

Expression of Mood and Modality in Gyeli

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1 Gyeli: A very different mood/modality system

Bantu typical mood/modality encodings

- verbal suffixes express modality (Nurse 2003, Nurse et al. 2010)
- primary indicative/subjunctive system (Palmer 2001, de Haan 2006)

Gyeli is radically different:

- no modality suffixes at all, but tonal modification
- basic mood distinction of **realis** and **irrealis** encoded by **syntactic H tone**
- expression of mood and modality distributed across different parts of the grammar

Overview of Gyeli Modality Construction Types Expression of mood/modality is structurally diverse: Mood and modality in Gyeli are expressed through various construction types, differing in their structural complexity, as shown in Table 1.

| | | | |
|--------------------|-------------------------|---|-------------------|
| simplex predicates | basic tone patterns | → | tense & mood |
| | syntactic tone patterns | → | realis/irrealis |
| complex predicates | | → | modal auxiliaries |
| complement clauses | | → | subjunctive |

Table 1: Modality across different construction types

2 Preliminaries

The Gyeli language

- endangered Bantu A80 language
- ‘Pygmy’ hunter-gatherers (PHGs)
- 4000-5000 speakers dispersed over an area of 12.500 km² in Cameroon
- speakers change their traditional way of life (more sedentary, more farming, less hunting)
- speakers shift to neighboring languages of farmers
- different dialects corresponding with different contact languages
- intense contact with neighboring languages

The Predicate is the verbal nucleus of a clause

Ingredients of the Gyeli predicate:

- SCOP
- Verb
- AUX

The Subject Clause Operator (SCOP)

1. The subject clause operator (SCOP) is a portemanteau morpheme carrying information on:

- subject agreement
- tense
- negation

(1) mé kè.
mɛ-H kè
1S-PRES go
'I go.'

| | | |
|-----------------------------|---|--|
| Speech Act Participants | Singular 1S me 2S we | Plural 1P ya 2P bwa |
| Non-Speech Act Participants | cl.1 a cl.3 wu cl.5 li cl.7 yi cl.9 nyi cl.14 bi | cl.2 ba cl.4 mi cl.6 ma cl.8 bi |

Table 2: SCOP in the various agreement classes

(2) mèé kélé.
mèé kè-lé
1S.PRES.NEG go-NEG
'I do not go.'

2. Shape of the SCOP

- The SCOP is underlyingly toneless—in all agreement classes (see Table 2)
- The SCOP takes different tonal shapes in different TM categories

3. Morpho-Syntactic Status of SCOP: free morpheme since it can optionally be omitted if

- it occurs in PRESENT or RECENT PAST
- a nominal subject is present and
- the lexical subject neither has a CV prefix nor plural noun class

(3) mwánò (á) ké ndáwò.
m-wánò (a) kè-H ndáwò
N1-child (1-PRES) go-R ∅9.house
'A/the child goes home.'

Predicate template

[SCOP - Auxiliary - Adverb/Pronominal Object - Verb]

Gyeli has simplex and complex predicate constructions, as shown in Table 2.

| | | |
|--------------------|--------------|-------------------------|
| Simplex predicates | SCOP Verb | → Tense-Mood |
| Complex predicates | SCOP Verb | AUX → Modality & Aspect |

Table 3: Predicate templates

3 Mood and Modality in Gyeli

3.1 Simplex Predicates: Tense-Mood

Simplex predicates encode Tense-Mood categories and are defined by:

- simplex predicate structure
- manipulation of verb tone patterns

| | | |
|---------------------|---------------|-------------------|
| Simplex predicates: | SCOP Verb | → Tense-Mood |
| Sub-pattern: | SCOP Verb(-H) | → Realis/Irrealis |

Table 4: Functions of simplex predicates

Simplex predicates express tense by a combination of tonal patterns on the SCOP and the verb.

- (4) a. mé dè.
1S eat
'I eat.'
- b. m̀è dé.
1S ate
'I ate.'

Form patterns arise from tonal combinations of SCOP and verb:

- 4 SCOP patterns: H, L, HL, LH
- 3 verb patterns: L, H, HL

Verb tone patterns match to basic meaning distinction:

- Verb L tone → NON-PAST categories
- Verb H tone → PAST categories

Tone Combinations Instantiate 7 Tense(-Mood) Categories, as summarized in Table 3.1.

| Basic distinction | TM category | SCOP | Verb stem | Gloss | |
|-------------------|-------------|------|-----------|-------|-------------------------------------|
| NON-PST | PRES | yá | dè | | ‘we eat’ |
| | INCH | yáá | dè | L | ‘we are at the beginning of eating’ |
| | FUT | yáà | dè | | ‘we will eat’ |
| PST | PST1 | yà | dé | H | ‘we ate (recently)’ |
| | PST2 | yáà | dé | | ‘we ate (a long time ago)’ |
| other | IMP | (yá) | dê | HL | ‘let’s eat!’ |
| | SBJV | yá | dée | | ‘may we eat’ |

Table 5: Tense-mood categories

Simplex predicates sub-pattern: Interaction with syntactic H tone:

→ Certain tense-mood categories take a verb-final H tone if the verb is not in phrase final position.

→ The presence or absence of the H tone correlates with a realis/irrealis distinction and thus encodes mood.

- (5) a. mé wúmbé békwàndò.
mɛ-H wúmbɛ-H H-be-kwàndò
1S-PRES want-R OBJ.LINK-be8-plantain
‘I want plantains.’
- b. mɛ̀̀ gyámbò békwàndò.
mɛ̀̀ gyámbɔ H-be-kwàndò
1S.FUT cook OBJ.LINK-be8-plantain
‘I will/might cook plantain.’
- c. mé wúmbé nâ wé gyámbóó
mɛ-H wúmbɛ-H nâ wɛ-H gyámbóó
1S-PRES want-R COMP 2S-PRES cook.SBJV
békwàndò.
H-be-kwàndò
OBJ.LINK-be8-plantain
‘I want you to cook plantain.’

