

Chapter 1

An Initial Look at Object Marking in Cinyungwe

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Cinyungwe is an under-researched Bantu language spoken in Mozambique. This paper is an initial investigation of object marking and related properties of the postverbal domain in Cinyungwe. We show that object marking occurs independently of right-dislocation of objects (though they can co-occur) and that OM-doubling is associated with an emphatic reading of the sentence. We propose that OMing is generated by a functional projection in the middlefield of the clause that also introduces the semantic operator generating emphasis.

1 Introduction to Cinyungwe object marking (OMing)

This paper addresses object markers (OMs) in Cinyungwe, a Bantu language (N43) spoken in Mozambique.¹ We show a basic example of object marking below in (1):

- (1) a. Baba a-da-phik-a ci-mbamba.
1father 1SM-PST-cook-FV 7-beans
'Father cooked beans.'
- b. Baba a-da-(ci-)phik-a.
1father 1SM-PST-7OM-cook-FV
'Father cooked them (beans).'

¹All data in this paper represent the linguistic intuitions of the first author.

In (1), the morpheme *ci-* is used instead of *cimbamba* ‘beans’ to anaphorically refer to the object of the sentence.

Previous work on OMs in Bantu languages focuses on whether they can co-occur with (i.e. **double**) overt objects (and if they can, under what conditions) (Marten et al. 2007; Marten & Kula 2012). More specifically, the literature explores how object markers come to occur in the positions that they occur in, debating whether OMs are pronominal forms, agreement markers, or some other kind of element (Kramer 2014; Baker & Kramer 2018; Riedel 2009). A core diagnostic is whether OMs are in complementary distribution with an overt *in situ* lexical object.

OM-doubling is possible in Cinyungwe, but there tends to be a prosodic break between the verb and the OMed object:

- (2) Baba a-da-(ci-) phik-a , (ci-mbamba) . “,” = prosodic break
 1father 1SM-PST-7OM-cook-FV 7-beans

Approx: ‘Father cooked beans.’ (details below on available interpretations)

Patterns like this have commonly been analyzed as instances of OMed objects moving out of the verb phrase, an analysis which we will adopt for examples like (2).²

- (3) Proposal for structure of (2):

Baba a-da-(ci-) phik-a ei-mbamba]_{VP} (ci-mbamba)
 1father 1SM-PST-7OM-cook-FV 7-beans

‘Father cooked beans.’

To the extent that we have observed thus far, animacy does not influence an object’s ability to be OMed (examples throughout) and OMing is never obligatory in main clauses in Cinyungwe.³ In addition, Cinyungwe only allows a single OM on the verb, as shown in (4).

- (4) a. Mw-ana w-a-pas-a ma-kaka yavu.
 1-child 1SM-PST-give-FV 6-cucumbers 1grandmother
 ‘The child gave cucumbers to grandmother.’

²Zulu is a prominent model, discussed below in §3.

³One possible exception is with locative objects.

- b. *Mw-ana w-a-ma-mu- pas-a.
 1-child 1SM-PST-6OM-1OM-give-FV
 Intended: ‘The child gave them (cucumbers) to her (grandmother).’
- c. *Mw-ana w-a-mu-ma- pas-a.
 1-child 1SM-PST-1OM-6OM-give-FV
 Intended: ‘The child gave them (cucumbers) to her (grandmother).’

This paper has two primary goals. The first is to document the core empirical patterns of Cinyungwe object marking and show that (i) OM-doubling triggers obligatory focal effects on vP (§2) and (ii) OM-doubling naturally (but non-obligatorily) co-occurs with object movement (§4). The second goal is to outline our current working hypothesis: we propose that (i) object movement is dissociated from OM-triggering Agree (§4), and (ii) the head bearing the OM-generating φ -features also introduces emphatic interpretations to the clause (§4).

2 Cinyungwe OMing interacts with focus

2.1 Non-doubling OMs, focused and not

The acceptability of non-doubling OMs is dependent on the discourse context at hand.

2.1.1 Non-doubling OMs: pragmatically neutral contexts

In pragmatically neutral contexts, the non-doubled OM pattern is asymmetrical. That is, it is natural to represent the structurally higher object with an object marker, but marginal to OM the structurally lower object.⁴ In (5), only the structurally higher benefactive, *akazi* ‘women’, can be acceptably represented by an OM.

- (5) a. Kapenu a-ndza-wa-gas-ir-a moto.
 Kapenu 1SM-FUT-2OM-start.fire-APPL-FV 3fire
 ‘Kapenu will start fire for them (women).’

⁴Following a Minimalist approach to generative grammar (Chomsky 2000; 2001), we assume the well-established hierarchy of arguments where subjects are structurally higher than recipients and recipients are higher than themes: see, for example, Baker (1997).

- b. #Kapenu a-ndza-(wu)-gas-ir-a a-kazi.
 Kapenu 1SM-FUT-3OM-start.fire-APPL-FV 2-women
 ‘Kapenu will start it (fire) for the women.’

In a context where both objects are discourse-given, null object drop of the lower object is natural. In (6), the structurally lower theme, *moto* ‘fire’, is omitted altogether (whereas *akazi* ‘women’ is represented by an OM).

- (6) A: Semo a-mba-gas-ir-a a-kazi moto ntsiku zentse.
 Semo 1SM-HAB-start.fire-APPL-FV 2-women 3.fire every day
 ‘Semo starts fire for the women every day.’
 B: Neye, Kapenu a-ku-(wa)-gas-ir-a lero.
 no Kapenu 1SM-PRS-2OM-start.fire-APPL-FV today
 Approximately: ‘No, Kapenu is starting it for them today.’

2.1.2 Non-doubling OMs: focused contexts

While OMing the structurally lower object is unnatural in pragmatically neutral contexts, it becomes entirely acceptable in certain focus contexts. In (7), the Q&A context places focus on the benefactive object *akazi* ‘women’. Though previously unnatural in (5b), in this context with the benefactive focused, it is acceptable to OM the theme *moto* ‘fire’.

