

Morphological marking of contrast in Tima

Laura Becker
University of Freiburg
Belfortstraße 18, 79085 Freiburg
becker.linguistics@gmail.com

Gertrud Schneider-Blum
University of Cologne
Albertus-Magnus-Platz, 50923 Köln
schneider_blum@yahoo.de

Abstract Tima (Niger-Congo, Sudan) has two morphological means to express contrast: focus marking and selective marking. We take the distribution of both marking options and their interaction as evidence for a broad approach to contrast, the latter being a gradient phenomenon rather than a categorical one. We show for Tima that exhaustivity and unexpectedness play a role in determining the strength of the contrast, with the selective marker and focus marker occurring with weaker and stronger types of contrast respectively. While the selective marker signals the existence of a set of alternatives singling out one alternative, the focus marker requires that the information under focus is either exhaustive or unexpected.

Keywords: Tima; contrast; focus; unexpectedness; information structure

1 Introduction

This study is concerned with the expression of contrast by two information-structural devices in Tima (Niger-Congo). Based on the Tima data discussed, we argue that contrast, though often closely associated with focus, is an independent phenomenon, as it can be expressed morphologically not only by focus marking but also by what we term selective marking. We consider the interplay of the two marking options in Tima as evidence for contrast being gradient rather than categorical: the selective marker is used for weaker types of contrast, while the focus marker signals stronger ones. Nevertheless, the selective marker can optionally occur with stronger types of contrast provided focus marking is also used.¹

The paper is structured as follows: Section 2 introduces the notion of contrast and other relevant concepts, and motivates our approach to contrast based on the predictions made by different accounts of contrast as well as the patterns found in Tima. Section 3 discusses the morphological marking of contrast in Tima, presenting the focus and the selective marker and their interaction. In Section 4, we summarise the relevant patterns found in Tima, on the basis of which we propose a broad and gradient account of contrast that captures the distribution of both markers. We argue that the two dimensions of exhaustivity and unexpectedness are relevant to distinguish between weaker and stronger contrastive contexts in Tima. We end the discussion with some concluding remarks.

2 Contrast

Contrast is a central information-structural notion which has been used and defined in various different ways (Molnár 2001; Umbach 2004; Repp 2010; 2016). An example

¹ Furthermore, though not discussed in detail in this paper, the expression of contrast in Tima is not confined to focus and selective constructions, but may also become evident in any description of pairing events, as indicated for example (37); for more information see Schneider-Blum & Hellwig (2018: 986-989).

Another dimension along which approaches to contrast differ is exhaustivity, i.e. the exclusion of alternatives other than the current one. Traditionally, it is assumed that contrast involves the chosen alternative at the exclusion of all (e.g. [É. Kiss 1998](#)) or at least one other alternative (e.g. [Molnár 2006](#): 220) to hold true. This corresponds to a more restrictive view of exclusion in contrast. A less restrictive position is presented in e.g. [Umbach \(2004](#): 164), where exclusion is treated as an integral part of certain types of contrast but as irrelevant for other types. For instance, corrective contexts such as example (1) are exhaustive by entailment in that they necessarily reject and thus exclude another explicit alternative. Other types of contrastive contexts may implicate exhaustivity but do not necessarily entail it, since the exhaustivity-effect can be cancelled ([Umbach 2004](#); [Repp 2016](#)). Example (3) illustrates this with a question-answer pair; while the WH-question in (3a) itself is non-exhaustive, the exhaustive implicature in the answer in (3b), namely that the speaker met only *John*_{A1} can be cancelled without contradiction by adding the information that she also met *Paul*_{A2}.

- (3) a. Who did you meet yesterday? Q-WH
 b. I met [John]_{A1}. (And I met [Paul]_{A2}, too.) SEL-WH

Apart from such question-answer contexts (Q-WH & SEL-WH, Q-ALT & SEL-ALT), further types of contrastive discourse relations distinguished in [Repp \(2016\)](#) are SIMILARITIES (SIM), OPPOSITIONS (OPP), and CORRECTIONS (CORR).² Contexts of SIMILARITY feature alternatives that make a similar contribution to the current question under discussion (QUD) (cf. [Repp 2016](#)). QUDs are constructs that help to structure discourse, to determine the relations between sentences within a coherent discourse, and to relate sentence topics with more general discourse topics (cf. [Roberts 1996](#); [Benz & Jasinskaja 2017](#)).³ As such, the current QUD corresponds to an implicit or explicit question that the current utterance is assumed to answer. An example of SIMILARITY as a contrast-relevant discourse relation is given in (4): the current QUD could refer to the kinds of food that invited guests prepared, for which both clauses in (4) provide possible answers to the current QUD. SIMILARITIES can (but do not have to be) exhaustive by implicature, as the hearer can assume that the speaker mentions all alternatives for which the proposition holds true (following from the Gricean maxim of quantity).

- (4) **SIM**
 (QUD: Who contributed what to the party?)
 I made [the muffins]_{A1} and I also made [the cake]_{A2}.

An OPPOSITION compares the current alternative to another explicit or implicit background alternative, with both alternatives making opposing contributions to the current QUD ([Repp 2016](#)). Such a context is shown in example (5), where the alternative of *John*

² The importance of contrast for focus, topics, and discourse relations gave rise to the question of the status of contrast; given those interactions, the proposal has been made to view contrast as an independent (information-structural, pragmatic, and/or discourse-related) notion (e.g. [Lambrecht 1994](#); [Vallduví & Vilkuuna 1998](#); [Molnár 2001](#); [Umbach 2004](#); 2005; [Brunetti 2004](#); [Frascarelli & Hinterhölzl 2007](#); [López 2009](#); [Molnár & Winkler 2010](#); [Repp 2010](#); 2016).

³ We define topic here as ‘sentence topic’ in the sense of ‘what the sentence is about’ (cf. [Reinhart 1982](#); [Lambrecht 1994](#); [Gundel & Fretheim 2006](#)) and use it in this paper to refer to the overt “topic constituent” or “topic expression” ([Krifka 2007](#): 18) “referring to the entity (or state of affairs) that a given sentence is about” ([Schultze-Berndt & Simard 2012](#): 1033). In contrast to ‘sentence topics’, a ‘discourse topic’, referred to here as QUD, refers to what (part of) the discourse is about.

*mowing the lawn*_{A1} is given first, and then juxtaposed with the second alternative of *Pete pruning the roses*_{A2} through the use of *but*.⁴

- (5) **OPP**
 (QUD: What are John and Pete doing?)
 [[John]_{A1'} was mowing the lawn]_{A1}, but [[Pete]_{A2'} was pruning the roses]_{A2}.
 (Repp 2016: 277)

Repp (2016: 277) proposes the label of OPPOSITION for such discourses, because *but* in this case implies a violated expectation, namely that John and Pete would mow the lawn together. In OPPOSITIONS, both alternatives make different contributions to the current QUD and both can hold true. If, on the other hand, the two propositions are presented as in (6), no such expectation is violated, and we can speak of a SIMILARITY discourse relation, as both clauses make similar contributions to the QUD.

- (6) **SIM**
 (QUD: What are John and Pete doing?)
 [[John]_{A1'} was mowing the lawn]_{A1}. [[Pete]_{A2'} was pruning the roses]_{A2}.
 (Repp 2016: 277)

As OPPOSITIONS and SIMILARITIES are not always formally distinguishable but can, depending on the context, be interpreted as either, we will not make a categorical distinction between SIMILARITIES and OPPOSITIONS when applying them to Tima in Section 3.

In contrast to OPPOSITIONS, a CORRECTION explicitly denies another alternative A1 to hold true in addition to the current one. The current alternative A2 either rejects A1 because certain background assumptions for the felicitous use of A1 are not met, or because the propositions of *making dinner* associated with A2 and A1 cannot both be true in the evaluation world (Repp 2016):

- (7) **CORR**
 (QUD: Who made dinner?)
 [Tom]_{A1} did not make dinner, [Lea]_{A2} made dinner.

Another approach building on a violation of discourse expectations is to relate contrast to the unexpectedness or special status of the chosen alternative (e.g. Halliday 1967; Frey 2006; 2010). Contrastivity in this sense does not rely on explicit sets of alternatives or on exhaustivity, but on additional pragmatic effects of the chosen alternative (cf. Repp 2016: 273-274 for an overview); it serves to draw the hearer's attention to the special status of the selected alternative.

Unexpectedness and surprising information has also been argued to account for overt focus marking. For instance, Hartmann & Zimmermann (2007; 2008) show that morphological and syntactic focus marking in Hausa is not obligatory in focus contexts, i.e. that focus can be left formally unmarked. They argue that focus marking in that language is pragmatically rather than semantically motivated, as it is found in those contexts in which the speaker would assume the information in focus to contain a certain degree of unexpectedness or noteworthiness for the hearer. Zimmermann (2007) extends this kind of analysis to a number of Chadic languages, relating an unexpected current alternative to contrastive focus. He argues that "contrastivity in this sense means that a particular content or a particular speech act is unexpected for the hearer from the speaker's per-

⁴ Examples like (5) and (6) have also been discussed as contrastive topics (e.g. Roberts 1996; Büring 2003; 2016; Frey 2006; 2010; Krifka 2007).

spective” (Zimmermann 2007: 148). In a similar vein, using the label of “mirativity”, Brunetti (2009), Cruschina (2012; 2016; 2019), and Cruschina & Remberger (2017) argue that the unexpectedness of the current alternative can also explain syntactic effects of focus marking in various Romance languages; Matic (2003: 287-296) finds a similar effect for fronted foci in Serbo-Croatian, Albanian, and Modern Greek.

Under the label of “drawing attention”, Skopeteas & Fanselow (2011: 1698) make a similar argument for focus fronting in German: “[...] this operation is not associated with a truth-conditionally relevant property, but it has the effect of attracting the hearer’s attention to that portion of the utterance that may not be in line with the hearer’s expectations”.⁵ Yet another similar observation is made in Abeillé et al. (2008) concerning preposed NPs in French. The authors argue that “the partition of the sentence serves to make the utterance more dramatic, highlighting that part of the situation that seems particularly worth of notice [...]” and that the construction “is typically associated with speaker’s attitudes (surprise, admiration, disgust, justification etc.)” (Abeillé et al. 2008: 13-14).

Even though these studies use a number of different labels (attention drawing, noteworthy, unexpectedness, surprisal, mirativity), we follow this line of work in arguing that the unexpectedness of the current alternative makes a context contrastive in that, according to the speaker, the alternative contrasts with the hearer’s belief or the Common Ground. CORRECTION contexts are inherently unexpected in this sense, since the alternative in the correction is by definition rejecting another alternative that the hearer was committed to. Also OPPOSITION contexts contain an unexpected alternative, implying that previous expectations are violated. Other contexts mentioned above, such as SIMILARITY and SELECTION, can but do not necessarily involve an unexpected alternative. WH-questions and alternative questions could be argued to aim at drawing attention towards the lack of knowledge of the speaker with the implicit request to fill this gap. While Hartmann & Zimmermann (2007: 390) argue that answers to WH-questions and alternative questions are never unexpected being the default discourse move following a question, we view the alternative in answers to WH-questions (SEL-WH contexts) as necessarily unexpected – by default, the speaker utters the WH-question so that their knowledge gap is filled by the addressee. On the other hand, we treat the answers to alternative questions (SEL-ALT contexts) as expected alternatives, since they are part of the preceding alternative question.

Table 1 shows the different contexts that are viewed as contrastive in different approaches to contrast. The narrow approaches (e.g. Chafe 1976; É. Kiss 1998) would only include the contexts with an explicit $set_{\{A\}}$ and the selected alternative being exhaustive, with the most restrictive approach in Krifka (2007) only counting in CORRECTION contexts. A broader account of contrast, as proposed in Vallduví & Vilkuna (1998), also considers the remaining contexts to be contrastive, since all involve a $set_{\{A\}}$. Only CORRECTION contexts are exhaustive in that they exclude the proposition to hold for any other alternative. OPPOSITIONS and other contexts for which exhaustivity is marked in brackets in Table 1 are exhaustive by implication, i.e. they involve an exhaustivity effect restricting the proposition to hold true for the current alternative only, which can be cancelled. Table 1 also shows how the various contrastive contexts relate to unexpectedness: only CORRECTION and OPPOSITION contexts are inherently unexpected; for all other context types, unexpectedness is an orthogonal property (again indicated by brackets).

⁵ We thank an anonymous reviewer for the pointer to Skopeteas & Fanselow (2011).

