

Associated motion as an applicative in Nuer

Tatiana Reid (University of Edinburgh)

Oliver Bond (University of Surrey)

15th Nilo-Saharan Linguistic Colloquium, 4-6 August 2021

AM in Nuer

Cross-linguistically, associated motion (AM) does not usually affect the valence of the verb (Belkadi 2016, Guillaume and Koch 2021); when it does, it is sporadic and lexically restricted (e.g. Payne 2021). Yet in the West Nilotic language Nuer, AM introduces an applied phrase with argument properties.

- (1) $k\acute{a}ak$ $c\grave{e}$ $\eta\grave{\eta}m-d\grave{e}$ **$p\acute{a}at$** ($k\acute{a}ak-\grave{\eta}$)
 hunter.SG PFV.3SG knife.SG-SG.3SG.POSS sharpen.TR.NF farm.SG-LOC
 ‘The hunter sharpened his knife (in the farm).’
- (2) $k\acute{a}ak$ $c\grave{e}$ $\eta\grave{\eta}m-d\grave{e}$ **$p\grave{a}a\grave{a}t$** $k\acute{a}ak-\grave{\eta}$ / $g\grave{a}t$
 hunter.SG PFV.3SG knife.SG-SG.3SG.POS S sharpen.AM.NF farm.SG-LOC / child.SG(NOM)
 ‘The hunter sharpened his knife whilst going to the farm/to the child.’

Outline

Nuer [nus] - Nilo-Saharan, Eastern Sudanic, Nilotic, Western, Dinka-Nuer.

Spoken in South Sudan and Ethiopia. All data for this talk come from Lou Nuer dialect spoken in South Sudan.

Complex morphology expressed primarily by stem alternations.

Mostly monosyllabic, but there is some suffixation.

Roadmap

- AM in Nuer
- AM as an applicative in Nuer
- The phenomenon of AM oblique

Associated motion and directionals

Associated motion is a grammatical category which indicates that a core (lexical) event is associated with a translational motion co-event (Koch 1984, Guillaume 2016, Belkadi 2016, Payne 2021).

Directionals is a grammatical category that indicates the orientation, direction or path which does not necessary indicate motion event (Payne 2021).

According to Payne (2021: 697):

“... a pure directional morpheme would not, in and of itself, communicate motion, and a pure AM morpheme might indicate just the fact of translational motion. However, actual morphemes are rarely so pure and relevant morphemes (or paradigms of morphemes) often conflate motion and direction...”.

Example: Datooga AM markers always combine (preferably) with deictic orientation markers (Kießling & Bruckhaus 2015).

Associated motion and directionals in Nuer

Direction (CP or CF/AMBULATIVE) is hardwired into the AM morphology in Nuer.

- **Centripetal** – motion towards a deictic centre (when deictic centre is not the speaker there is additional layer of meaning – witnessed event).

(4) dèɛŋ cè bóol wòo káak-ḷ
 Deng PFV.3SG Bool push.AM.CP.NF farm.SG-LOC

‘Deng pushed Bool whilst going to the farm (in the direction where the speaker was /the speaker witnessed the event).’

- **Centrifugal/ambulative** – motion away from or not in the direction of a deictic centre (additional layer of meaning – hearsay).

(5) dèɛŋ cè bóol wóaa káak-ḷ
 Deng PFV.3SG Bool push.AM.CF/AMB.NF farm.SG-LOC

‘Deng pushed Bool whilst going to the farm (not in the direction of the deictic centre/a hearsay).’

Associated motion and directionals in Nuer

Whether the AM verb indicates a motion co-event or a direction (without the translational motion) is understood from the semantics of the component parts of the sentence, and the verb in particular.

- With verbs that involve change in location AM indicates direction.

(6) $\text{u}^{\text{h}}\text{n}$ c^{h} $\text{k}\text{e}\text{e}\text{t}$ $\text{g}\bar{\text{o}}\text{on}$ $\text{r}\text{u}^{\text{h}}\text{u}^{\text{h}}\text{p}$
 1SG PFV.1SG stick.SG carry.horizontally.AM.NF forest.SG.LOC
 ‘I carried the stick horizontally to the forest.’

- With non-motion verbs AM indicates a motion co-event.

(7) $\text{d}\text{e}\text{e}\eta$ ce $\text{j}\text{a}\text{a}\eta$ nan $\text{k}\text{a}\text{a}\text{k}-\text{h}$
 Deng PFV.3SG cow.SG drink.milk.under.AM.CF.NF farm.SG-LOC
 ‘Deng drunk the milk from under the cow whilst going to the farm.’

Spatial arguments of associated motion in Nuer

- (8) a. bóol cè dèeη uòo káak-à
 Bol PFV.3SG Deng push.AM.CP.NF farm.SG-LOC
 ‘Bol pushed Deng whilst going to the farm.’
- b. bóol cè dèeη uòo kwáar
 Bol PFV.3SG Deng push.AM.CP.NF king.SG(NOM)
 ‘Bol pushed Deng whilst going to the king.’
- c. bóol cè dèeη uòo rēj
 Bol PFV.3SG Deng push.AM.CP.NF inside(LOC)
 ‘Bol pushed Deng whilst going to the inside.’
- d. bóol cè dèeη uòo é wèné
 Bol PFV.3SG Deng push.AM.CP.NF PREP here
 ‘Bol pushed Deng whilst going towards here.’