- (7) Q&A congruence: focus in bold
 Q: Kapenu a-ndza-gas-ir-a **yani** moto?
 1Kapenu 1SM-FUT-start.fire-APPL-FV 1who 3fire
 ‘Who will Kapenu start fire for?’
 A: Kapenu a-ndza-(wu)-gas-ir-a **a-kazi**.
 1Kapenu 1SM-FUT-3OM-start.fire-APPL-FV 2-women
 ‘Kapenu will start it (fire) for **THE WOMEN**.’

2.2 OM-doubling generates emphatic interpretations

In OM-doubling constructions, emphatic interpretations are always generated, though the exact interpretation differs depending on the position of the DP object (and as we mention in §6.2, which kind of emphatic interpretation occurs appears to have complex interactions with syntactic structure). Example (8) below demonstrates OM-doubling. Here, the low temporal adverb *dzulo* ‘yesterday’

is used to mark the edge of the verb phrase.⁵ (8a) shows the canonical word order, with low adverbs following objects within the verb phrase (S V O Adv). When the object is doubled, however, we see the object naturally moving to the right of the low adverb, presumably out of vP.⁶ In this doubling construction—shown in (8c)—focus/emphasis naturally falls on the material to the left of the object; here, on *dzulo*.

A different emphatic interpretation arises, however, when the object is doubled and remains in its usual linear position. As shown in (8b), this results in (what we will refer to as) a verum-like reading, which we are currently translating with the English adverbial *really/certainly* (in these instances, the emphasis doesn't appear to apply to any particular vP constituent more or less than any other).

(8) Temporal adverb

- a. Baba a-da-phik-a ci-mbamba dzulo.
 1father 1SM-PST-cook-FV 7-beans yesterday
 'Father cooked the beans yesterday.'
- b. Baba a-da-(ci-) phik-a (ci-mbamba) dzulo.
 1father 1SM-PST-7OM-cook-FV 7-beans yesterday
 *'Father cooked the beans yesterday.'
 OK as 'Father really/certainly COOKED THE BEANS YESTERDAY.'
- c. Baba a-da-(ci-) phik-a dzulo , (ci-mbamba) .
 1father 1SM-PST-7OM-cook-FV yesterday 7-beans
 'Father cooked the beans YESTERDAY.'

We see the same patterns arising in sentences with manner adverbs: a doubled object very naturally moves to the right edge, which places focus on the manner adverb. Natural contexts for this construction are included here in (9).

⁵A reviewer notes that a low position of temporal adverbials is not universally assumed: we assume that temporal adverbs have a structurally low position; see Ernst 2014; 2020 on the syntax of adverbs, who argues that “[t]ime-related adverbials are free to adjoin anywhere after the core eventuality has been constituted,” (Ernst 2020: 95). Additionally, Sikuku & Diercks (2021) show that temporal adverbs group with other low adverbials in Lubukusu for a number of grammatical purposes.

⁶This kind of right-dislocation is a well-documented property of object marking in some Bantu languages, e.g., Chichewa (Bresnan & Mchombo 1987), Zulu (Zeller 2012; 2015), Haya (see Riedel 2009 for an overview), Ikalanga (Letsholo 2013; Colantes & Letsholo 2022), and Tswana (Creissels 1996), to name a few.

(9) Doubling + movement = Focus on manner adverb

Baba a-da-(ci-) phik-a **bwino**, (ci-mbamba).
 1father 1SM-PST-7OM-cook-FV well 7-beans

‘Father cooked the beans WELL.’

Natural contexts include:

- *answers to manner questions*
- *corrections about manner*

And as seen before, OM-doubling with the object *in situ* creates a verum-like reading of the sentence that does not differentiate emphasis on sub-constituents of vP.

(10) *in situ* OM-doubling = Predicate focus

Baba a-da-(ci-) phik-a (ci-mbamba) **bwino**.
 1father 1SM-PST-7OM-cook-FV 7-beans well

‘Father really/certainly cooked the beans well.’

Natural contexts include:

- *disagreements about whether this event happened*
- *clarification of a previous assertion*

This verum-like focus reading is strongly reminiscent of Lubukusu OM-doubling contexts, where OM-doubling is linked with an emphatic interpretation of the sentence. [Sikuku et al. \(2018\)](#) analyzed this reading as verum, readily translated with English emphatic *do*.

(11) OM-doubling in Lubukusu ([Sikuku et al. 2018](#): 366):

a. N-a-bon-a baa-soomi.
 1SG.SM-REM.PST-see-FV 2.2-students

‘I saw the students.’

b. *Context: I told you that I saw the students, but you doubt me, saying that you don’t believe that I did. I can respond:*

N-á-(ba-) bon-a (baa-soomi).
 1SG.SM-REM.PST-2OM-see-FV 2.2-students

‘I DID see the students!’

As discussed by [Sikuku et al. \(2018\)](#) as well as a range of relevant literature (e.g. [Gutzmann & Castroviejo Miró 2011](#); [Hartmann & Zimmermann 2007](#); [Gutzmann et al. 2020](#), among others), verum readings of sentences (like English emphatic *do*) have properties that are distinct from focus. Instead, verum readings seem to be linked with conversational meaning and ought to be analyzed as a use-conditional item that introduces a separate dimension of meaning, similar to conventional implicatures ([Potts 2005](#)); we discuss this in more depth below.

3 Relevant case study: Zulu OMing

Object marking in Zulu bears a number of relevant similarities to Cinyungwe, as well as several notable differences. In this section, we summarize relevant research on Zulu OMing to lay a foundation for further discussion of Cinyungwe data and analysis. There is a long history of research on Zulu object marking; here, we are relying mainly on recent research from [Zeller \(2012; 2014; 2015\)](#) for our brief recounting of the Zulu facts.⁷

First, similar to Cinyungwe, Zulu only allows a single object marker on the verb form: attempts to pronominalize both objects of a ditransitive via OMs on the verb are unacceptable, as (12) shows.