Table 1: Contrastive contexts traditionally distinguished.

context	explicit $set_{\{A\}}$	exhaustive	unexpected
CORR	✓	✓	✓
OPP	✓	(✓)	✓
Q-ALT	✓	(✓)	(✓)
SEL-ALT	✓	(✓)	(✓)
SIM	✓	✗	(✓)
Q-WH	✗	✗	(✓)
SEL-WH	✗	(✓)	(✓)

An important question concerning contrast emerges from the properties of contrast outlined above, namely whether contrast should be taken as a categorical or as a gradient concept. In this study, we follow Molnár (2001; 2006); Paoli (2009); Calhoun (2010); Repp (2016) in arguing that contrast is gradient, meaning that an element is not necessarily either contrastive or non-contrastive, but can be more or less contrastive. For instance, Molnár (2001: 108) distinguishes between three degrees of exhaustivity which are relevant for different degrees of contrast: non-exhaustive (several alternatives can hold true), some-exclusion (a single other alternative cannot hold true), and all-exclusion (all alternatives other than the selected one cannot hold true). This gradient nature of contrast can also be seen in the discourse relations introduced above. SIMILARITIES are only weakly contrastive, as they include alternatives that make a similar contribution to the current QUD. OPPOSITIONS are more contrastive than SIMILARITIES, because the alternatives make opposite contributions to the current QUD. As argued in Umbach (2004: 171-173), the discourse relations of OPPOSITION and CORRECTION can be distinguished on the basis of different degrees of exhaustivity; CORRECTIONS can therefore be thought of being more contrastive than OPPOSITIONS.⁶

2.2 *Tima*: evidence for a broad and gradient approach to contrast

The narrow and broad approaches to contrast, paired with the question of contrast being of categorical or gradient nature, lead to the following four predictions as to how contrast can be marked in grammar:

- (8)
- (i) **narrow + categorical**
marking of contrast only for explicit $sets_{\{A\}}$ with no gradient difference in marking
 - (ii) **narrow + gradient**
marking of contrast only for explicit $sets_{\{A\}}$ with gradient difference in marking
 - (iii) **broad + categorical**
marking of contrast for all $sets_{\{A\}}$ with no gradient difference in marking
 - (iv) **broad + gradient**
marking of contrast for all $sets_{\{A\}}$ with gradient difference in marking

⁶ Umbach (2004) uses the label of ‘contrast’ for OPPOSITION, and she uses it in a more restrictive way. In this study, we follow Repp (2016) who uses the label ‘oppose’ in order to avoid the use of ‘contrast’ for this type of discourse relation.

As we will show in Section 3, Tima provides evidence for a broad and gradient approach to contrast, since all contexts listed in Table 1 (except for Q-ALT) are systematically marked by one of two markers (or both) along the scale from less to more contrastive contexts. Therefore, we follow Vallduví & Vilkuna (1998: 83-84) in defining contrast as follows:

(9) *Contrast*

If an expression *A* is contrastive, it opens a set of alternatives $set_{\{A\}}$ which is relevant for the interpretation of the contrastive expression *A*. The members of $set_{\{A\}}$ are determined contextually and ontologically.

Following from the properties of different contrastive contexts discussed in Section 2.1, gradience in contrast, i.e. stronger and weaker contrastive contexts, can be found along three dimensions: the explicitness of the $set_{\{A\}}$, exhaustivity, and the unexpectedness of the current alternative, as shown in (10).⁷

- (10) a. **explicit** $set_{\{A\}}$
CORR, OPP, SIM, Q-ALT, SEL-ALT, SEL-EXPL > Q-WH, SEL-WH, SEL-IMPL
- b. **exhaustivity**
CORR > OPP, Q-ALT, SEL-ALT, SEL-WH, SEL-EXPL > SIM, Q-WH, SEL-IMPL
- c. **unexpectedness**
CORR, OPP > SIM, SEL-EXPL, SEL-IMPL, SEL-WH, SEL-ALT

The Tima data provides evidence for contrast being gradient along the dimensions of exhaustivity and unexpectedness, while the explicitness of the $set_{\{A\}}$ does not play a role. In Section 3, we discuss the two morphological markers of Tima, the selective and focus marker, and show in detail how their distribution aligns with weaker and stronger contexts of contrast. Their distribution in contrastive contexts is summarised below in Table 2.

Table 2: The distribution of the selective and the focus marker in the relevant contrastive contexts.

	selective marker	focus marker
Q-WH	✓	✗
SEL-IMPL	✓	✗
SEL-EXPL	(✓)	✗
SIM/OPP	(✓)	✗
SEL-WH	compatible	✓
SEL-ALT	compatible	✓
CORR	compatible	✓
unexpected ALT	compatible	✓

Table 2 shows that there is no consistent relation between explicitness and the use of the focus and selective marker; both occur in contexts with and without explicit $sets_{\{A\}}$. For

⁷ Alternative questions, other than the answers to them, are not marked systematically by either the selective or the focus marker. As such, we will not discuss them in the remainder of the paper. WH-questions by default come with implicit $sets_{\{A\}}$, which is how they are classified in (10a). However, they can have explicit $sets_{\{A\}}$ if the alternatives are given by the discourse context (cf. example (43)). In that case, we would treat them as alternative questions with regard to the explicitness of the $set_{\{A\}}$.

instance, when comparing answers to WH-questions (SEL-WH) with implicit $sets_{\{A\}}$ and answers to alternative questions (SEL-ALT) with explicit $sets_{\{A\}}$, Table 2 shows that they can be both marked in the same way: the focus marker is the main signal of contrast in both cases, and the selective marker is compatible with such contexts in the sense that it can but does not have to be used in addition to the focus marker. Furthermore, we distinguish between explicit and implicit SELECTION contexts, marked as SEL-EXPL and SEL-IMPL in Table 2, respectively. In SEL-IMPL contexts, the selective marker is the only marker of (weaker) contrast. Without this marker, the context will not be interpreted as contrastive (in the sense of opening a set of relevant alternatives) anymore. The brackets in Table 2 indicate the optional use of the selective marker in SEL-EXPL and SIM/OPP contexts.

Contexts that are exhaustive (by entailment or implicature) require focus marking. In these cases, the selective marker is compatible although it is not obligatory. Non-exhaustive contexts such as WH-questions are incompatible with the focus marker but require the use of the selective marker. The dimension of exhaustivity thus establishes the focus marker as a signal of stronger contrastive contexts, and the selective marker as a signal of weaker contrastive contexts. The evidence for unexpectedness as another relevant dimension comes from the fact that the focus marker can also be used in non-exhaustive contexts. As we show in Section 3.2, the focus-marked and non-exhaustive alternative is always unexpected and noteworthy.

For focus marking in Tima, we adopt a definition of focus as a pragmatic notion, following Chafe (1976) and Vallduví & Vilkuna (1998) in their definition of focus as the rhematic part of an utterance: it conveys the information that is not yet asserted or part of the Common Ground, and acts as Common Ground management. This corresponds to what Krifka (2007: 21) notes about the pragmatic use of focus, namely that it “does not have an immediate influence on truth conditions, but it helps in guiding the direction into which communication should develop [...]”. In the remainder of this paper, we will only discuss the conditions of the use of the Tima focus marker, not focus contexts in general.

The second morphological marker, expressing weaker contrast in Tima, is the selective marker, which signals the availability of a set of alternatives and, in contexts other than WH-questions, marks the current alternative as selected against the background of the $set_{\{A\}}$. It may be tempting to analyse the selective marker as another focus marker in the language, given that it opens a set of alternatives to the current one. We do not treat the selective marker as a focus marker for the following reasons: although being compatible with contexts typically associated with focus marking (SEL-WH, CORRECTION), it is not systematically used in such contexts. It does not convey unexpectedness or noteworthiness of the current alternative, and it is not restricted to discourse-new, not yet asserted content. As we will show in Section 3.3, it also occurs in the context of contrastive topics.

3 Contrast in Tima

Having outlined the relevant assumptions concerning contrast and related concepts, we now turn to the discussion of contrast marking in Tima. After giving some background information on the language (Section 3.1), we present the two morphological devices of focus (Section 3.2) and selective marking (Section 3.3), and then end this section with a description of the interaction of both marking options (Section 3.4).

3.1 Preliminary remarks

Tima, spoken by roughly 7,000 speakers mainly in the Nuba Mountains in Sudan, is one of three languages which constitute the Katloid family within the Niger-Congo phylum (see e.g. [Dimmendaal 2018](#)). Tima is a tonal language with both lexical and grammatical tones. Since a systematic analysis of tone in Tima is still pending, tone marking in the examples reflect their surface realisation. As is the case with other languages in the Nuba Mountains (see [Rose 2018](#)), Tima has ATR (advanced tongue root) harmony (see [Bashir 2013: 272](#)).

The basic word order in Tima is AVO, case marking being absent with this order. By default, the sentence-initial position is reserved for the sentence topic, i.e. the A argument in AVO constructions. The alternative word order OVA can occur when the object occupies the sentence-initial position; in this case, the object is the sentence topic and the postverbal subject A requires ergative marking. Additional word orders are possible in focus constructions.

With regard to information structure in Tima, we find – in addition to the generally morphologically unmarked topic – marked constituent focus as well as selective marking.⁸ The two markers differ with regard to their effect on word order. The focus-marked constituent in a focus construction must occur in a preverbal position, i.e. either sentence-initially or in second position. We thus find $AO_{FOC}V$, $OA_{ERG.FOC}V$, $A_{FOC}VO$, or $O_{FOC}VA_{ERG}$ word orders, with the latter two constructions maintaining the word order of the non-focus constructions AVO and OVA_{ERG} . Thus, depending on the type of constituent that occurs with focus marking and which constituent is the sentence topic, a change of word order is required. The selective marker, on the other hand, does not involve any word order changes and the selective-marked constituent remains in its default position.

The data used in this study is primary data obtained during numerous fieldwork trips between 2007 and 2019. Most of the material was gathered from storytelling and through prompted elicitation.⁹ Certain elicited material relevant for this study was inspired by [Malchukov \(2004\)](#); [Umbach \(2004\)](#); [Davies \(2012\)](#); [Repp \(2016\)](#).

3.2 Focus marking in Tima

Constituent focus in Tima is expressed by the exponents shown in Table 3. We can distinguish three types of exponents: a singular exponent, a plural exponent, and a third exponent that is used with proper names, obliques, ergative subjects, and singular 1st and 2nd person pronouns. The ATR-feature of the vowel in all exponents depends on the ATR-feature of the preceding root vowels. In addition, the markers $=e/=\varepsilon$ and $=\text{ɹ}/=a$ require an initial glide if their host ends in a vowel.¹⁰

⁸ The label “selective” marking (SEL) emerged during discussions between Dimmendaal and Schneider-Blum and was first used in [Schneider-Blum \(2018\)](#).

⁹ Many of the utterances were prompted by showing (series of) pictures, which were either photos the authors had taken in the area, or material compiled by [Skopeteas et al. \(2006\)](#).

¹⁰ With $=e/=\varepsilon$, the glide is invariably /j/ and is represented orthographically as <y>. For $=\text{ɹ}/=a$, the glide surfaces as /j/ or /w/ (represented as <y> and <w> in the orthography), depending on the height of the preceding vowel.

Table 3: Exponents of the focus marker.

exponent	context
=li/=lɪ	singular
=(y)e/=(y)ɛ	plural
=(G)ʌ/=(G)a	proper name, oblique, ergative S, 1SG, 2SG

Diachronically, the focus marker in Tima is related to the predication marker used in non-verbal predicative contexts, shown in example (11). This analysis is based on the synchronic observation that the same marker is obligatorily used for non-verbal predication in equative constructions – including classifying, identifying, and specifying constructions (for more details see Schneider-Blum 2018).¹¹ This is supported by the fact that the development from copulas to focus markers is cross-linguistically very common (cf. Heine & Kuteva 2002: 109-110; Green 2007: Ch. 5 for Hausa; Creissels 2020).

(11) **Non-verbal copula construction (equative)**

Tima (07.03.10_11_01)

[kíβállɔ́ lɛ́ɛ́n = íí = 'íí]_{PRED} [nɔ́lɛ́]_{SUBJ}; [kɔ́pɔ́n'dí = íí]_{PRED} ([pínɔ́]_{SUBJ}).
 friend LOC:1SG = SEL:LV = FOC.SG here teacher = FOC.SG¹² 3SG

‘This is my friend; she is a teacher.’

(Context: the speaker introduces her friend to someone.)

