (26a,b) show two ways of saying “The driver tried to put the car in the garage”. In both cases, it is understood that the driver failed to get the car in the garage. But according to three of my speakers, the sentences differ with respect to the cause of the failure. In (26a), the fault lies with the car, while in (26b), the fault lies with the garage; for example, the former would be used if the car wouldn’t start, while the latter would be used if the garage were too small.

- (26) a. *N-anandrana n-amp-iditra ny fiara t-ao anaty garazy ny mpamily*  
 Pst-AT.try Pst-AT.Caus-enter Det car T-there inside garage Det driver  
 “The driver tried [and failed] to put the car in the garage”
- b. *N-anandrana n-amp-iditra ny fiara ao anaty garazy ny mpamily*  
 Pst-AT.try Pst-AT.Caus-enter Det car there inside garage Det driver  
 “The driver tried [and failed] to put the car in the garage”

Interestingly, according to one of my consultants, (26b) is preferred when what is at issue is some ‘permanent property’ of the location—that is, a property which held in the past and continues to hold now: If the car wouldn’t go in because the garage was too small, this state of affairs could be expected to still hold at the moment when the sentence is uttered. On the other hand, if the car wouldn’t go in because it wouldn’t start, it is conceivable that that state of affairs no longer holds. Could this perhaps be accounted for in terms of the temporal unboundedness of the goal in (26b)? Clearly the fact that the oblique is embedded under the verb “try”, which forces a reading where the resulting state failed to come about, is a complicating factor. How *t*-marking interacts with factors of this sort, as well as factors like modality/intensionality and negation, is a topic which I intend to pursue in future research.

## 7. Conclusion

In this paper I discussed the distribution of the prefix *t-* on obliques in Malagasy. I showed that when the oblique denotes a state and functions as the main predicate of a clause, *t-* appears to mark past tense while absence of *t-* marks non-past. On the other hand, when the oblique denotes the endpoint of a motion event, *t-* indicates that the theme reached the endpoint but is probably no longer there, while absence of *t-* indicates the theme is currently at the endpoint or has not yet reached it. Finally, when the oblique is an adjunct denoting the instrument, location, source, etc., *t-* is used when the clause denotes a particular event in the past, and is absent when the clause denotes an ongoing, future, or habitual event or propensity.

I argued that *t-* indicates that the state denoted by the oblique is temporally bounded. How boundedness is interpreted depends on how the oblique is introduced within the larger clause. When the oblique is the main predicate, boundedness is equated with perfectivity, which is compatible only with past tense in this language (by assumption, there is no ‘true’ future tense in Malagasy—*h(o)*- being instead a marker of irrealis mood—and hence no future perfective, as there is in other languages). When the oblique denotes a goal, it merges low in the clause and expresses the resulting state of a telic event. Here, *t-* indicates that that resulting state properly

precedes the utterance time—that is, the theme is no longer at the endpoint. Finally, when the oblique is an adjunct, it merges higher in the clause, and modifies the activity component of an event. Hence the absence of *t-* on an adjunct oblique indicates that the activity is unbounded. When the verb is marked for past tense and the activity is unbounded, the predicate is interpreted as habitual, rather than referring to a specific event or series of events.

A number of important questions about the *t-* prefix remain unanswered. For example:

- Why does *t-* attach only to obliques? Why do only certain expressions bearing peripheral semantic roles take *t-* and not others?
- Does *t-* have cognates in any other Austronesian languages? (No obvious cognates have been located so far.)
- How coherent a notion is temporal boundedness? Even if it is a coherent notion, is boundedness really the correct notion to characterize the contribution of *t-*, or can the interpretive differences which I attribute to boundedness be accounted for in terms of some more basic feature? Is boundedness (or whatever the correct feature is) expressed on spatial deictics and PPs in other languages?

These are some of the issues which I hope to address in future research.

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