- (12) Zulu ([Zeller 2012: 220](#))
- a. U-John u-nik-e a-ba-ntwana i-zi-ncwadi.
 AUG-1a.John 1SM-give-PST AUG-2-child AUG-10-book
 ‘John gave books to the children.’
 - b. *U-John u-(ba-) (zi-) nik-il-e.
 AUG-1a.John 1SM-2OM-10OM-give-DJ-PST
 - c. *U-John u-(zi-) (ba-) nik-il-e.
 AUG-1a.John 1SM-10OM-2OM-give-DJ-PST

To pronominalize both objects of a ditransitive, one pronominalization must be represented as an OM morpheme on the verb, while the other must be represented via a free pronoun. But, while Zulu only allows one OM on the verb, the grammar doesn’t restrict *which* object may be represented as an OM (illustrated below in (13)).

⁷Among others, see [Adams \(2010\)](#), [Buell \(2005; 2006\)](#), [Cheng & Downing \(2009\)](#), [Halpert \(2012\)](#), [Van der Spuy \(1993\)](#), [Zeller \(2012; 2014; 2015\)](#).

- (13) Zulu (Zeller 2012: 220)
- a. U-John u-(ba-) nik-e zona.
 AUG-1a.John 1SM-2OM-give-PST 10PRON
 ‘John gave them to them.’
- b. U-John u-(zi-) nik-e bona.
 AUG-1a.John 1SM-10OM-give-PST 2PRON
 ‘John gave them to them.’

Zulu’s acceptance of having either object represented via an OM is known as object “symmetry” in the literature on Bantu languages (Bresnan & Moshi 1990 and many others). While some languages are asymmetrical and may only allow a particular (primary) object to carry properties such as verbal OMing, Zulu allows either object to be OMed on the verb. This so-called symmetry plays a major role in Zeller’s (2012; 2014) analysis.

Further, OM-doubling is possible in Zulu. As Zeller describes, the long history of work on this issue in Zulu shows that these OM-doubled objects are right-dislocated, moving out of the verb phrase. This is evident in (14), where the OM-doubled object (obligatorily) moves to the right of the manner adverb as in (14d), being unacceptable to leave *in situ* (14b).

- (14) Zulu (Zeller 2015: 20)
- a. Si-bon-a i-n-kosi kahle.
 1SG.SM-see-FV AUG-9-chief well
 ‘We are seeing the chief well.’
- b. *Si-(yi-) bon-a (i-n-kosi) kahle.
 1SG.SM-9OM-see-FV AUG-9-chief well
- c. *Si-bon-a kahle i-n-kosi.
 1SG.SM-see-FV well AUG-9-chief
- d. Si-(yi-) -bon-a kahle (i-n-kosi) .
 1SG.SM-9OM-see-FV well AUG-9-chief
 ‘We are seeing him well, the chief.’

An important piece of data here is (14c), which shows that right-dislocation of the object is unacceptable without the OM; Cinyungwe contrasts with this pattern, as we will show below in (19).⁸

⁸There are a range of additional relevant diagnostics arguing for this conclusion, including conjoint/disjunct distinctions and distribution of focused elements, among other things.

(15) shows the structure of this right-dislocation, which sees OM-doubling necessarily linked with movement of the OMed object to the right edge of ν P.

- (15) Structure of (14d) (Zeller 2015: 20)
 . . . siyibona kahle] $_{\nu P}$. . . inkosi

This right-dislocation analysis is supported by the fact that, in Zulu, it is well-documented that ν P is a focal domain:⁹ focused items must occur in ν P, while non-focused items cannot be in ν P. This is illustrated with a *wh*-subject construction in (16). (16a) shows that preverbal *wh*-subjects are unacceptable; instead, *wh*-subjects appear postverbally as in (16b):

- (16) a. *U-bani u-sebenz-ile?
 AUG-1a.who 1SM-work-PST
 b. Ku-sebenz-e bani?
 17.EXPL-work-PST 1a.who
 ‘Who worked?’
 (Zeller 2015: 20)

Additionally, elements focused with *kuphela* ‘only’ cannot be OM-doubled.

- (17) a. Ngi-bon-e u-Sipho kuphela] $_{\nu P}$.
 1SM-see-PST AUG-1a.Sipho only
 ‘I saw only Sipho.’
 b. *Ngi-(m)-bon-ile] $_{\nu P}$ u-Sipho kuphela .
 1SM-1OM-see-PST AUG-1a.Sipho only
 (Buell 2008: (6))

These facts led Zeller (2015) to argue for an analysis in which object markers arise via an agreement relation with a functional head on the edge of ν P, which triggers movement of the relevant object to a right-facing specifier of the functional projection. Figure 1 sketches this analysis.

⁹See, among others, Sabel & Zeller (2006), Cheng & Downing (2009), Cheng & Downing (2012), and Halpert (2016).

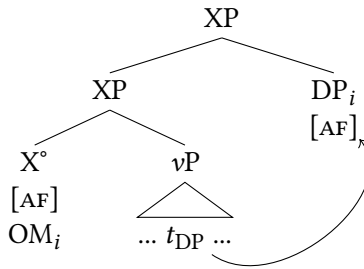


Figure 1: Zeller’s analysis of Zulu object marking (based on Zeller 2015: (65))
 [AF] = anti-focus

The analysis laid out in Figure 1 accounts for the fact that, in Zulu, OMing is “symmetrical” (i.e., either object of a ditransitive can be OMed). On Zeller’s account, the probe that generates OMing is an anti-focus (AF) probe. The [AF] probe doesn’t necessarily find the closest DP; instead, the anti-focus probe seeks the closest anti-focus-marked DP, which may in fact be the structurally lower object in a ditransitive.