Synchronically, the marker is a priori functionally ambiguous in such equative constructions.¹³ For instance, the statement *kɔ́pɔ́n'dí* ‘She is a teacher.’ does not only fit into the context as described in (11) but would also be a grammatically as well as pragmatically correct answer to the alternative question *Is your friend a nurse or a teacher?* or to the WH-question *Who is this?*, which are typical contexts for focus. Note also that non-verbal sentences with either predicate or focus function of the marking option follow the same tonal and prosodic patterns. Therefore, a formal difference between focus marking and predicative marking cannot be established in such constructions, and the marker’s function can only be determined by the context.

Example (12) illustrates that an expression containing focus in a SEL-WH context is formally equivalent to the construction that we find in a CORRECTION context, as in (12d).

¹¹ Note that this does not hold for non-verbal sentences other than equative constructions, e.g. in locative constructions where the focus marker and other copulas exclude each other depending on the context (see discussion of examples (22) and (23)).

¹² Due to the lack of formal disambiguation between the focus and predicate marker, we have chosen to use the gloss FOC consistently across all occurrences.

¹³ Compare Güldemann (2010: 77) on the functional ambiguity of *ke* “between an identificational and a mere term focus marker” in N|uu.

- (12) *Tima* (20190206_03)
- a. What is this (pointing to the leg)?
 - b. **SEL-WH**
kìdĩí = **Íí**.
leg = **FOC.SG**
'A leg.'
 - c. kídĩí = **Íí** = yè?
back = **FOC.SG** = REP
'A back?'
 - d. **CORR**
ʔaʔa, kídĩí = **Íí**.
no leg = **FOC.SG**
'No, a leg.'

Whereas focus/predicate marking is obligatory in equational sentences without a verbal predicate, this is not the case in verbal sentences. Compare example (13) without focus marking and (14) with focus marking. Focus marking is only acceptable, and in fact mandatory, under the conditions described below in detail, e.g. as an answer to a WH-question ('What is the woman raking?') in (14). The more general prompt to describe the picture in Figure 1 did not result in focus marking in (13).

- (13) *Tima* (13.04.09-05-04)
- a. Please, describe the picture.
 - b. kíbèéy = ná céŋ-kóhá káyì.
person = DEM.PROX 3IPFV-dig grass
'This person is digging grass.'



Figure 1: Stimulus of example (13).

As demonstrated in (14), the focus-marked constituent needs to occur in a preverbal position.¹⁴ The marker attaches to the rightmost element of the focused noun phrase (cf. (46) and (47) in Section 3.4). Where the A argument is focus-marked, no changes in word order are needed as A is already preverbal by default (cf. example (22) below). However, if the non-focused A argument (*kàhúnénná* 'this woman') remains in the sentence-initial position, as in (14), the focus-marked object (*yá'kírè* 'remainders') must immediately precede the verb. Furthermore, if a focus-marked object occurs in the sentence-initial position, the A argument follows the verb and receives ergative marking (cf. final clause in (21b)).

¹⁴ Note that we only consider the constructions in terms of their surface properties, without making claims about potential underlying structures.

(14) **SEL-WH***Tima* (12.04.09-02-07)

a. What is the woman raking?

b. kλhúnén = nál yá^hkír = *(è) céwúr = á = ʔáj
 woman = DEM.PROX remainders = **FOC.PL** rake = SRC = LOC:3
 á = yéèh.¹⁵
 SRC = sorghum
 ‘This woman is raking the *remainders* from sorghum.’

**Figure 2:** Stimulus of example (14).

Example (14) strongly suggests that the constructions discussed here are not cleft sentences. Cleft constructions typically dislocate and separate the clefted material from the rest of the sentence so that it appears in the sentence-initial (most commonly) or sentence-final position (see also Hartmann & Veenstra 2013: 5; Güldemann et al. 2015: 170; Creissels 2020: Section 2). This is clearly not the case in *Tima*; in (14) and similar examples, the focused object is neither in an edge-position, nor does a prosodic break cleave the focused constituent from the rest of the sentence.¹⁶

Concerning the distribution of the focus marker, its use is obligatory in the following contexts that are generally considered as typical focus contexts (see e.g. Gundel & Fretheim 2006; Krifka 2007; van Putten 2014): SEL-WH, SEL-ALT, and CORRECTIONS.¹⁷ In addition, its occurrence may signal unexpectedness. We will now illustrate the use of the focus marker in each of the aforementioned contexts, beginning with possible answers to the WH-question. This prototypical use of the focus marker is what we see in (15b).

¹⁵ Optional elements are marked as (X), obligatory elements as *(X), and infelicitous elements as (*X).

¹⁶ An anonymous reviewer suggested that this construction may be a left-dislocated topic followed by the focused constituent in sentence-initial position preceding the verb. We argue against such an analysis, as there are indeed dislocated topic constructions in *Tima* which are encoded prosodically (see the discussion in Schneider-Blum & Hellwig (2018: Section 5)). In such constructions, focus marking has not been observed.

¹⁷ The *Tima* situation differs from that for certain languages of West-Africa (the Kwa languages Aja, Akan, Awutu-Efutu, Ewe, Fɔ̀n, Foodo, Lelemi and the Chadic languages Bole and Hausa) for which a subject-non-subject asymmetry is described by Fiedler et al. (2010: 235-242). In these languages, only subjects asked for in WH-questions are obligatorily marked for focus, whereas non-subject focus may remain unmarked. In *Tima*, the term asked for by a WH-question, independent from its syntactic function, must be marked for focus.

- (15) a. Who did she (i.e. Mariyam) see?
 b. **SEL-WH**
Tima (20190120_01)
*kàpí'ŋ = *(á) ù-kúmùn (mínλ) (tīn).*
Kaping = FOC 3-see:PST ERG:3SG only
 ‘She saw (only) *Kaping*.’

If alternatives are coordinated in the answer, only the first is focus-marked, independent of whether the alternatives are expressed as coordinated noun phrases with a single predicate as in (16b) or whether they are expressed in two separate clauses as in (17b). This also holds for coordinations with no overt coordinator in non-verbal predications (cf. example (20b) below).

- (16) a. Who did she (i.e. Mariyam) see?
 b. **SEL-WH**
Tima (20190120_02)
*kàpí'ŋ = *(á) ù-kú'mún nà l-ítλŋ-(*á).*
Kaping = FOC 3-see:PST and LOC-Ithang-FOC
 ‘She saw *Kaping* and Ithang.’

Focus marking in Tima encodes exhaustivity by implicature rather than by entailment. This becomes especially clear in examples such as (17b). The exhaustivity effect results from the first part of the answer, *kàpí'ŋ ùkúmùn mínλ* ‘she saw *Kaping*’, but can be cancelled by the additional segment *ùkúmúnyáŋ ítλŋ* ‘she also saw Ithang’.

- (17) a. Who did she (i.e. Mariyam) see?
 b. **SEL-WH**
Tima (20190120_01)
*kàpíŋ = *(à) ù-kúmùn mínλ; ù-kúmún = yáŋ ítλŋ = (*à).*
Kaping = FOC 3-see:PST ERG:3SG 3-see:PST = LOC:3 Ithang = FOC
 ‘She saw *Kaping*; she also saw Ithang (on the same occasion).’

As opposed to (17b), where exhaustivity is merely implied, exhaustivity is entailed in (18b) with the addition of the contrast-sensitive lexeme *tīn* ‘only’. Thus, the exhaustivity has to be denied and corrected if the $set_{\{A\}}$ for which the relevant proposition holds is expanded, as seen in (18c).

- (18) *Tima* (20190120_04)
 a. Who did she (i.e. Mariyam) see?
 b. **SEL-WH**
*kàpíŋ = *(à) ù-kúmùn mínλ tīn.*
Kaping = FOC 3-see:PST ERG:3SG only
 ‘She saw only *Kaping*.’
 c. **CORR**
*?á?à, kí = ŋ = kálí = *(yá) = λŋ, ú-kúmùn mλdλk ítλŋ = (*à).*
no NEG = INS = truth = FOC = NEG 3-see:PST also Ithang = FOC
 ‘No, this is not the *truth*, she also saw Ithang.’

As was mentioned in Section 2, the explicitness of the $set_{\{A\}}$ in a question is irrelevant for focus marking in answers in Tima. In other words, focus marking can occur with both

explicitly given and implicit $sets_{\{A\}}$. The same holds for the selective marker, as we will show in Section 3.3.

An example showing an explicit $set_{\{A\}}$ can be seen in the alternative question in (19a). In Tima, this kind of question allows for two types of quite natural answers: a shortened one with the constituent only, as in (19b), and a longer one containing the constituent in question as well as the verb (while not mentioning the object), as in (19c).¹⁸ In both cases, focus marking is necessary on the constituent that selects the alternative for which the predication holds true (*káádìh* ‘monkey’) from the $set_{\{A\}}$ given in the question (*monkey* vs. *cat*). The focus-marked alternatives in (19b) and (19c) are not unexpected. As we will argue later in this section, focus marking in Tima usually occurs with unexpected alternatives. SEL-ALT contexts seem to be the only type of contexts in which it is used to mark an expected alternative. That the focus marker is nevertheless required in such contexts is due to the exhaustivity (effect) of the selected alternative.

- (19) *Tima* (20190206_06)
- a. Did the cat or the monkey steal the bread?
 - b. **SEL-ALT**
 $\dot{\eta} = k\acute{a}\acute{a}d\grave{i}h = *(\acute{A})$.
ERG = monkey = FOC
 ‘The *monkey*.’
 - c. **SEL-ALT**
 $k\acute{a}\acute{a}d\grave{i}h = *(li)$ $\acute{u}-d\grave{o}-y\acute{a}k$.
monkey = FOC.SG 3-steal:PST-AP
 ‘The *monkey* stole it.’

A WH-question such as in (20a) leaves the alternatives implicit, so that the $set_{\{A\}}$ is only constrained by contextual plausibility. A possible answer to that question is shown in (20b). We see that the first selected alternative *inṭùkúbúk* ‘groundnuts’ requires focus marking, while the second one, *ṭùk* ‘bread’, cannot be focus-marked (cf. example (16b)).

- (20) *Tima* (20190206_06)
- a. Do you know what was stolen from your colleagues?
 - b. **SEL-WH**
 $inṭùkúbúk = *(\acute{e})$ $\acute{a}y = \grave{a}b\grave{h}\acute{r}$, $ṭùk = (*e)$ $\acute{a} = n\grave{a}t\acute{a}l\acute{y}\grave{a}$.
groundnuts = FOC.PL SRC = Abeer bread = FOC.PL SRC = Nataliya
 ‘*Groundnuts* from Abeer and *bread* from Nataliya.’¹⁹

A typical example of a CORRECTION is given in (21), where the presupposition *Kokuung ate soup* is rejected and corrected by the speaker:

¹⁸ In the one-word utterance, A must occur in its ergative form in a transitive situation to unambiguously refer to A. If S precedes the verb marked for the antipassive, ergative marking is not appropriate. Note also the different focus allomorphs.

¹⁹ In Tima, a ‘piece of bread’ is marked for singular, while the plural is used to denote ‘several pieces of bread’ or to express the collective meaning ‘bread’ (cf. also example (21) with plural marking on ‘meat’).

- (21) *Tima* (20190120_18)
- a. I think Kokuung ate soup.
- b. **CORR**
 ʔáʔà, àká = *(wà) ù-móók ídí ʔyábúh, yábùh = *(é) ì-ká'lúk
 no, Aka = FOC 3-drink:PST water meat, meat = FOC.PL 3-eat:PST
 ñ = kòkùúŋ.
 ERG = Kokuung
 ‘No, Aka had soup, Kokuung had *meat*.’

The last context in which the focus marker is used involves the unexpectedness, surprise, and noteworthiness of the chosen alternative (cf. Zimmermann 2007; Cruschina 2019). We take this function to be a (diachronic) extension of focus marking in CORRECTION contexts, as the latter includes an unexpected alternative by default.

- (22) **unexpected ALT**
Tima (20190204_07)
- kùlál ìhwáá = 'ná ìhá'wók = í = *(yé) ù = ʔndòò; ínà
 yesterday, people = DEM.PROX many = SEL = FOC.PL DIR = road PL:DEM.PROX
 ìhá'wók = í ú-kòkwéé ídék, ìbèʔéŋ = í í-pàk-àk-àà yáwùh.
 many = SEL 3-hold:PST necks few = SEL 3-throw:PST-AP-INS stones
 ‘Yesterday, *lots of people* were in the street; (while) most of them were peaceful, some threw stones.’