Spatial arguments of associated motion in Nuer

There are virtually no restrictions on the use of goal arguments when either a direction or a more localised motion can be envisaged (e.g. 'inside', 'outside').

- (9) bóol cè ʃjóok lùɔɔj rēj
 Bol PFV.3SG dog.SG kill.in.secret.AM.NF inside.LOC
 'Bol killed the dog in secret on the way inside.'

Contexts with goals that might imply longer distances can be restricted by the semantics of the component parts of the sentence.

- (10) #/*bóol cè ʃjóok lùɔɔj kīir
 Bol PFV.3SG dog.SG kill.in.secret.AM.NF river.SG.LOC
 Intended: 'Bol killed the dog in secret on the way to the river.'

AM as a translational motion is likely to have developed out of directionals.

AM as a valence adjusting operation

AM as valence adjusting operation has been attested in Nilotic. Payne (2021) for Maasai (Eastern Nilotic) and Kießling & Bruckhaus (2015) for Datooga (Southern Nilotic) report that AM may decrease syntactic valence of verbs.

In Nuer AM does not decrease valence, instead, AM is **always** a valence increasing operation.

AM as valence increasing operation could be a common feature of West Nilotic languages.

Example: AM adds an optional goal in Shilluk

(12) dēɛŋ m̀ɔk á-căaam-é (gɔ́l-ē)
 Deng k.o.fish PST-eat:ITV-3SF (compound-3SG)

‘As for Deng, he went to eat the fish (in his compound).’

(Shilluk, based on data from Remijsen et al. 2016: 216).

AM as applicative in Nuer: background on applicatives

“Applicative constructions are a means some languages have for structuring clauses which allow the coding of a thematically peripheral argument or adjunct as a core-object argument. Such constructions are signalled by overt verbal morphology.” Peterson (2007: 1)

Dixon (2012: 296)’s characteristics of a canonical applicative derivation with a transitive clause:

- (c) An argument which was in the peripheral function in the underlying transitive (the ‘applicative argument’) is taken into the core, in O function (called the ‘AP-O’), replacing the original O argument.
- (d) ...the O argument of the original non-applicative clause ... [may be] simply omitted. Most often, it is ... having a more minor role (as ‘second object’).

Applicative in Nuer

An applicative verb derivation from transitive roots in Nuer introduces a core argument which can be a beneficiary/maleficiary.

- (13) a. **bóol** **cè** **dwòccɔr** **ɥóɔ**
 Bol PFV.3SG thing.SG push.TR.NF
 ‘Bol pushed the thing.’
- b. **bóol** **cè** **dèɛŋ** **ɥòow** **dwòccɔr** (preferred word order)
 Bol PFV.3SG Deng push.APPL.NF thing.SG
 ‘Bol pushed the thing for Deng.’
- c. **bóol** **cè** **dwòccɔr** **ɥòow** **dèɛŋ**
 Bol PFV.3SG thing.SG push.APPL.NF Deng
 ‘Bol pushed the thing for Deng.’

The applicative-like properties of the Nuer AM

AM is a valence increasing operation that introduces a goal/destination/direction as a core argument.

- This goal is obligatory, it cannot be omitted.
- It's position in the sentence is fixed, it likes to occur close to the lexical verb, it does not invert with adjuncts.

(15) bóol cè dèeη ɥòo kwáɫɫɪr (kèé ʃǒbà)
 Bol PFV.3SG Deng push.AM.CP.NF king.SG(NOM) PREP Juba
 'Bol pushed Deng whilst going to the king (in Juba).'

(16) *bóol cè dèeη ɥòo kèé ʃǒbà kwáɫɫɪr
 Bol PFV.3SG Deng push.AM.CP.NF PREP Juba king.SG(NOM)
 'Bol pushed Deng whilst going to Juba to the king.'

A treatment of the transitive Object in the AM

The AM argument does not replace the original O of the transitive, nor is the original O of the transitive omitted. There is no evidence to suggest that the original O of the transitive has a more minor role in the AM.

It is possible that the spatial arguments are more peripheral than the beneficiaries and that is reflected in their less prominent position relative to the O of the transitive in the AM.

Clearly, the AM has the traits of the canonical applicative, but it also differs from it as far as the treatment of the transitive O goes.

AM oblique

Another related AM derivation where the goal argument occurs in a PP.