4 Cinyungwe: dissociations between movement and OMing

Cinyungwe shares many similarities with Zulu, as we will continue to outline as the discussion proceeds, but the object marking patterns in Cinyungwe and Zulu are not identical. A central distinction regards the (dis)association of movement with object marking. In Zulu, rightward movement is necessarily linked with object marking, such that attempted right-dislocation without OMing is unacceptable, as shown above in (14c). In Cinyungwe, on the other hand, OM-doubling and right-dislocation are not necessarily linked. OM-doubling of right-dislocated objects is quite natural and at times is preferred (depending on the discourse context), but right-dislocation occurs independently of OM-doubling, and OM-doubling occurs independently of movement of objects. This will play an important role in our analysis.

4.1 Rightward movement of objects for focus-background purposes

In non-doubling contexts, objects may be *in situ* or moved to the right edge of the sentence. (18) is an example with no movement and no object marking, which

simply retains canonical word order, a pragmatically neutral sentence.

- (18) Baba a-da-phik-a ci-mbamba mwakankulumize.
 1father 1SM-PST-cook-FV 7-beans quickly
 ‘Father cooked the beans quickly.’

The sentence in (19) differs minimally: again there is no object marking, but the object is moved to the right of the manner adverb, and there is a prosodic break between the manner adverb and the object.

- (19) Baba a-da-phik-a mwakankulumize , ci-mbamba.
 1father 1SM-PST-cook-FV quickly 7-beans
 ‘Father cooked the beans QUICKLY.’

There is an interpretive distinction between (18) and (19); whereas (18) is pragmatically neutral, in (19) attention is being brought to the manner of cooking; there is a sense that what is being talked about is the manner of cooking. The interpretive shift appears to be more of a ‘lightweight’ focus: it doesn’t create a strong sense of emphasis, but instead a redirection of the addressee’s attention onto the remaining *vP*-internal elements. Currently we are thinking of this as an interpretive distinction between discourse-given material (moved to the right edge) and focused material (remaining in *vP*).¹⁰ There is a long history in the literature documenting this pattern, and this analysis bears a lot of similarity to Zeller’s analysis of Zulu OMinG (though here, again, we are not yet discussing OMinG in Cinyungwe, only rightward movement of objects).

This is somewhat similar to the Zulu restrictions on focused *vP* content above, but there are crucial differences. Namely, whereas *vP* is always a designated focus domain in Zulu, in Cinyungwe, these effects only seem to arise in instances of right-dislocation or OMinG, and they don’t introduce the same restrictions on focused content outside *vP*. This is illustrated in (20), showing that *wh*-subjects in Cinyungwe are not restricted to postverbal, *vP*-internal positions (whether or not there is OM-doubling).

¹⁰Based on the data we have provided so far, another potential analysis could be that focused material moves left to a position immediately after the verb (as opposed to the rightward movement of given material). This possibility is ruled out by benefactive applicative constructions (whose standard word order is S V IO DO) where the recipient follows both the theme and a manner adverb; see (29b). Cheng & Downing (2012) arrive at the same conclusion for Zulu.

- (20) Mbani a-da-(ci-) phik-a (ci-mbamba) mwakankulumize?
 1who 1SM-PST-(7OM)-cook-FV 7-beans quickly
 ‘Who (really/certainly) cooked beans quickly?’

This contrasts with Zulu, where focused subjects cannot occur preverbally, as shown above in (16). Therefore, while movement of objects is linked with focal effects in Cinyungwe, this movement still does not create the same kind of focus restrictions that occur in Zulu.

Kratzer & Selkirk (2020) suggest that discourse-given material is marked syntactically by a [G] feature. Let us assume that a functional projection at the edge of vP can bear a [G] probe, which attracts presupposed/given material to its edge and marks its complement as non-presupposed, that is, focused. Sikuku & Diercks (2021) propose a projection that performs these focus/givenness functions for Lubukusu, which bears a focus operator (Rooth’s 1992 \sim (squiggle) operator). Per standard assumptions, the \sim (squiggle) operator presupposes the presence of a focused element in its complement (Rooth 1992; Büring 2016; Kratzer & Selkirk 2020). Given the distinct properties of this head from heads generally referred to as “Focus Phrases” (which attract focused elements to their specifier) we avoid a FocP label. Instead we adopt the label “Comment Phrase,” as proposed for a parallel projection by Sikuku & Diercks (2021), borrowing from the terminological tradition of “topic-comment” distinctions for such information structure dynamics.

This is illustrated in Figure 2, where a Comment Phrase (ComP) is headed by a Com head (Com°), which bears a [G] probe, which probes its c-command domain for a [G]-marked phrase.

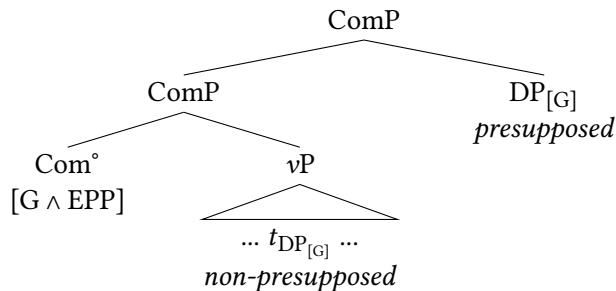


Figure 2: Schematic tree of Cinyungwe movement for givenness

This creates a focus-background structure in the sense of backgrounding (presupposing) some information and drawing attention to other information.

Critically, this focus-background structure lacks the additional emphasis that is introduced by OM-doubling, which we describe below.

These information structure effects are evident in multiple ways. First, as we might expect, object movement constructions are unnatural in out-of-the-blue contexts:

- (21) *Scenario: A Cinyungwe-speaking newscaster gets on the radio as part of a news report.*
- a. Baba a-da-phik-a ci-mbamba mwakankulumize.
 1father 1SM-PST-cook-FV 7-beans quickly
 ‘Father cooked the beans quickly.’
- b. #Baba a-da-phik-a mwakankulumize , ci-mbamba.
 1father 1SM-PST-cook-FV quickly 7-beans
 ‘Father cooked the beans QUICKLY.’