Thus, a focus construction like (22) is felicitous if the alternative is intended to be marked as unexpected for the hearer or, as was confirmed by our consultant, when answering the question *Who/What was in the street yesterday?* with the less natural complete sentence. The more natural answer would consist of the focused noun phrase alone, i.e. *ìhwáá'ná ìhá'wókíyé* ‘many people’. If the speaker does not intend to convey unexpectedness but wants to transmit neutral information, the construction as shown in (22) is infelicitous. Instead, the sentence in (23) would be used, employing the copula *jàcè*:

- (23) **expected ALT**
Tima (20190204_07)
- kùlál ìhwáá = 'ná ìhá'wók = í = *(yé) jàcè ù = ʔndòò.
 yesterday, people = DEM.PROX many = SEL = FOC.PL COP:PL DIR = road
 ‘Yesterday, many people were in the street.’

Note that in non-verbal sentences the copulas *jàkò* (SG) and *jàcè* (PL) replace the focus marker in contexts where focus marking is not appropriate. As is shown in (23), the focus marker cannot be used in addition to *jàcè* (see also example (34)) and vice versa, i.e. the copulas *jàkò/jàcè* and focus markers are in complementary distribution in such contexts.

We further probed the unexpectedness condition using tasks designed by Skopeteas et al. (2006). The consultant was shown different series of three pictures, each of which reflects a coherent short story. When being shown the series, e.g. the one in Figure 3, and asked *What happened?* (24a), the speaker always uttered replies that featured an initial focus-marked constituent, as in (24c) (Condition A3, Task 15 in Skopeteas et al. 2006). In example (24c), it is also unexpectedness, rather than exhaustivity, that accounts for the presence of the focus marker. In the context of all new information orthetic statements (Sasse 1987) or sentence focus (Lambrecht 2000), such kind of focus marking in

- (25) Tima (15_1_C3D4A1B2)
- a. What happened to the cars?
- b. **expected ALT**
 ìr̀r̀mbíl = (*é) cè-wúdà = à = ʦáj, yàáná ñkùʦáj
 cars = **FOC.PL** 3:PRF-burn = SRC = LOC:3 things COP:SG:LOC:3
 y-úùh = í cè-wúdà = à = ʦáj.
 LOC-inside = SEL 3:PRF-burn = SRC = LOC:3
 ‘The cars burnt down, (and) the things that were inside burnt.’



Figure 4: Stimulus of example (25b).

As was argued for examples (22) and (24c), the focus marker does not require an exhaustive context when signalling unexpected and noteworthy information in order to draw the hearer’s attention to the current alternative. This is also the case in example (26). It is the first sentence of a description of a picture series after the request to ‘tell me the story the pictures show’ (Task 15, Condition C4, Skopeteas et al. 2006).

- (26) **unexpected & noteworthy ALT**
 Tima (Skopeteas_15_4_D1C4B3A2)
 t̀r̀r̀mbíl = *(ì) ñ-dáà ù = ʦ̀nd̀.
 car = **FOC.SG** P-run DIR = road
 ‘A car is running down the road.’

Sentences such as those in (26) resemble to some extent an example from the Eastern Cushitic language Boni, presented as ex. (79) in Sasse (1987: 542) in his elaboration onthetic (vs. categorical) statements. In Boni, as well as in Tima, it is the “characterising/identifying copula” – identical to the focus marker in Tima – which is employed in these constructions, starting with an entity-central statement (for the difference between entity-central and event-central theticity see Sasse 1987: 526-527).²⁰ When answering the question ‘What happened?’, constructions with focus marking are the structure of choice for Tima, and, as in (26), can also occur at the beginning of a story. As Sasse (1987: 566) contends, “[i]n languages having grammatical subjects it [i.e. a noun denoting an entity] is necessarily also a ‘would-be subject’, so that it must be marked in such a way as to preclude its interpretation as a predication base” and thus as to differentiate athetic from a categorical statement. Lambrecht (2000: 625), dwelling on the matter of “detopicalization”, offers as an answer to the question of how a subject argument can “be coded in such a way that it will not be interpreted as a topic” that one could provide “the subject constituent with grammatical properties which are conventionally associated with focus marking”.²¹ This is exactly what we observe in Tima.

²⁰ Other than in Boni, the rest of the sentence is not autonomous in Tima.

²¹ According to Lambrecht (2000: 628), “[i]t appears that cross-linguistically focus ambiguity is tolerated much more readily between SF [i.e. sentence focus] and AF [i.e. argument focus] than between SF and PF [i.e. predicate focus]”. He mentions for Japanese that “[...] *ga* is used for the focal subjects of SF (as well as AF)” (Lambrecht 2000: 626). This parallels what we described for e.g. example (22). Note also that Lambrecht (2000: 619) considers SF constructions “[...]thetic propositions, but not allthetic propositions

A comparable distribution and function of focus marking to that found in Tima is also seen in Tuu languages (Khoisan). [Güldemann \(2010: 87\)](#) suggests that these “split structures [...] are polyfunctional in that they serve to encode contrastive term focus as well as entity-central theticity” (whilst also referring to [Sasse 1987](#)). The split manifests itself in the separation of the term/central entity “by a kind of pivotal marker” ([Güldemann 2010: 72](#)) from the rest of the sentence and “can achieve at least two things. First, it disrupts the canonical syntactic subject-predicate relation which is associated with the topic-comment configuration of categorical statements. Second, it cancels the assertivity of the predicate as the central expression of the state-of-affairs” ([Güldemann 2010: 88](#)). Both statements can apply equally to Tima. As examples (22), (24c), and (26) illustrate, focus marking in thetic sentences functions to indicate “surprising or unexpected events” and are found with “background descriptions (local, temporal, etc. setting)” ([Sasse 1987: 566](#); cf. also [Güldemann 2010: 87](#) for his findings in the Tuu languages). Note that in Tima, the establishment of new participants in discourse can also be achieved by using the existential, presentative copula *ɲkwíyλ*, as seen in (27).

- (27) *Tima* (031007_Daldum, clan-dividing 001-004)
 dɔ̀-wàà áyí'ná míhì = yí, t̥h-làwù ɲkwíyλ ù = kw-áləŋ, [...],
 stand.up-INS when old = SEL SG-hunger COP DIR = SG-mountain [...]
 y-λhúnèn ɲkwíyλ ɲ = í-wàán.
 PL-woman COP INS = PL-sibling
 ‘Once upon a time in the far past, there was hunger in the mountain; [...] there were women (who were) sisters.’

While *ɲkwíyλ* is used in verbless thetic sentences which “describe the existence or appearance of their subjects” ([Sasse 1987: 525](#)), the identificational copula (= focus marker) occurs in entity-central verbal thetic sentences in Tima.

A cleft or cleft-like analysis like the one posed by [Güldemann \(2010\)](#) for the split constructions in Tuu languages is a possible interpretation of the Tima data, given that the focus marker previously originated from a predication marker. However, Tima has split constructions which are different in that they exhibit a prosodic break and, in addition, a rising-tone contour on the split-off constituent. Furthermore, a focus-marked constituent must occur preverbally but not necessarily in the sentence-initial position (see (14)). As such, although we acknowledge the relationship of Tima focus constructions to clefts on morphological grounds, we think their prosodic properties and the position of focus-marked elements other than S/A speak against such an analysis.

In summary, this section showed that the focus-marked constituent must occur preverbally, either in sentence-initial position or immediately preceding the verb. Focus marking in Tima is generally exhaustive by implicature (except for in CORRECTION contexts); however, if focus marking occurs in the context of unexpectedness, exhaustivity seems to no longer be a necessary criterion for its use.

3.3 Selective marking in Tima

The other contrast-expressing marker in Tima is the selective marker = (G)i/ = (G)I. The exponents of the selective marker are morpho-phonologically conditioned, following the same regularities as described for focus marking with regard to the choice of the glide and the ATR-feature of the vowel. The selective marker generally signals the existence of a

are expressed in special SF constructions.” However, all Tima sentences discussed here can be associated with both SF and theticity.

$set_{\{A\}}$ out of which the current alternative is selected. It marks referents that are expressed as nouns with modifiers and cliticises to the modifier, which can be an adjective, another noun, or a clausal modifier such as relative clauses. Elliptically used modifiers may also feature the selective marker. Unlike the focus marker, the selective marker does not affect word order and it is not restricted to noun phrases in a preverbal position (see e.g. (28)).²² The selective marker also occurs in subject and object WH-questions, where it shows a slightly different syntactic behaviour. In the following paragraphs, we will discuss the distribution of the selective marker, focusing on its function to signal and open a $set_{\{A\}}$, while keeping in mind different types of contrast-relevant contexts.

Example (28), taken from a description of slaughtering an animal, shows the typical use of the selective marker, which appears on the modifier *kwààṛə̀k* ‘God’ following the head noun *kùrtú* ‘house’.²³ It indicates the existence of alternative houses apart from the ‘house of God’. These alternatives are not specifically mentioned in this text. The selective marker, and thus the opening of a $set_{\{A\}}$, is optional, as numerous other examples corresponding to the structure ‘house of X’ show. Here, optionality refers to the pragmatic intention of the speaker of whether or not to make alternatives available. If the selective marker is absent, the noun phrase is descriptive by nature without pointing out that there may be other types of houses to be considered, i.e. without the selective marker, the notion of contrast is absent.

(28) **SEL-IMPL**

Tima (290108_29_HamidSlaughter 012-14)

à-páɾ-ì àwóónó’nó ù = kùrtú ɛ̀ = kwààṛə̀k = (í).

2SG-put-TR into.direction **DIR = house DIR = God = SEL**

‘You put it (the slaughtered animal) down into the direction of the house of *God* (i.e. al-ka’ba).’

As we will argue in this section, even though one could think of the selective marker as a kind of focus marker, a contrastive topic marker, a backgrounding marker, or a clausal determiner, it does not fit well into either of these categories. Therefore, we treat it as a different type of marker and refer to it as “selective” marker, following [Schneider-Blum & Hellwig \(2018\)](#) and [Casaretto et al. \(2020\)](#).

The prototypical syntactic context in which the selective marker occurs is on nominal modifiers, e.g. adjectives (29), adnominal possessive markers (31), or nouns that modify a head noun, e.g. in (28). In addition, the marker occurs to mark WH-questions, shown in e.g. (41). In its function to open a $set_{\{A\}}$ and to draw attention to the selected alternative, we can distinguish the following types of contrast-sensitive contexts in which the selective marker occurs: SIMILARITIES/OPPOSITIONS, SELECTIONS, WH-questions, each of which is discussed in turn.

Example (29) shows a SIMILARITY/OPPOSITION context with explicit alternatives, as ‘this female child’ is opposed to ‘this male child’ in a parallel construction (also called contrastive topic construction, cf. [Büiring 2003](#)). Both modifiers are marked by the selective marker. Note that the other pair of alternatives that are opposed in example (29), ‘dog’ and ‘cat’, cannot receive selective marking, since they consist of simple nouns without any modifier, even though, semantically, they would qualify as two opposed alternatives and hyponyms to the category of animals as the higher taxonomic level.

²² This is different when the selective marker occurs together with the focus marker, but in that case, the focus marker shows responsible for the change of word order.

²³ The directional marker *V=*, a clitic whose vowel quality is determined by the first vowel of the noun, is primarily used to mark spatial relations and directions. It is also the marker used when modifying head nouns with another noun.

Similarly, selective marking would be infelicitous on both occurrences of *cíblànλ* ‘the child’ if unmodified, i.e. **cíblànλ = yí*. Also, focus marking for any of the participants in this SIMILARITY/OPPOSITION context is not allowed. Thus, neither ‘dog’ nor ‘cat’, nor the ‘female child’ or the ‘male child’ in (29) can receive focus marking.

(29) **SIM/OPP**

Tima (Skopeteas_12_1_C1)

[...] *kúú = (*yí) è-kál'óm cíblàn = nλ kúúnén = (í) wλλ*
 [...] *dog = SEL 3-bite:PST child = DEM.PROX SG:female = SEL* [hesitation]

*kúràáj = (*í) è-kál'óm cíblàn = nλ kèmáádóh = (í).*

cat = SEL 3-bite:PST child = DEM.PROX SG:male = SEL

‘[A girl and a boy were standing chatting in an empty place, when a dog and a cat came; they took them by surprise;] the dog bit the *female* child, the cat bit the *male* child.’