- (17) a. $\omega\acute{\alpha}\nu$ $c\acute{\alpha}$ $\tau\acute{\iota}\iota\iota\omega$ $l\acute{\epsilon}\rho$ $(r\bar{e}j)$
 1SG PFV.1SG door.SG open.TR.NF inside(LOC)
 'I opened the door (inside).'
- b. $\omega\acute{\alpha}\nu$ $c\acute{\alpha}$ $\tau\acute{\iota}\iota\iota\omega$ $l\grave{\epsilon}\rho$ $r\bar{e}j$
 1SG PFV.1SG door.SG open.AM.NF inside(LOC)
 'I opened the door whilst going inside.'
- c. $\omega\acute{\alpha}\nu$ $c\acute{\alpha}$ $\tau\acute{\iota}\iota\iota\omega$ $l\grave{\epsilon}\rho$ $k\acute{\alpha}$ $r\bar{e}j$
 1SG PFV.1SG door.SG open.AM.OBL.NF PREP inside(LOC)
 'I opened the door whilst going inside.'

Antipassive in Nuer

Antipassivisation is a major morphosyntactic process in Nuer. Antipassive is a valence-decreasing operation that results in the omission/demotion of the Patient participant.

The demotion of the AM argument into a PP is akin to what happens in the antipassive.

The difference is that with AP it is the Patient argument (transitive O) that is demoted but with the AM.OBL it is the Spatial argument (the applied O) that is demoted.

This brings us back to our earlier Dixon (2012: 296)'s point:

(c) An argument which was in the peripheral function in the underlying transitive (the 'applicative argument') is taken into the core, in O function (called the 'AP-O'), replacing the original O argument.

The fact that it is the applied O that is being demoted in the antipassive-like process might be interpreted as the evidence that the applied O does, after all, replace the original O.

Why two AM derivations?

With most verbs both AM and AM.OBL are possible.

There is no difference in meaning between the corresponding AM and the AM.OBL.

There is, however, a complementary behaviour:

- The AM.OBL construction favours human goals and there are lexical restrictions on locative goals.
- The AM construction favours locative goals and there are lexical restrictions on human goals.

(No such restrictions with the localised goals e.g. 'inside', 'outside').

Lexical restrictions in the use of locations in AM.OBL and human goals in AM are the focus of the ongoing investigation.

Conclusions

- AM in Nuer indicates direction with movement verbs and translational motion with non-movement verbs. Additional layer of meaning – evidentiality.
- It is an applicative (valence increasing) derivation as it introduces an obligatory applied phrase with argument properties.
- AM.OBL has antipassive-like properties, but the goal argument is obligatory.
- Spatial arguments of AM include: locations (in LOC), animates/inanimates (in NOM), deixis. The local goals of motion (e.g. 'inside') can be used unrestrictedly with all AM verbs. Where longer distance (non-localised) goals of motion can be construed, there are some restrictions. The two constructions restrict goals of motion in a complementary way: with AM.OBL restrictions are on locations, with AM on non-locations.

Thank you to

- Our Nuer language consultant: Rebecca Nyawany Makwac.
- Our funders:
 - AHRC: 'Morphological complexity in Nuer' (AH/L011824/1)
 - Leverhulme Trust: 'Suprasegmentals in three West Nilotic languages' (RPG-2020-040)
 - University of Surrey: Research Impact and Engagement Fund 2019-20.
- And thank you for listening!

References

- Belkadi, Aicha (2016). Associated motion constructions in African languages. *Africana Linguistica* 22: 43-70.
- Dixon, R.M.W. (2012). *Basic Linguistic Theory*. Volume 3: Further Grammatical Topics. OUP.
- Guillaume, Antoine and Harold Koch (2021). Introduction: Associated Motion as a grammatical category in linguistic typology. In Antoine Guillaume and Harold Koch (eds.), *Associated motion. (Empirical Approaches to Linguistic Typology 64)*, Berlin: De Gruyter Mouton, pp. 3-32.
- Guillaume, Antoine. 2016. Associated motion in South America: Typological and areal perspectives. *Linguistic Typology* 20(1): 81–177.
- Kießling, Ronald and Stefan Brückhaus (2015). Associated locomotion in Datooga (Southern Nilotic). *Proceedings of the 8th World Congress on African Linguistics (WOCAL 8)*, Kyoto University, 21-24 August 2015.
- Koch, Harold (1984). The category of ‘associated motion’ in Kaytej. *Languages in Central Australia* 1: 23–34.
- Payne, Doris L. (2021). The extension of associated motion to direction, aspect and argument structure in Nilotic languages. In Antoine Guillaume and Harold Koch (eds.), *Associated motion. (Empirical Approaches to Linguistic Typology 64)*, Berlin: De Gruyter Mouton. pp. 695-746.
- Peterson, David A. (2007). *Applicative Constructions*. Oxford University Press. ProQuest Ebook Central, <http://ebookcentral.proquest.com/lib/ed/detail.action?docID=415090>.
- Reid, Tatiana (2019). *The phonology and morphology of the Nuer verb*. PhD thesis. University of Surrey.

Remijsen, Bert, Cynthia Miller-Naudé, and Leoma Gilley. 2016. The morphology of Shilluk transitive verbs. *Journal of African Languages and Linguistics* 37: 201–245.