In this context, (21b) sounds as if the speaker is calling the attention of the audience to *mwakankulumize* ‘quickly,’ but in an out-of-the-blue context, this sounds unnatural. Instead, it feels as if this should be part of a conversation in which the cooking of beans was already under discussion: it is not possible to walk up to someone out of nowhere and say (21b).

Another prediction of this account is that phrases that resist interpretations as discourse-given should be unable to undergo rightward movement. Negative polarity items (NPIs) are one such sort of phrase: being inherently non-referential, they cannot refer to a discourse-familiar referent. As (22) below shows, it is illicit to move an NPI object to the right. This is precisely what is predicted if this is a movement driven by a [G] feature.

- (22) a. Kapenu a-libe ku-won-a na-mu-nthu-yo dzulo.
 1Kapenu 1SM.PST-NEG 15SM-see-FV NPI-1-person-NPI yesterday
 ‘Kapenu didn’t see anyone at all yesterday.’
- b. *?Kapenu a-libe ku-won-a dzulo , na-mu-nthu-yo.
 1Kapenu 1SM.PST-NEG 15SM-see-FV yesterday NPI-1-person-NPI
 Intended: ‘Kapenu didn’t see anyone at all YESTERDAY.’

4.2 OM-doubling for emphasis

We now move our attention to OM-doubling. As noted above, movement (of objects) is dissociated from object marking. That means that both movement

and non-movement constructions are available without OM-doubling. Here, we see that OM-doubling constructions are possible with both movement and non-movement of the OM-doubled object, though with interpretive distinctions that offer insight into the analysis of both constructions. In an OM-doubling construction, if the doubled object has been moved to the right, focus falls on the material remaining in the verb phrase to the left of the moved object. In (23) this results in focus on the manner adverb.

- (23) Baba a-da-(ci-) phik-a mwakankulumize, (ci-mbamba).
 1father 1SM-PST-7OM-cook-FV quickly 7-beans
 ‘Father cooked the beans QUICKLY.’

- *Acceptable in manner focus contexts, such as:*
 - *an answer to a manner question*
 - *a clarification about the manner in which beans were cooked*

As noted in the comments below (23), this construction is acceptable in contexts where the manner adverb is focused.

In the absence of movement of the doubled object, undifferentiated emphasis falls on the entire predicate, yielding a verum-like reading of the sentence. This is illustrated in (24).

- (24) Baba a-da-(ci-) phik-a (ci-mbamba) mwakankulumize.
 1father 1SM-PST-7OM-cook-FV 7-beans quickly
 ‘Father really/certainly COOKED THE BEANS QUICKLY.’

- *Acceptable in contexts where the entire predicate is focused, such as:*
 - *there is a disagreement about whether the event occurred*
 - *the speaker wants to emphasize that this is in fact what happened*
- *Unacceptable in the manner-focus contexts noted above for (23)*

As noted below the translation, (24) is unacceptable in the manner focus contexts from (23). Instead, a construction like (24) is only possible in something like predicate focus contexts or verum focus contexts.

It can be quite tricky to disentangle these interpretive effects, and while this work is still underway we do have some initial evidence showing how the emphatic use of OM-doubling occurs in different positions from the focus effects of object movement. (25) gives a mini-discourse, where the initial assertion from Person A in (25A1) is in the discourse-neutral word order. When Person B replies to correct their assertion, contrastive focus is placed on the corrected

phrase (the theme object) by moving the discourse-familiar recipient object to the right. If Person A insists on their first assertion as in (25A2), however, Person B may then restate their correction, this time felicitously using OM-doubling in (25B2).

- (25) A1: Kapenu a-gul-ir-a mayi ci-manga.
 1Kapenu 1SM.PST-buy-APPL-FV 1mother 7-maize
 ‘Kapenu bought mother maize.’
- B1: Neye, Kapenu a-(#mu)-gul-ir-a **ma-figu** , mayi.
 no 1Kapenu 1SM.PST-(#1OM)-buy-APPL-FV 6-bananas 1mother
 ‘No, Kapenu bought mother BANANAS.’
- A2: Neye, Kapenu a-gu-lir-a **ci-manga** , mayi.
 no 1Kapenu 1SM.PST-buy-APPL-FV 7-maize 1mother
 ‘No, Kapenu bought mother MAIZE.’
- B2: Neye, Kapenu a-(mu)-gul-ir-a **ma-figu** , (mayi).
 no 1Kapenu 1SM.PST-1OM-buy-APPL-FV 6-bananas 1mother
 ‘No, Kapenu really did buy mother BANANAS!’

The interpretation of (25B2) is that Person B is making a move to end the conversation, to offer the definitive statement on an issue that is currently under debate. For this reason, OM-doubling is infelicitous in (25B1): doubling at that stage of the discussion is simply too aggressive, as a mere disagreement about facts does not merit the kind of emphasis that OM-doubling generates. But note that in each of (25B1), (25A2), and (25B2) there is object movement, with contrastive focus placed on the unmoved object that is now positioned immediately after the verb. This affirms the analysis of object movement as linked with givenness and focus (like in Zulu) but also affirms OM-doubling in Cinyungwe as grammatically and interpretively distinct from object movement and givenness/focus alone.

This interpretation is very similar to an interpretation generated by OM-doubling in Lubukusu, as illustrated above in (11b) and as described/analyzed by Sikuku et al. (2018). Sikuku et al. argue that OM-doubling is generated by an Agree relation initiated by a φ -probe on a functional projection that introduces a verum operator to the syntax: they refer to that projection as an Emphasis head (Emph°). If we assume that Emph° occurs in Cinyungwe, bears a φ -probe, and can also introduce a verum operator, we can explain a large range of the OM facts that we have encountered.