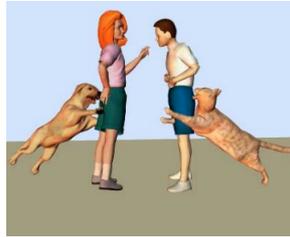


Figure 5: Stimulus of example (29).

Example (29) displays contrast enforced by the parallel structure used to juxtapose the two events. That is, in such pairing events with explicit alternatives, the contrast is greater than in events signalling implicit alternatives. However, the difference in degree of contrast cannot be ascribed to the selective marker itself, and parallel structures and selective marking have to be kept apart. Thus, each of the two clauses in (29), if used alone, is a grammatically and pragmatically complete sentence and would then indicate implicit alternatives.

Example (30) shows the use of the selective marker in the presence of nominal modifiers in another SIMILARITY/OPPOSITION context. We also see that the selective marker is not sensitive to exhaustivity: the utterance is an enumeration of feasts (organised by different *Tima* clans) which all make a similar contribution to the current QUD, and the list could be extended further. The superordinate $set_{\{A\}}$, i.e. the events celebrated by the *Tima* people, is left implicit.

(30) **SIM/OPP**

Tima (20190206_10)

*kòlná = nà ù = kúú = *(yí) nà kòlná = ná í = ìhòòk = *(í)*

feast = DEM.PROX DIR = dog = SEL and feast = DEM.PROX DIR = birds = SEL

*ì = ìhwáá kárkàmán = è ù-kóyò, ádí kòlná = nà í = ìlòbá = *(yí).*

ERG = people Karkaman = FOC.PL 3-make:PST also feast = DEM DIR = seeds = SEL

‘The feast of the dog and the feast of the bird were organised by the Karkaman clan, also the feast of the seeds.’

The selective marker is often, but not necessarily always, used in the presence of adnominal possessives as in (31). Usually, possessives rarely occur with explicitly mentioned alternatives, (31) being an exception to the rule. It shows the use of the selective marker in a SIMILARITY/OPPOSITION context.

- (31) **SIM/OPP**
Tima (011007_14_AdlaanMisiria_Horsequarrel 056)
 àkàh hɔ̀ = ɲàŋ t̪ɔ̀ndɔ̀ làáŋ = (í) wà àkàŋ mák hɔ̀ t̪ɔ̀ndɔ̀ = n̩
 2SG.RESP hit = 2SG road POSS:2SG = SEL and 3.RESP then hit road = DEM.PROX
 pínà = (yí).
 3SG = SEL
 ‘You (resp.) go *your* way and he (resp.) should go *his* way.’

That a syntactically parallel structure is not required for the use of the selective marker is illustrated in (32). This sentence is part of a description about the use of a number of different local plants which can be taken as the QUD of the discourse. It concludes the discourse segment whose topic is the sausage tree, before starting to explain what the baobab tree is used for. The explicitly mentioned *kwàlɔ̀wù* ‘sausage tree’ in (32) occurs together with the selective marker = *wí* in order to associate the sausage tree with the other plants that were the topics of different discourse segments within that conversation. It marks a SEL-IMPL relation on the discourse level, selecting the alternative ‘sausage tree’ from the implicit $set_{\{A\}}$ of plants that were mentioned during the conversation. Selective marking is hence not restricted to utterances but also used to relate larger discourse units.

- (32) **SEL-IMPL**
Tima (31.01.08_33, use of plants, Adlaan: 21f)
 t̪àmáá = ‘ná ù = kwàlɔ̀wù = (wí) ìkɔ̀ nàŋ.
 talk = DEM.PROX DIR = sausage.tree = SEL COP.SG here
 ‘This is what can be said about the *sausage* tree.’

In Tima, adjectives and quantifiers can generally be used without a head noun. In such cases, the selective marker occurs on the nominalised modifier itself, e.g. *kókólɔ̀ŋ* ‘the big (one)’ in (33), which shows a SELECTION context with explicit alternatives.²⁴

- (33) **SEL-EXPL**
Tima (20190206_09)
 àkáyíŋ ihú ì-híík, màk kó-kólɔ̀ŋ = (í)
 last.year giraffes STAT.PL-two but SG-big = SEL
 àm-búlú⁴k = á = t̪áŋ.
 3:PRF-die:PST:CAUS = SRC = LOC:3
 ‘Last year, there were two giraffes (lit.: giraffes are two), but the *old* one has died.’

Example (34) shows another explicit SELECTION context with the preceding question containing an explicit $set_{\{A\}}$ (‘these people’), of which the chosen alternative forms a part. One could also argue that (34) is a CORRECTION context. We do not treat it as such, however, because it does not entirely reject the proposition to hold true for the first alternative mentioned (‘these people’) but restricts it to a subset of the alternative (‘the male children’).

²⁴ Note also the use of the contrast sensitive particle *màk* ‘but’, expressing an additional unexpected OPPOSITION between two giraffes before and the death of one of the giraffes, with only one being left at the time of utterance.

- (34) **SEL-EXPL**
Tima (Skopeteas_24_1_A1C6)
 a. Are these people wearing hats?
 b. àʔà, íbλ = nλ ímáádóh = (í) = (*yÉ) ʒcè ù-kwáár-èk
 no child = DEM.PROX PL:male = SEL = FOC:PL COP:PL 3-wear-CAUS
 ítùηkwíyáák ì = yáàh.
 hats DIR = heads
 ‘No, the *male* children are wearing hats on their heads.’

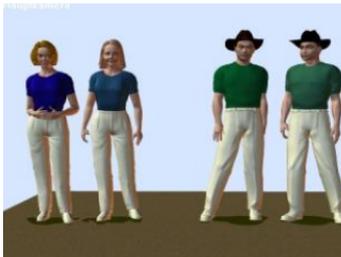


Figure 6: Stimulus of example (34).

If the same picture stimulus of (34) following the same question was described by using the *Tima* lexeme for ‘men’ instead of ‘male children’, neither selective marking nor focus marking would be felicitous.

Focus marking, as was tested, is not allowed in (34) (cf. also example (25b)), but if the (implied) question was instead *Who is wearing hats?*, as in (35), the focus marker would have been required and the copula *ʒcè* would have been inappropriate.

- (35) **SEL-WH**
Tima (20200304_HKD, Skopeteas_24_1_A1C6)
 íbλ = nλ ímáádóh = (í) = (*yÉ) (*ʒcè) ù-kwáár-èk ítùηkwíyáák
 child = DEM.PROX PL:male = SEL = FOC:PL COP:PL 3-dress-CAUS hats
 ì = yáàh.
 DIR = heads
 ‘The *male children* are wearing hats on their heads.’

The examples provided so far all showed the selective marker attaching to noun phrases with phrasal modifiers. However, it can also occur on clausal modifiers, namely on relative clauses (36), temporal *when*-clauses (37), and reason-clauses (38). In such cases, the selective marker occurs at the right edge of the entire subordinate clause (indicated by square brackets). We classify such contexts as implicit SELECTIONS, since the function of the selective marker in such contexts still is to draw attention to the selected alternative (the referent of the modified head noun) out of other possible alternatives.

- (36) **SEL-IMPL**
Tima
 címí = nà η-kéél+káá = yán = ‘ná í = kí+bááη = *(í) à-kkwòlón.
 goat = DEM P-sell:INS = LOC:3 = ERG1SG DIR = friend = SEL STAT.SG-very.big
 ‘The goat which I sold to the friend is very big.’

- (37) **SEL-IMPL**
Tima (20190120_10)
 kùlá àyínà ò-díyáŋ-áá = 'ná ú = l-ǝǝ = *(yí), kápín
 yesterday when P-come:IPFV-INS = ERG:1SG DIR = LOC-home = SEL Kaping
 ì-gìrà, ìtáŋ ì-yàtù.
 3-read:IPFV Ithang 3-rest:IPFV
 'Yesterday, when I came home, Kaping was reading, Ithang was sleeping.'
- (38) **SEL-IMPL**
Tima (03.03.07-2-70)
 háámìt k-úùh à-rǝǝr = yáŋ, ñkǝǝ'nó díf'k-áá = *(yí).
 Hamid SG-bone STAT.SG-sad = LOC.3P [because walk-INS-EP = SEL]
 'Hamid is sad, because he is leaving.'

The use of the selective marker with relative clauses (36) can be explained as an extension of its use with nouns that have phrasal modifiers to nouns that have clausal modifiers. Its occurrence with the temporal clause in (37) can be explained by the subordinator *àyínà* 'when' having a nominal base, formed by an oblique head and the demonstrative clitic, i.e. $a = y = I = na$ 'SRC = EP = PL = DEM.PROX'. Similarly, *ñkǝǝ'nó* 'because/since/as', likely originated from $\eta = kǝǝ = nó$ 'INS = walking = DEM.PROX', accounting for the presence of the selective marker in (38). Thus, the subordinate clauses that occur with the selective marker structurally resemble complex noun phrases in which the nominal head is modified by a demonstrative clitic and a clausal modifier to which the selective marker cliticises.

The use of the selective marker, especially in clause-final position in relative clauses and the other two types of adverbial clauses, is reminiscent of the backgrounding marker in Chadic, e.g. in Ngamo (Grubic & Renans 2016; Grubic et al. 2019), Barayin (Loves-trand 2018), Buwal (Viljoen 2015), Gemzek (Scherrer 2012), Muyan (Smith 2003), and of clausal determiners in Kwa and Gbe languages, e.g. in Akan (Saah 2010; Amfo 2010; Bombi et al. 2019), Gã (Korsah 2017: 151-165), Ewe (Ameka 1991: 265-298), Fongbe (Lefebvre & Brousseau 2002: 481-502), Gungbe (Aboh 2005), Logba (Dorvlo 2008: 185).²⁵ However, we argue that there are substantial differences between those markers and the selective marker in Tima, which is why we do not classify it as a clausal determiner.

First, the clausal determiners in the languages cited also function as (some sort of) definite or anaphoric determiner of noun phrases. This is not the case in Tima, where the selective marker does not formally mark definiteness (nor specificity, givenness, nor any other referential value). Even though the referents of the noun phrases marked by the selective marker are mostly also definite or given, this is not necessarily the case. With regard to givenness, this can be seen in example (28) above, where the selective marker occurs on a salient but newly-introduced referent. Example (39) shows that definiteness is not a criterion for the occurrence of the selective marker either:

- (39) **SEL-IMPL**
Tima (09_Hamad_2 043)
 ìhwáá = wééŋ 'ǝ-dáyìŋ = dè k-ákámòŋ kí-tíín = í ñkwíyà = tǝŋ.
 people = DEM.REF 3-run:VENT = INTENS SG-Wali SG-one = SEL COP = LOC:3
 'Those people ran here where another Wali person was.'

²⁵ We thank an anonymous reviewer for pointing out these parallels to us.

Second, it also is difficult in Tima to establish a relation between the selective marker and the demonstratives (= *na*, = *yaa*, = *weeŋ*) as a potential diachronic source of the former. The only hint that could indeed point towards a deictic origin of the selective marker are the proximal demonstratives in the related languages Katla and Julut. For proximal demonstratives, Katla uses = *gi*/ = *gt* (SG), = *ii*/ = *u* (PL) (Birgit Hellwig, p.c.), and Julut has = *nggi* (SG) and = *ii* (PL) (Nüsslein 2019: 76). However, without better diachronic evidence, the reconstruction of a deictic source of the selective marker remains rather speculative.

Third, the use of the selective marker in subordinate clauses also differs from the use of clausal determiners in two ways. As previously discussed, the selective marker in Tima only occurs with the three types of subordinate clauses shown in (36) to (38), which consist of overt nominals (even if semantically bleached) with clausal modifiers. With clauses beginning with other subordinators as in (40), it is not attested. The selective marker is therefore still a nominal determiner rather than a clausal one.

- (40) *Tima* (2011_06_28_05_04)
 á'méé mǝk-áá ŋ = wǝrtʂ'máádʂh = ná íyém'péré, k = á'méé
 COND.IRR drink-INS ERG = man = DEM.PROX medicine NEG = COND.IRR
 bǝlǝk = ǝŋ.
 die:CAUS = NEG
 'If this man had drank his medicine, he would not have died.'

Also, clausal determiners such as the one in Ewe, for instance, often only occur in subordinate clauses when the latter precede the main clause, since they convey background information, set the frame for the information in the main clause, and mark the information in the subordinate clause as given. Ameka (1991) illustrates this backgrounding function for the clausal determiner in Ewe in great detail. Similar patterns with a certain degree of variation are attested with the backgrounding markers as well as with the clausal determiners. In Tima, however, the position of the subordinate clause does not affect the use of the selective marker, which can occur in a subordinate clause preceding the main clause, as in (37), or following it, as in (38).