Therefore, we propose that OMs arise via an Agree relation generated by a φ -probe on Emph° , a projection that sits atop vP (or Comp , when it is present).

This is illustrated in Figure 3. We assume this Emph° projection introduces a use-conditional operator in the sense of Gutzmann & Castroviejo Miró (2011) and Sikuku et al. (2018). This operator contributes a meaning that is related not to a sentence’s truth conditions but to the conditions under which it can be felicitously used. Specifically, to create a verum-like interpretation of the clause, the operator communicates the speaker’s desire to remove a particular question from the Question Under Discussion (a set of unresolved questions relevant to the conversation)—in other words, the speaker’s desire to settle an issue that is being discussed. (We leave the details for future research, as there are complexities we are still investigating; see §6.2).

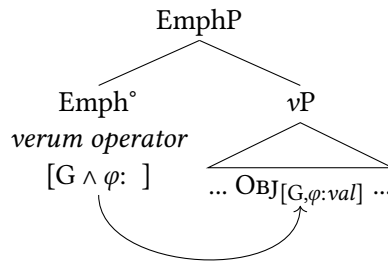


Figure 3: Structure of OM-doubling in Cinyungwe

You will notice the presence of a givenness feature ([G]) as part of the features of the probe on Emph° in Figure 3, requiring that the Goal be a G-marked element (the detailed mechanics of the Agree mechanism are important, but we leave the structure of the probe somewhat underspecified here for the purposes of an initial description/analysis). In Cinyungwe, OM-doubled objects are obligatorily familiar/specific. This is evidenced in (26); the bare noun *munthu* ‘person’ can be naturally used in negative contexts to mean ‘anyone,’ as in (26a). When the same construction contains OM-doubling in (26b), however, the object must receive a specific interpretation (‘a particular person’).

(26) OM-doubled objects are specific

- a. Kapenu a-libe ku-won-a mu-nthu dzulo.
 1Kapenu 1SM.PST-NEG 15SM-see-FV 1-person yesterday
 ‘Kapenu didn’t see anyone yesterday.’
- b. Kapenu a-libe ku-(mu-) won-a (mu-nthu) dzulo.
 1Kapenu 1SM.PST-NEG 15SM-1OM-see-FV 1-person yesterday
 ‘Kapenu really/certainly didn’t see a particular person yesterday’
 NOT: ‘Kapenu really/certainly didn’t see anyone yesterday.’

In addition to the bare nominal in an NPI-like usage, Cinyungwe allows *munthu* to be more explicitly constructed as an NPI with the additional morphology “*na-yo*”: *namunthuyo* ‘anyone at all.’ This strict NPI object cannot be OM-doubled.

- (27) Kapenu a-libe ku-(^{*}?mu-) -won-a na-mu-nthu-yo dzulo.
 1Kapenu 1SM.PST-NEG 15SM-(^{*}?1OM)-see-FV NPI-1-person-NPI yesterday
 ‘Kapenu (^{*}?really/certainly) didn’t see anyone at all.’

This is consistent with the finding above in (22) that the NPI *namunthuyo* ‘anyone at all’ is incompatible with givenness-driven movement to the right edge of ComP.

Both of these pieces of evidence (obligatory specific readings and restrictions on NPIs) suggest that OM-doubled objects are obligatorily interpreted as discourse-given, i.e., specific and identifiable in context.

5 Summarizing the analysis

5.1 Mechanics of current working hypothesis

Putting together the components of the analysis that we’ve discussed above, OM-doubling is generated by a φ -probe, which is located on a functional head at the edge of the verb phrase domain (Emphasis°). The φ -probe on Emph° requires its Goal to be discourse-given, which we have informally represented with a G feature conjoined with the φ -probe. This is represented in Figure 4. We assume that ComP may be absent, in which case there is no information structure bifurcation within the predicate. The emphasis that is introduced in these instances therefore is interpreted in an undifferentiated manner on the predicate.

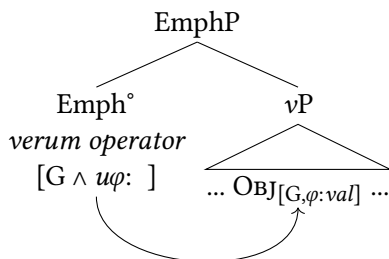


Figure 4: OM-doubling: verum reading when the predicate bears no information structure bifurcation

The properties of ComP may readily interact with the probe on Emph°, however. On the account we’ve developed, right-dislocation to the edge of Com° (movement for givenness) feeds OM-doubling. When the G probe on Com° triggers movement, any discourse-given element may move to the edge of ComP (and the squiggle operator on Com° presupposes that its complement, ν P, is focused). From that position, a dislocated object DP will necessarily be the target of Agree by the φ -probe on Emph°, which sits atop ComP (when ComP is present).

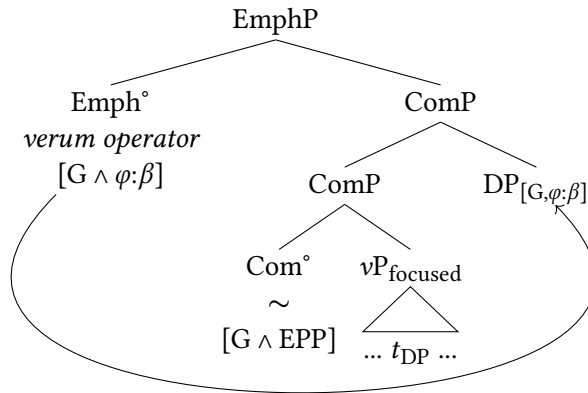


Figure 5: OM-doubling with object movement: focus on ν P

5.2 Testing analytical predictions

This account makes several key predictions, which we test here.