Fourth, both backgrounding markers and clausal determiners appear within the topical, given background part of a bipartite cleft structure in the clause. The selective marker can occur in such positions as well; however, as we show in Section 3.4, it is not restricted to the background part of a sentence and can co-occur with the focus marker on the same constituent.

Thus, even though the selective marker does share a number of distributional and functional properties as well as potentially its deictic origin with clausal determiners and backgrounding markers, it differs from them in the ways outlined above, which is why we analyse it as a related, yet different type of marker.

One more type of context in which the selective marker appears still remains to be discussed: its systematic occurrence in WH-questions.²⁶ In (41) and (42), it marks a subject and an object question with an implicit *set*_{A}, whereas (43) shows that it is also used with questions that have an explicit *set*_{A}.²⁷ The explicitness is contextually conditioned, as the teacher is asking two students which one of them lied. While the selective marker

²⁶ This only applies if a core argument, i.e. subject or object, is asked for. Questions about e.g. the location (*where?*) or time (*when?*) are not marked by the selective marker.

²⁷ In all cases, the WH-word has to be expressed in the sentence-initial position; therefore, the word order in (42) is OVA (with the postverbal subject marked for ergativity).

is obligatory in questions such as (41)–(43), the focus marker is not acceptable in such constructions – neither on the WH-word, nor on any other constituent.

- (41) **WH-Q**
Tima (20190120_07)
 yèé'mé ú-kòyò kùrtú = *(wí)?
 who 3-build:PST house = **SEL**
 'Who built the house?'
- (42) **WH-Q**
Tima (20190120_01)
 yèé'mé ú-kùmùn mínà = *(yì)?
 who 3-see:PST ERG:3SG = **SEL**
 'Who did he see?'
- (43) **WH-Q**
Tima (20190206_01)
 yèé'mé ì-cóó kirkí = *(yí)?
 who 3-pierce:PST lie = **SEL**
 'Who (of you two people standing in front of us) lied?'

Note that the selective marker does not occur on the WH-word directly but systematically in the clause-final position instead. This differs from its use with modified nouns and suggests a different development, in which the subject and object WH-constructions containing a clause-final selective marker could go back to an earlier bi-clausal relative structure. While there is no strong evidence from the Tima data itself to support this analysis, we find a number of unrelated or extremely distantly related languages with a similar ex-situ construction for subject and object questions. Such constructions usually originate from earlier clefts with relative clauses such as *What is it that X did?*, and languages may have retained relative-clause markers even though the WH-question may synchronically no longer be bi-clausal. For instance, in Chadic (cf. [Hartmann & Zimmermann 2008](#) for Hausa), Bantu (cf. [Sabel & Zeller 2006](#) for Zulu and Nguni, [Mchombo 2004](#) for Chichewa, [Wasike 2006](#) for Lubukusu), Coptic ([Reintges 2008](#)), or Algonquian (cf. [Déchaine 1997](#) for Plains Cree), relative markers occur on the verb in WH-questions with (ex-situ) WH-words. [Rose et al. \(2014\)](#) have also shown for Moro, a Kordofanian language spoken in the Nuba Mountains of Sudan, that ex-situ subject and object WH-questions show formal similarities with relative clauses. In Tima, such relative marking corresponds to the clause-final selective marker. Thus, the hypothesis that WH-questions in which the selective marker occurs go back to bi-clausal structures involving relativisation can in principle account for the occurrence of the selective marker in the clause-final position. However, since there is no strong evidence from Tima that would point towards such an earlier bi-clausal stage of WH-questions, this hypothesis has to remain rather speculative.

To conclude, we showed in this section that the selective marker occurs in different contexts of weaker contrast in which alternatives are signalled, namely in SIMILARITIES/OPPOSITIONS, SELECTIONS, WH-questions. All contrast-relevant contexts of the selective marker are non-exhaustive, but, as we will show in Section 3.4, the selective marker is nevertheless compatible with exhaustive contexts.

3.4 The interaction of the focus and the selective marker

Having discussed the distribution and function of the focus marker in Section 3.2 and the selective marker in Section 3.3, we now turn to a brief discussion of constructions in which both markers co-occur. Example (44) is a variant of the utterance presented in (33). While the structure in (33) was uttered by a consultant without any specific preceding question, the one presented in (44) below is the answer to the question *Which giraffe died?* or *Did the old or the young giraffe die?*. It features both the selective marker =*í* and the focus marker =*lí*.²⁸ Thus, the selective marker may occur in answers to WH-questions and alternative questions (under the conditions described in Section 3.3), but only together with the focus marker. The latter is required in the answer to those questions (see Section 3.2).

- (44) **SEL-WH/SEL-ALT**
Tima (20190206_09)
kó-kólón = (*íí*) = *(*lí*) *ú-búlúk* = *á* = *ṭàŋ*.
SG-big = **SEL:LV** = **FOC.SG** 3-die:PST:CAUS = SRC = LOC:3
 ‘The *old one* (i.e. giraffe) died.’
 (Context: the addressee knew that one of two giraffes had died and wanted to know which one.)

The use of selective marking in (44) indicates that *kó-kólón* ‘the old one’ is a subset of the aforementioned explicit *set_{A}*, whilst focus marking is triggered by the selection of one of the alternatives given in the preceding question.

In example (45), focus marking has a corrective function. The context has to be imagined as follows. A discourse participant assumed that the younger of two giraffes had died. This was not true and his interlocutor, i.e. the speaker of (45), expressed a CORRECTION which requires the use of the focus marker. In addition, the selective marker is present on both alternatives to signal the relationship between the current alternatives (*the old vs. the young giraffe*).

- (45) **CORR**
Tima (20190206_09)
kùhú = *nλ* *kò-kòlón* = (*íí*) = *(*lí*) *ù-bùlúk* = *à* = *ṭàŋ*,
giraffe = DEM.PROX *SG-big* = **SEL:LV** = **FOC.SG** 3-die:PST = CAUS = SRC = LOC:3
kè = *kè-tè?èn* = (*íí*) = *(*lí*) = *ìŋ*.
 NEG = *SG-small* = **SEL:LV** = **FOC.SG** = NEG
 ‘The *old giraffe* died, not the *young one*.’

Example (46) shows another CORRECTION context. The speaker rejects the proposition *Your sister gave birth.* and corrects it with *My aunt gave birth.* The two contrasted constituents *wèén lééní* ‘my (younger) aunt’ and *lùwì lèèní* ‘my sister’ are focus-marked in both (46a) and (46b), similarly to the contrasted elements in example (45). The only difference between (46a) and (46b) is in the use of the selective marker on the nominal modifier ‘small’. Generally speaking, the selective marker can be attached to any one of the modifiers, some of them, or all of them, in case the noun has more than one modifier. In example (46a), the selective marker =*í* attaches to *léén* ‘my’ and thus precedes the

²⁸ When the selective marker and the focus marker =*li*/*li* co-occur, the vowel of the selective marker is lengthened.

second modifier *kóté?én* ‘small’. In (46b), on the other hand, the selective marker =*í* occurs on both modifiers, i.e. on *léén* ‘my’ and *kóté?én* ‘small’.

(46) **CORR**

Tima (20190120_06)

- a. *wèén léén = í* *‘kó-té?én = *(Íf)* *ú-‘kùún,*
 mother POSS:1SG = SEL SG-small = FOC.SG 3-give.birth:PST
kú = lùwì *lèèn = íf = *(Íf) = ìŋ.*
 NEG = sister.of.male POSS:1SG = SEL:LV = FOC.SG = NEG
 ‘My aunt (a younger sister of the mother) gave birth, not my sister.’
- b. *wèén léén = í* *‘kó-té?én = íf = *(‘Íf)* *ú-‘kùún,*
 mother POSS:1SG = SEL SG-small = SEL:LV = FOC.SG 3-give.birth:PST
kú = lùwì *lèèn = íf = *(Íf) = ìŋ.*
 NEG = sister.of.male POSS:1SG = SEL:LV = FOC.SG = NEG
 ‘My aunt (a younger sister of the mother) gave birth, not my sister.’

This difference in usage between examples (46a) and (46b) entails a semantic difference. In (46a), where the selective marker only occurs with the possessive pronoun *léén* ‘my’, the speaker indicates that there are mothers other than his own. This is due to the fact that the term *wèén* in Tima does not only refer to a person’s biological mother, but also to all the sisters and female cousins of the mother and the father, in addition to the mother’s co-wives. Moreover, it may be used to refer to any respected woman who is older than the speaker. Thus, to narrow down potential referents, kinship terms like *wèén* are usually additionally specified. This is achieved first and foremost by possessives, but also by reference to the age of the person, here *kóté?én* ‘small’. The phrase *wèén léení ‘kóté?én*, literally, ‘my small mother’, excludes any non-relatives and refers to an ‘aunt younger than the mother’. In (46a), *kóté?én* ‘small’ does not receive selective marking. Thus, the ‘aunt’ is simply described as being younger than the mother. In example (46b), on the other hand, the selective marker is also used on *kóté?én* ‘small’, which signals existing alternatives on the level of that modifier, i.e. one or more aunts who are older than the biological mother.

Another example with both selective and focus marking on the same phrasal constituent was presented in Section 3.2, repeated here for convenience as example (47). The two markers are attached to the last element, i.e. *ihá’wók* ‘many’ of the phrase *ihwáá’ná ihá’wók* ‘lots of people’. This example shows their co-occurrence in a context in which the focus marker is used to signal unexpectedness rather than exhaustivity, while the selective marker indicates that there were other people who were not in the street. In the two phrases *ínà ihá’wók = í* ‘a lot/most of them’ and *ibè?éŋ = í* ‘a few of them’, selective marking refers to subgroups of the people in the street. In the former phrase, the quantifier modifies a demonstrative pronoun, in the latter, the selective marker appears again on a nominalised modifier, i.e. *ibè?éŋ* ‘some, a few’.

(47) **unexpected ALT**

Tima (20190204_07)

- kùlá ihwáá = ‘ná* *ihá’wók = í = yé* *ù = t̥ndòð; ínà*
 yesterday, people = DEM.PROX many = SEL = FOC.PL DIR = road PL:DEM.PROX
ihá’wók = í *ú-kòkwéé* *ídék, ibè?éŋ = í* *í-pàk-àk-àà* *yáwùh.*
 many = SEL 3-hold:PST necks few = SEL 3-throw:PST-AP-INS stones
 ‘Yesterday, lots of people were in the street; (while) most of them were peaceful, some threw stones.’

To sum up: both the selective and the focus marker share the function of indicating alternatives. However, the co-occurrence of the two markers in a sentence, especially when they occur on the same constituent, is evidence for those two markers having distinct, though overlapping domains.²⁹ Focus marking, at its core, singles out the current alternative, either exhaustively (by implicature), or as an unexpected, surprising, and noteworthy alternative. The selective marker signals alternatives that are available on the basis of nominal modifiers, which semantically specify the referent and relate the chosen alternative to others which are similar, yet distinct. The examples from this section are also evidence against an analysis of the selective marker as a topic or backgrounding marker, given that its use with focus-marked constituents is felicitous.

4 Contrast as a gradient concept: Implications from Tima

As we have shown, Tima employs two different morphological markers for the expression of contrast. Table 4 summarises those weaker and stronger types of contexts in which the two markers are used, according to the exhaustivity and unexpectedness of the alternative. We see that the focus marker is used to mark stronger contrast and cannot be applied in weaker contrastive contexts, which are instead marked by the selective marker. The selective marker is also compatible with stronger contrast in that it can occur optionally in addition to the focus marker (marked as compatible in Table 4).

Table 4: Focus and selective marker with stronger and weaker contrast.

strong contrast		>	weak contrast		
exhaustivity					
	exhaustive (CORR)	>	exhaustivity effect (SEL-WH, SEL-ALT, SEL-EXPL, SIM, OPP)	>	non-exhaustive (WH-Q, SEL-IMPL)
FOC	✓		✓		compatible if unexpected
SEL	compatible		(✓)		✓
unexpectedness					
	unexpected A	>		>	expected A
FOC	✓				compatible if exhaustive
SEL	compatible				(✓)

As we showed in Section 3, the explicitness of $set_{\{A\}}$ does not play a role for the distribution of the focus and the selective marker in Tima; the focus marker obligatorily occurs in contexts of implicit $sets_{\{A\}}$ in answers to WH-questions, but it also occurs with explicit $sets_{\{A\}}$ in e.g. CORRECTIONS. Similarly, the selective marker is used with both types of $sets_{\{A\}}$; e.g. SIMILARITIES with explicit alternatives or in WH-questions with implicit

²⁹ The examples presented in this section show both markers on the same constituent in order to clearly illustrate their different functions. Of course, focus and selective marker may also occur on different constituents, as is the case in example (30).

alternatives. Note that the brackets in Table 4 mark the use of the selective marker as optional in the sense of pragmatically conditioned. Furthermore, even though the use of the selective marker was shown to be optional in this sense in implicit SELECTION examples in Section 3.3, its use is shown as obligatory here, as it is only the presence of the selective marker that makes the expression contrastive.

The selective marker is used in weaker contrastive contexts that simply signal alternatives which are made available on the taxonomic level of the nominal modifier. In addition, it is used in WH-questions in which the WH-element stands in for the subject or the object. The focus marker, on the other hand, signals alternatives in stronger types of contrast, namely in (more) exhaustive contexts and/or with alternatives that are unexpected and noteworthy. The gradient nature of contrast, i.e. the different degrees of contrastivity that contexts can have, is thus directly reflected in the distribution of the selective marker and the focus marker in Tima. This is exactly what we expect according to Repp (2016: 8): “If contrast comes in different degrees we may expect that these degrees correlate with the application of additional or different grammatical means.”

Often, only stronger contexts of contrast require or allow for a certain prosodic or syntactic structure that weaker types of contrast do not do. Examples of this include contrastive focus and mirative focus fronting in Romance (cf. Cruschina & Remberger 2017; Cruschina 2019 and references therein), contrastive fronting and prosody in German (cf. Frey 2010), exhaustive focus fronting in Hungarian (cf. Horvath 1985; É. Kiss 1998), prosodic patterns of contrast in English (cf. Katz & Selkirk 2011), exhaustive focus marking in Hausa (cf. Hartmann & Zimmermann 2008), and focus fronting/marking in West Chadic due to unexpectedness (cf. Zimmermann 2007), to mention a few.

In some ways, the Tima pattern is similar to the ones observed in other languages. However, Tima differs from other well-known patterns of contrastive marking in that it has two distinct morphological markers, i.e. a morphological marker for weaker contrast in addition to a marker for strong contrast. Given that contrast is built into the grammar of Tima in such a way, we have shown in Section 3.4 that both markers can co-occur. For instance, SELECTION contexts, which have alternatives made available through the use of nominal modifiers, are expressed using the selective marker; at the same time, the chosen alternative may be unexpected and noteworthy, which in turn licenses the presence of the focus marker (cf. example (47)). Another example of a contrastive context in which the two markers co-occur was shown in (44). Here, the selective marker was used because the context was the SELECTION of an alternative from an explicit $set_{\{A\}}$. Since the utterance was also an answer to a WH-question, the use of the focus marker was additionally required.

The first dimension which is of importance for contrast in Tima concerns exhaustivity. We saw the selective marker used in non-exhaustive contexts, i.e. in those contexts that do not exclude other alternatives, in SIMILARITES/OPPOSITIONS and SELECTIONS (including WH-questions). Sometimes, as is the case with explicit alternatives (as in (33)), the context allows for an implicit exhaustive interpretation. The other extreme, namely CORRECTIONS, which entailed exhaustivity, requires the presence of the focus marker. Likewise, explicit SELECTIONS in answers to alternative or WH-questions, which implicate exhaustivity are focus-marked in Tima. However, we also saw that explicit selections from a closed $set_{\{A\}}$ can be marked by the selective marker, which directly reflects the gradient character of the exhaustivity dimension in that the extreme values are prototypical contexts for either marker, while both can occur with the central value.

The second dimension is that of unexpectedness or noteworthiness. It can license the use of the focus marker even in contexts that are non-exhaustive, namely in utterances

in which a speaker feels a particular alternative requires highlighting. Moreover, we saw that the focus marker can occur with expected alternatives in answers to alternative questions (SEL-ALT contexts). However, focus marking is only compatible with expected alternatives if they are exhaustive, at least by implication, as is the case in SEL-ALT contexts. The selective marker, on the other hand, which occurs with expected alternatives by default, is only compatible with unexpected ones, and may occur in addition to the focus marker.

5 Outlook

In this study, we argued for a broad approach to contrast and that contrast is gradient rather than categorical. We provided evidence from Tima, where two different morphological markers are used in order to signal contexts involving different degrees of contrastivity. As for the selective marker, we showed that it signals the presence of a set of alternatives, marking weaker types of contrast. The use of the focus marker was shown to be obligatory in stronger types of contrast, such as SEL-WH and SEL-ALT as well as in CORRECTIONS, and we showed that its use is additionally conditioned by the unexpectedness and noteworthiness of the alternative.

However, in Tima, not all contexts which involve contrast in the way defined in Section 2 have to be marked morphologically: contrast may occur in examples that have neither selective nor focus marking. In such cases, a parallel structure of the clauses and/or the discourse particle *màk* ‘but’ may suffice to convey contrast. Though the use of *màk* ‘but’ might be similar to the use of ‘but’ in English, its exact properties and interplay with the two morphological markers of focus will need to be explored in future research.

Another dimension of contrast-marking in Tima that requires more detailed study in the future is the involvement of prosody. Tima does not seem to use different tonal patterns to express contrast; a closer look at the prosodic patterns may, however, reveal even finer-grained distinctions in marking different types of contrast.

Abbreviations

1 = first person, 2 = second person, 3 = third person, ALT = alternative, AP = antipassive, CAUS = causative, COMPL = completive, COP = copula, CORR = correction, DEM = demonstrative, DIR = directional, ERG = ergative, FOC = focus, G = glide, INS = instrumental, LOC = locative, LV = lengthened vowel, MID = middle, NEG = negation, OPP = opposition, OPT = optative, P = person, PRF = perfect, PL = plural, POSS = possessive, PROX = proximal, Q-ALT = alternative question, Q-WH = WH-question, REF = referential, REP = reported, RESP = respect marker, SG = singular, SEL = selective marker, SEL-ALT = selection in answer to ALT-question, SEL-EXPL = explicit selection, SEL-IMPL = implicit selection, SEL-WH = selection in answer to WH-question, SIM = similarity, SRC = source, STAT = stative

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References

- Abeillé, Anne, Danièle Godard & Frédéric Sabio. 2008. Two types of preposed NP in French. In Stefan Müller (ed.), *Proceedings of the 15th HPSG conference*, 306–324. Keihanna, Japan: CSLI Publications. <https://halshs.archives-ouvertes.fr/halshs-00751057>.
- Aboh, Enoch Oladé. 2005. Deriving relative and factive construction in Kwa. In Laura Brugè, Giuliana Giusti, Nicola Munaro, Walter Schweikert & Guiseppina Turano (eds.), *Contributions to the thirtieth Incontro di Grammatica Generativa*, 265–285. Venezia: Libreria Editrice Cafoscarina.
- Ameka, Felix Kofi. 1991. *Ewe: Its grammatical constructions and illocutionary devices*. Canberra: Australian National University dissertation. <https://doi.org/10.25911/5d78dbbba9a3b>.
- Amfo, Nana Aba Appiah. 2010. Noun phrase and clausal connectives in Akan. *Studies in African Linguistics* 36(1). 1–27.
- Bashir, Abeer. 2013. Conditions of feature specification in Tima. In Thilo C. Schadeberg & Roger M. Blench (eds.), *Nuba Mountain language studies* (African Languages Monograph 6), 269–280. Cologne: Köppe.
- Benz, Anton & Katja Jasinskaja. 2017. Questions under discussion: From sentence to discourse. *Discourse Processes* 54(3). 177–186. <https://doi.org/10.1080/0163853X.2017.1316038>.
- Bombi, Carla, Mira Grubic, Agata Renans & Reginald Akuoko Duah. 2019. The semantics of the (so-called) clausal determiner *nó* in Akan (Kwa). In M. Theresa Espinal, Elena Castroviejo, Manuel Leonetti, Louise McNally & Cristina Real-Puigdollers (eds.), *Proceedings of Sinn und Bedeutung 23*, 181–199. Bellaterra: Universitat Autònoma de Barcelona.
- Brunetti, Lisa. 2004. *Unification of focus*. Padua: Unipress.

- Brunetti, Lisa. 2009. Discourse functions of fronted foci in Italian and Spanish. In Andreas Dufter & Daniel Jacob (eds.), *Focus and background in Romance languages* (Studies in Language Companion Series 112), 43–82. Amsterdam: Benjamins.
- Büring, Daniel. 2003. On d-trees, beans, and B-accent. *Linguistics and Philosophy* 26(5). 511–545. <https://doi.org/10.1023/A:1025887707652>.
- Büring, Daniel. 2016. (Contrastive) Topic. In Caroline Féry & Shinichiro Ishihara (eds.), *The Oxford handbook of information structure*, 64–85. Oxford: Oxford University Press.
- Calhoun, Sasha. 2010. The centrality of metrical structure in signaling information structure: A probabilistic perspective. *Language* 86(1). 1–42. <https://doi.org/10.1353/lan.0.0197>.
- Casaretto, Antje, Gerrit J. Dimmendaal, Birgit Hellwig, Uta Reinöl & Gertrud Schneider-Blum. 2020. Roots of ergativity in Africa (and beyond). *Studies in African Linguistics* 40(1). 185–215.
- Chafe, Wallace L. 1976. Givenness, contrastiveness, definiteness, subjects, topics, and point of view. In Charles N. Li (ed.), *Subject and topic*, 25–55. New York: Academic Press.
- Creissels, Denis. 2020. Remarks on the grammaticalization of identificational clefts. *Linguistic Discovery* 17(1). 7–20.
- Cruschina, Silvio. 2012. *Discourse-related features and functional projections*. Oxford: Oxford University Press. <https://doi.org/10.1093/acprof:oso/9780199759613.001.0001>.
- Cruschina, Silvio. 2016. Information and discourse structure. In Adam Ledgeway & Martin Maiden (eds.), *The Oxford guide to the Romance languages*, 596–608. Oxford: Oxford University Press.
- Cruschina, Silvio. 2019. Focus fronting in Spanish: Mirative implicature and information structure. *Probus* 31(1). 119–146. <https://doi.org/10.1515/probus-2018-0008>.
- Cruschina, Silvio & Eva-Maria Remberger. 2017. Focus fronting. In Andreas Dufter & Elisabeth Stark (eds.), *Manual of Romance morphosyntax and syntax* (Manuals of Romance Linguistics 17), 502–535. Berlin: De Gruyter.
- Davies, Matt. 2012. A new approach to oppositions in discourse: The role of syntactic frames in the triggering of noncanonical oppositions. *Journal of English Linguistics* 40(1). 41–73. <https://doi.org/10.1177/0075424210385206>.
- Déchaine, Rose-Marie. 1997. Nominal predication in Plains Cree. In David H. Pentlant (ed.), *Papers of the 28th Algonquian conference*, vol. 28, 105–135. Winnipeg: University of Manitoba.
- Dimmendaal, Gerrit J. 2018. Reconstructing Katloid and deconstructing Kordofanian. In Gertrud Schneider-Blum, Birgit Hellwig & Gerrit J. Dimmendaal (eds.), *Nuba Mountain language studies: New insights* (Grammatical Analyses of African Languages 57), 382–415. Cologne: Köppe.
- Dorvlo, Kofi. 2008. *A grammar of Logba (Ikpána)*. Utrecht: LOT.
- É. Kiss, Katalin. 1998. Identification focus versus information focus. *Language* 74(2). 245–273. <https://doi.org/10.2307/417867>.
- Fiedler, Ines, Katharina Hartmann, Brigitte Reineke, Anne Schwarz & Malte Zimmermann. 2010. Subject focus in West African languages. In Malte Zimmermann & Caroline Féry (eds.), *Information structure. Theoretical, typological, and experimental perspectives*, 234–257. Oxford: Oxford University Press.
- Frascarelli, Mara & Roland Hinterhölzl. 2007. Types of topics in German and Italian. In Kerstin Schwabe & Susanne Winkler (eds.), *On information structure, meaning and form: Generalizations across languages* (Linguistik Aktuell/Linguistics Today 100), 87–116.