5.2.1 Asymmetry in predicate focus

First, for undifferentiated verum emphasis on the predicate (which we are translating as ‘really/certainly’), we predict that only the highest object can be OM-doubled. This is because “symmetrical” object marking of lower objects is fed by the (low) right-dislocation of presupposed objects, which creates an information structure bifurcation amongst the ν P content. This is confirmed in (28): when putting emphatic focus on the entire predicate, OM-doubling is only natural on the higher object.

- (28) a. Kapenu a-ndza-wa- gas-ir-a a-kazi moto
 1Kapenu 1SM-FUT-2OM-start.fire-APPL-FV 2-women 3fire
mwakankulumize.
 quickly
 ‘Kapenu will really/certainly start the fire for the women quickly.’
- b. *?Kapenu a-ndza-wu- gas-ir-a a-kazi moto
 1Kapenu 1SM-FUT-3OM-start.fire-APPL-FV 2-women 3fire
mwakankulumize.
 quickly
 Intended: ‘Kapenu will really/certainly start the fire for the women quickly.’

5.2.2 Dislocated (presupposed) objects intervene in OM-doubling

Second, we predict that only particular sorts of interactions are possible between movement and OM-doubling. (29) demonstrates what we’ve seen throughout: OM-doubling of a right-dislocated object is very natural.

- (29) a. Kapenu a-ndza-gas-ir-a a-kazi moto
 1Kapenu SM-FUT-start.fire-APPL-FV 2-women 3fire
mwakankulumize.
 quickly
 ‘Kapenu will start the fire for the women quickly.’
- b. Kapenu a-ndza-wa- gas-ir-a moto **mwakankulumize** ,
 1Kapenu 1SM-FUT-2OM-start.fire-APPL-FV 3fire quickly
a-kazi .
 2-women
 ‘Kapenu will start the fire for the women quickly.’
- c. Kapenu a-ndza-wu- gas-ir-a a-kazi
 1Kapenu 1SM-FUT-3OM-start.fire-APPL-FV 2-women
mwakankulumize , moto .
 quickly 3fire
 ‘Kapenu will start the fire for the women quickly.’

As we mentioned above, our analysis is that right-dislocation of discourse-given objects to the edge of ComP feeds OM-doubling by moving a Goal object into a (more) local relationship with the φ -probe on Com°. This suggests that the OM

probe should be unable to target ν P-internal material when an object is right-dislocated.

The prediction is upheld: it is quite unnatural to OM-double a non-presupposed (*in situ*) object when another object has been moved to the right edge as a presupposed object. In the context of a right-dislocated recipient, OM-doubling the *in situ* theme is unacceptable (30a). And the converse in (30b) is also unacceptable: right-dislocation of the theme disrupts OM-doubling of the *in situ* recipient.

- (30) a. *?Kapenu a-ndza-wu- gas-ir-a moto mwakankulumize
 1Kapenu 1SM-FUT-3OM-start.fire-APPL-FV 3fire quickly
 , a-kazi.
 2-women
 ‘Kapenu will start the fire for the women quickly.’
- b. *?Kapenu a-ndza-wa- gas-ir-a a-kazi
 1Kapenu 1SM-FUT-2OM-start.fire-APPL-FV 2-women
 mwakankulumize , moto.
 quickly 3fire
 ‘Kapenu will start the fire for the women quickly.’

This follows from our analysis: dislocated objects are structurally closest to the φ -probe on Emph° ; therefore, if an object is right-dislocated to the edge of ComP it will intervene in an Agree relation between the φ -probe on Emph° and a ν P-internal object.

5.3 Non-doubling OMs

As we have established, OM-doubling is possible both with and without object movement, but it requires particular pragmatic contexts and results in verum-like emphatic interpretations. These contexts are not necessary in constructions with non-doubling OMs such as (31) (i.e., constructions with an object marker but without the object it refers to), nor are non-doubling constructions associated with verum interpretations.

- (31) Ine nda-tsuk-a ci-mbamba ndipo baba a-da-ci- phik-a.
 I 1SG.SM.PST-wash-FV 7-beans and 1father 1SM-PST-7OM-cook-FV
 ‘I washed the beans, and then father cooked them.’

We assume that non-doubling OMs are incorporated pronouns and are not generated by agreement with Emph° , following the same proposal by [Sikuku et al. \(2018\)](#) and [Sikuku & Diercks \(2021\)](#) for Lubukusu.¹¹

6 Conclusions

6.1 Summary of findings

We have seen above that object marking is linked with focal/emphatic effects in the verb phrase (νP). Whether the emphasis is associated with undifferentiated information structure within the predicate or interpreted in concert with a more narrow focus on a particular constituent depends on whether backgrounded/discourse-given constituents have moved out of the verb phrase ([Cheng & Downing 2012](#)).

There are clear empirical differences (both in interpretation and grammatical mechanisms) between the marking of focus/giveness and the marking of verum emphasis. Movement out of the νP to the right edge distinguishes presupposed/backgrounded postverbal content (moved) from non-presupposed content (remaining in νP). This redirects addressee attention in a focus-background structure, but is not emphatic in the same way that OM-doubling is. OM-doubling creates an emphatic interpretation that appears to be closely associated with verum emphasis in many instances, though object-marked objects must nonetheless be discourse-familiar/specific.

On our account, movement to the right edge is driven by [G] features on a functional head at the edge of νP (ComP). OM-doubling is generated by φ -features on a head at the edge of the $\nu\text{P}/\text{ComP}$ (which we refer to as Emph°). Crucially, Com° bears a focus operator, presupposing that its complement is focused. Emph° also bears a semantic/pragmatic operator that (at least) introduces a meaning similar to verum, a discourse move to end conversation on an issue. That said, as we note below in §6.2, in Cinyungwe (as in Lubukusu) OM-doubling can be linked with other kinds of meanings that are also reasonably analyzed as use-conditional meanings, which suggests that the properties of Emph° in Cinyungwe need further investigation.