- Amsterdam: Benjamins. <https://doi.org/10.1075/la.100.07fra>.
- Frey, Werner. 2006. Contrast and movement in the German prefield. In Valéria Molnár & Susanne Winkler (eds.), *The architecture of focus* (Studies in Generative Grammar 82), 235–264. Berlin: De Gruyter.
- Frey, Werner. 2010. \bar{A} -Movement and conventional implicatures: About the grammatical encoding of emphasis in German. *Lingua* 120(6). 1416–1435. <https://doi.org/10.1016/j.lingua.2008.09.016>.
- Green, Melanie. 2007. *Focus in Hausa*. Oxford: Blackwell.
- Grubic, Mira & Agata Renans. 2016. Definiteness marking on VPs/TPs in Ga and Ngamo. In Vera Hohaus & Wanda Rothe (eds.), *The semantics of African, Asian and Austronesian languages (Triple A) 3*, 1–15. Tübingen: Universitätsbibliothek Tübingen.
- Grubic, Mira, Agata Renans & Reginald Akuoko Duah. 2019. Focus, exhaustivity and existence in Akan, Ga and Ngamo. *Linguistics* 57(1). 221–268. <https://doi.org/10.1515/ling-2018-0035>.
- Gundel, Jeanette K. & Thorsten Fretheim. 2006. Topic and focus. In Laurence Robert Horn & Gregory Ward (eds.), *The handbook of pragmatics*, 175–196. Oxford: Blackwell.
- Güldemann, Tom. 2010. The relation between focus and theticity in the Tuu family. In Ines Fiedler & Anne Schwarz (eds.), *The expression of information structure: A documentation of its diversity across Africa* (Typological Studies in Language 91), 69–94. Amsterdam: Benjamins. <https://doi.org/10.1075/tsl.91.03gul>.
- Güldemann, Tom, Sabine Zerbian & Malte Zimmermann. 2015. Variation in information structure with special reference to Africa. *Annual Review of Linguistics* 1(1). 155–178. <https://doi.org/10.1146/annurev-linguist-030514-125134>.
- Halliday, Michael Alexander Kirkwood. 1967. Notes on transitivity and theme in English: Part 2. *Journal of Linguistics* 3(2). 199–244. <https://doi.org/10.1017/S0022226700016613>.
- Hartmann, Katharina & Tonjes Veenstra. 2013. Introduction. In Katharina Hartmann & Tonjes Veenstra (eds.), *Cleft structures* (Linguistik Aktuell/Linguistics Today 208), 1–33. Amsterdam: Benjamins.
- Hartmann, Katharina & Malte Zimmermann. 2007. In place - out of place? Focus strategies in Hausa. In Kerstin Schwabe & Susanne Winkler (eds.), *On information structure, meaning and form: Generalizations across languages* (Linguistik Aktuell/Linguistics Today 100), 365–399. Amsterdam: Benjamins.
- Hartmann, Katharina & Malte Zimmermann. 2008. Exhaustivity marking in Hausa: A reanalysis of the particle *nee/cee*. In Enoch Oladé Aboh, Katharina Hartmann & Malte Zimmermann (eds.), *Focus strategies in African languages: The interaction of focus and grammar in Niger-Congo and Afro-Asiatic*, 242–263. Berlin: De Gruyter.
- Heine, Bernd & Tania Kuteva. 2002. *World lexicon of grammaticalization*. Cambridge: Cambridge University Press.
- Horvath, Julia. 1985. *FOCUS in the theory of grammar and the syntax of Hungarian* (Studies in Generative Grammar 24). Dordrecht: Foris.
- Karttunen, Lauri. 1974. Presupposition and linguistic context. *Theoretical Linguistics* 1(1-3). 181–194. <https://doi.org/10.1515/thli.1974.1.1-3.181>.
- Katz, Jonah & Elisabeth O. Selkirk. 2011. Contrastive focus vs. discourse-new: Evidence from phonetic prominence in English. *Language* 87(4). 771–816. <https://doi.org/10.1353/lan.2011.0076>.
- Korsah, Sampson. 2017. *Issues in Kwa syntax: Pronouns and clausal determiners*. Leipzig: Leipzig University dissertation.

- Krifka, Manfred. 2007. Basic notions of information structure. In Caroline Féry, Gilbert Fanselow & Manfred Krifka (eds.), *The notions of information structure* (Interdisciplinary Studies on Information Structure 6), 13–56. Potsdam: Universitätsverlag Potsdam.
- Lambrecht, Knud. 1994. *Information structure and sentence form: Topic, focus, and the mental representations of discourse referents*. Cambridge: Cambridge University Press.
- Lambrecht, Knud. 2000. When subjects behave like objects. *Studies in Language* 24(3). 611–682.
- Lefebvre, Claire & Anne-Marie Brousseau. 2002. *A grammar of Fon*. Berlin: De Gruyter.
- López, Luis. 2009. Ranking the Linear Correspondence Axiom. *Linguistic Inquiry* 40(2). 239–276. <https://doi.org/10.1162/ling.2009.40.2.239>.
- Lovestrand, Joseph. 2018. The background marker ná in Barayin. *Journal of African Languages and Linguistics* 39(1). 1–39. <https://doi.org/10.1515/jall-2018-0001>.
- Malchukov, Andrej L. 2004. Towards a semantic typology of adversative and contrast marking. *Journal of Semantics* 21(2). 177–198. <https://doi.org/10.1093/jos/21.2.177>.
- Matić, Dejan. 2003. *Topics, presuppositions, and theticity: An empirical study of verb-subject clauses in Albanian, Greek, and Serbo-Croat*: University of Cologne dissertation.
- Mchombo, Sam. 2004. *The syntax of Chichewa*. Cambridge: Cambridge University Press.
- Molnár, Valéria. 2001. Contrast from a contrastive perspective. In Ivana Kruijff-Korbayova & Mark Steedman (eds.), *Proceedings of the ESSLI 2001 workshop on information structure, discourse structure and discourse semantics*, 99–114. Helsinki: The University of Helsinki.
- Molnár, Valéria. 2006. On different kinds of contrast. In Valéria Molnár & Susanne Winkler (eds.), *The architecture of focus* (Studies in Generative Grammar 82), 197–233. Berlin: De Gruyter.
- Molnár, Valéria & Susanne Winkler. 2010. Edges and gaps: Contrast at the interfaces. *Lingua* 120(6). 1392–1415. <https://doi.org/10.1016/j.lingua.2008.08.010>.
- Nüsslein, Ulrike. 2019. *Description and documentation of Julut with particular consideration of the verbal morphology*. Erfurt: University of Erfurt dissertation.
- Paoli, Sandra. 2009. Contrastiveness and new information: A new view on focus. *Rivista di Grammatica Generativa* 34. 137–161.
- Reinhart, Tanya. 1982. Pragmatics and linguistics: An analysis of sentence topics. *Philosophica* 27. 53–94.
- Reintges, Chris H. 2008. Coptic relative tenses: The profile of a morpho-syntactic flagging device. In Enoch Oladé Aboh, Katharina Hartmann & Malte Zimmermann (eds.), *Focus strategies in African languages: The interaction of focus and grammar in Niger-Congo and Afro-Asiatic*, 185–220. Berlin: De Gruyter.
- Repp, Sophie. 2010. Defining ‘contrast’ as an information-structural notion in grammar. *Lingua* 120(6). 1333–1345. <https://doi.org/10.1016/j.lingua.2009.04.006>.
- Repp, Sophie. 2016. Contrast: Dissecting an elusive information-structural notion and its role in grammar. In Caroline Féry & Shinichiro Ishihara (eds.), *The Oxford handbook of information structure*, Oxford: Oxford University Press. <https://doi.org/10.1093/oxfordhb/9780199642670.013.006>.
- Roberts, Craige. 1996. Information structure in discourse: Towards an integrated formal theory of pragmatics. *Ohio State University Working Papers in Linguistics* 49. 91–136.
- Rooth, Mats. 1992. A theory of focus interpretation. *Natural Language Semantics* 1. 75–116. <https://doi.org/10.1007/BF02342617>.

- Rose, Sharon. 2018. The typology of vowel harmony in Nuba Mountain languages. In Gertrud Schneider-Blum, Birgit Hellwig & Gerrit J. Dimmendaal (eds.), *Nuba Mountain language studies: New insights* (Grammatical Analyses of African Languages 57), 347–473. Cologne: Köppe.
- Rose, Sharon, Farrell Ackerman, George Gibbard, Peter Jenks, Laura Kertz & Hannah Rohde. 2014. In-situ and ex-situ wh-question constructions in Moro. *Journal of African Languages and Linguistics* 35(1). 91–125. <https://doi.org/10.1515/jall-2014-0003>.
- Saah, Kofi K. 2010. Relative clauses in Akan. In Enoch Oladé Aboh & James Essegbey (eds.), *Topics in Kwa syntax*, 91–107. Dordrecht: Springer.
- Sabel, Joachim & Jochen Zeller. 2006. Wh-question formation in Nguni. In John Mugane, John P. Hutchison & Dee A. Worman (eds.), *Selected proceedings of the 35th annual conference on African linguistics*, 271–283. Somerville, MA: Cascadilla Proceedings Project.
- Sasse, Hans-Jürgen. 1987. Thethetic/categorical distinction revisited. *Linguistics* 25(3). 511–580. <https://doi.org/10.1515/ling.1987.25.3.511>.
- Scherrer, Elaine Marie. 2012. *An overview of Gemzek narrative discourse features*. Yaoundé: SIL International.
- Schneider-Blum, Gertrud. 2018. Constituent focus and selective marking in Tima. In Gertrud Schneider-Blum, Birgit Hellwig & Gerrit J. Dimmendaal (eds.), *Nuba Mountain language studies: New insights* (Grammatical Analyses of African Languages 57), 255–279. Cologne: Köppe.
- Schneider-Blum, Gertrud & Birgit Hellwig. 2018. Reference tracking in Tima and its interplay with split ergative marking. *Studies in Language* 42(4). 970–993. <https://doi.org/10.1075/sl.17030.sch>.
- Schultze-Berndt, Eva & Candide Simard. 2012. Constraints on noun phrase discontinuity in an Australian language: The role of prosody and information structure. *Linguistics* 50(5). 1015–1058. <https://doi.org/10.1515/ling-2012-0032>.
- Selkirk, Elisabeth O. 2008. Contrastive focus, givenness and the unmarked status of “discourse-new”. *Acta Linguistica Hungarica* 55(3-4). 331–346. <https://doi.org/10.1556/aling.55.2008.3-4.8>.
- Skopeteas, Stavros & Gisbert Fanselow. 2011. Focus and the exclusion of alternatives: On the interaction of syntactic structure with pragmatic inference. *Lingua* 121(11). 1693–1706. <https://doi.org/10.1016/j.lingua.2011.05.005>.
- Skopeteas, Stavros, Ines Fiedler, Sam Hellmuth, Anne Schwarz, Ruben Stoel, Gisbert Fanselow, Caroline Féry & Manfred Krifka. 2006. *Questionnaire on information structure: Reference manual*. Potsdam: Universitätsverlag Potsdam.
- Smith, Tony. 2003. *Definiteness, topicalisation and theme: Muyang narrative discourse markers*. Yaoundé: SIL International.
- Stalnaker, Robert. 1974. Pragmatic presuppositions. In Milton K. Munitz & Peter K. Unger (eds.), *Semantics and philosophy*, 197–214. New York: New York University Press.
- Umbach, Carla. 2004. On the notion of contrast in information structure and discourse structure. *Journal of Semantics* 21(2). 155–175. <https://doi.org/10.1093/jos/21.2.155>.
- Umbach, Carla. 2005. Contrast and information structure: A focus-based analysis of “but”. *Linguistics* 43(1). 207–232.
- Vallduví, Enric & Maria Vilkuna. 1998. On rheme and kontrast. In Peter Culicover & Louise McNally (eds.), *The limits of syntax* (Syntax and Semantics 29), 79–106. New York: Academic Press.

- van Putten, Saskia. 2014. *Information structure in Avatime*. Nijmegen: Radboud University dissertation. <https://repository.ubn.rur.nl/handle/2066/131822>.
- Viljoen, Melanie. 2015. *Buwal narrative discourse*. Yaoundé: SIL International.
- Wasike, Aggrey. 2006. *The left periphery, wh-in-situ and A-bar movement in Lubukusu and other Bantu languages*. Ithaca, NY: Cornell University dissertation. <https://ecommons.cornell.edu/handle/1813/4029>.
- Zimmermann, Malte. 2007. Contrastive focus. In Caroline Féry, Gisbert Fanselow & Manfred Krifka (eds.), *The notions of information structure* (Interdisciplinary Studies on Information Structure 6), 147–159. Potsdam: Universitätsverlag Potsdam.