¹¹There appear to be some distinctions between Cinyungwe and Lubukusu concerning non-doubling OMs and focus in the clause, as it's not clear that Lubukusu has the same focal requirements. We leave this as an issue for future research, but it could be explained if ComP is optional in Lubukusu but obligatory in Cinyungwe.

6.2 Issues for future research

In this section we note several relevant facts that require additional research.

6.2.1 OM-doubling linked with mirative contexts

Despite the proposed link between verum emphasis and OM-doubling in Lubukusu by [Sikuku et al. \(2018\)](#), more recent ongoing research has shown that OM-doubling in Lubukusu is linked with a broader range of licensing contexts than simply verum ([Sikuku & Diercks 2021](#)). [Sikuku & Diercks \(2021\)](#) argue that Lubukusu OM-doubling is also linked with mirative focus contexts, where the focused element is being emphasized with a mirative conventional implicature marking that it is a particularly unlikely proposition. (32) is drawn from [Sikuku & Diercks \(2021\)](#).

- (32) *Context: In Lubukusu culture, a young man should not marry a widow. If this is to happen, it is considered highly scandalous. In the situation being considered, a father has gone away for some time, and returns only to have his wife inform him that their 19-year-old son Wafula has married an older widow. In this instance, the wife can report to her husband:*

Wafula a-(mu-) bey-a (namulekhwa) !
1Wafula 1SM-1OM-marry-FV 1widow

‘Wafula married a widow!’

We see a similar effect in Cinyungwe, as illustrated by (33):

- (33) *Context: As you know, my father doesn’t know how to cook beans. When we left school I ran home to cook, but do you know what!? I found out that he had really cooked them nicely!*

Baba a-da-(ci-) phik-a (ci-mbamba) !
1father 1SM-PST-7OM-cook-FV 7-beans

‘Father actually cooked the beans!’

It’s not clear (either in Lubukusu or for Cinyungwe) whether these kinds of contexts are analytically linked with the verum-like readings that arise naturally in disagreements/debates and in confirmation/correction contexts. For the first author here, they feel intuitively similar, but future research is necessary to determine if they occur in different contexts (discourse contexts or grammatical

contexts). In ongoing work, we are focusing on the range of emphatic interpretations associated with OM-doubling in Lubukusu, Cinyungwe, and other Bantu languages (Lippard et al. 2021).

6.2.2 Exceptional instances of obligatory OMs

While in most instances OM-doubling is not grammatically obligatory, we have found one instance where it appears to be, which we have yet to understand or explain. In general, it appears that Oming an extracted object in a relative clause or a cleft is grammatical but optional; we have not yet identified instances where it is ungrammatical. But there are certain predicates where OMs are obligatory in object relative clauses. For other predicates, the OM is optional. As shown in (34), the verb *-wona* ‘see’ requires an OM in a relative clause, but for the verb *-werenga* ‘read,’ the OM is optional.¹²

- (34) a. livu lomwe ni-da-*(li)-won-a
 5.book 5.that 1SG-PST-*(5OM)-see-FV
 ‘the book that I saw’
 b. livu lomwe nda-(li)-wereng-a
 5.book 5.that 1SG.PST-(5OM)-read-FV
 ‘the book that I read’

In a similar fashion, we have found that recipient objects are obligatorily OM-doubled when extracted, but we have not found this to be true for any other kind of object.

- (35) a. Wa-na omwe u-ndza-*(wa)-pas-a ma-livu
 2-children 2.that 2SG-DIST.FUT-*(2OM)-give-FV 6-book
 a-fik-a.
 6SM.PST-arrive-FV
 ‘the children that you will give the books to arrived’

¹²An anonymous reviewer suggests that this pattern may be related to incremental theme verbs (i.e., perhaps OMs are required in relative clauses with verbs whose objects are required and optional with verbs whose objects are optional). While such an analysis would be consistent with the data in (34), it does not explain the full range of predicates for which Oming in relative clauses is optional. For example, *-gula* ‘buy’ is not an incremental theme verb and does not require an OM in a relative clause.

The reviewer also suggests that perhaps some verbs or verb classes might subcategorize specifically for OMs; the issue requires further research. A similar situation occurs with Kiluguru, as the verb *-ona* ‘see’ requires an OM (Marten & Ramadhani 2001). However, this requirement is not restricted to relative clauses as in Cinyungwe.

- b. Ma-livu yomwe u-ndza-(ma)-pas-a wa-na
6-book 6.that 2SG-DIST.FUT-6OM-give-FV 2-children
a-fik-a.
2SM.PST-arrive-FV
'the books that you will give the children arrived'

These are effects we don't yet understand and they require additional research.

6.2.3 OM-doubling and left-dislocation

In this paper we have focused on object marking and its interactions with right-dislocation (of objects), but objects can also appear at the left edge of the sentence in Cinyungwe. This is possible both with and without an OM, as shown in (36), but there are interpretative differences. In (36a), the object *cimbamba* 'beans' appears to be the topic of the sentence; for example, this sentence would be appropriate in a context where someone was looking for (uncooked) beans and the speaker wants to explain what happened to them.

By contrast, (36b) has an emphatic interpretation. This sentence can be used to express the speaker's confidence that it was beans, not something else, that father cooked, or to emphasize how well the beans were cooked. These two available readings may be instances of verum and mirative emphasis, but more work is necessary on left-dislocation and its interactions with OM-doubling in Cinyungwe.

- (36) a. Ci-mbamba , baba a-da-phik-a.
7-beans 1.father 1SM-PST-cook-FV
'The beans, father cooked them.'
- b. (Ci-mbamba) , baba a-da-(ci) phik-a.
7-beans 1.father 1SM-PST-7OM-cook-FV
Approximately: 'The beans, father really cooked them.'
Natural contexts include:
- *disagreement about what father cooked*
 - *the beans were cooked very nicely*

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