The presence of the syntactic H tone is conditioned by the specific TM category and not morpho-syntactic material following the verb since all parts of speech following the verb trigger the syntactic tone to surface.

- (6)
- | | | | |
|----|--------------------------|-------------------------|--------|
| a. | mé gyámbò | 'I cook' | |
| b. | mé gyámbó bé-kwàndò | 'I cook plantains' | __N |
| c. | mé gyámbó byô | 'I cook it' | __PRO |
| d. | mé gyámbó ndáà | 'I cook today' | __ADV |
| e. | mé gyámbó é kîsíní dé tù | 'I cook in the kitchen' | __PREP |
| f. | mé gyámbó nà wómbèlè | 'I cook and sweep' | __CONJ |
| g. | mé wúmbé gyámbò | 'they want to cook' | __V |

There are two different syntactic H tones:

- Mood distinctive H tone → realis/irrealis, as in (7a)
- Object linking H tone → marks the object that is closest to the verb, as in (7b)

- (7)
- | | | | |
|----|----------------------|----------|-------------------|
| a. | mé | gyámbó | bélòlò. |
| | mɛ-H | gyámbɔ-H | H-be-lòlɔ |
| | 1S-PRES | cook-R | OBJ.LINK-be8-duck |
| | 'I cook ducks.' | | |
| b. | mèè | gyámbò | bélòlò. |
| | mèè | gyámbɔ | H-be-lòlɔ |
| | 1S.FUT | cook | OBJ.LINK-be8-duck |
| | 'I will cook ducks.' | | |

Realis/Irrealis Distinction

Based on the presence or absence of a syntactic H tone, Gyeli distinguishes 4 realis and 3 irrealis moods, as shown in Table 3.1.

| H tone presence → Realis | H tone absence → Irrealis |
|-----------------------------|------------------------------|
| PRESENT | FUTURE |
| INCHOATIVE | IMPERATIVE |
| RECENT PAST | SUBJUNCTIVE |
| REMOTE PAST | |

Table 6: Realis/Irrealis Distinction

In terms of modality, REALIS corresponds to the actual and IRREALIS to the possible.

Interim summary: Tense-Mood categories

The 7 form sets of simplex predicates map onto functional categories encoding tense and mood, as shown in Figure 3.1.

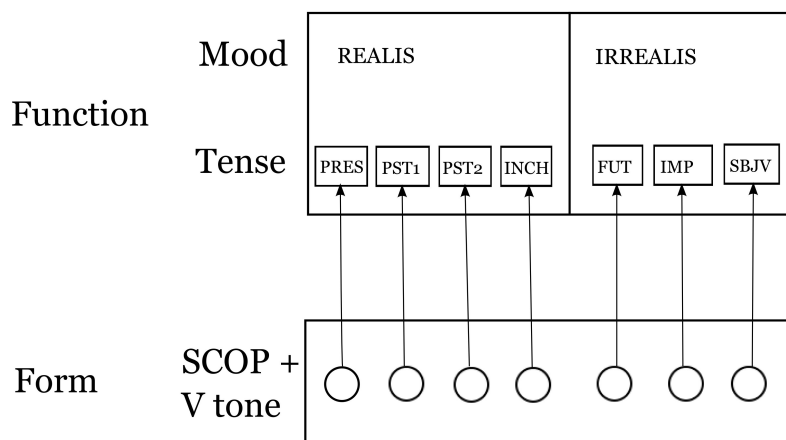


Figure 1: Mapping of simplex predicate form sets onto functional categories

3.2 Complex Predicates: Auxiliaries

Modality in complex predicates

- unlike mood distinctions in simplex predicates, modal auxiliaries are an **optional** and **lexical** way of encoding modality
- modality in complex predicates is mainly encoded through modal auxiliaries, but also aspectual auxiliaries
- Construction template: [SCOP - AUX - Verb]
- template is parallel to most aspect and negation constructions

Types of modality Auxiliaries express different types of modality

- deontic (must)
- prohibition (must not)
- volition (want)
- ability/dynamic (can)

1. Deontic *yáne* ‘must’

- (8) donc wè bùdé ná bàfû, wé yàné gyàgà
 donc wɛ bùdɛ-H ná ba-fû wɛ-H yàɛ-H gyàgà
 so[French] 2S be-R again ba2-fish 2S-PRES must-R buy
 bô.
 bô
 2.OBJ

‘So, you have fish again, you have to buy them.’

2. Prohibition *dúù* ‘must not’

- (9) bé dúú vùù.
 be-H dúù-H vùù
 2P-PRES must.not-R worry

‘Don’t worry.’

3. Ability *kùga* ‘can’

- (10) bé kùgá dyúà.
 be-H kùga-H dyúà
 2P-PRES can-R swim

‘You (pl) can swim.’

Auxiliaries and the Realis/Irrealis Distinction Modal auxiliaries tonally behave like other verbs and do not inherently belong to a specific tense-mood category.

- (11) a. mé wúmbé gyàgà békwàndò.
 mɛ-H wúmbe-H gyàgà H-be-kwàndò
 1S-PRES want-R buy OBJ.LINK-be8-plantain
 ‘I want to buy plantains.’
- b. méè wúmbè gyàgà békwàndò.
 mɛ-H wúmbe gyàgà H-be-kwàndò
 1S.FUT want buy OBJ.LINK-be8-plantain
 ‘I will/might want to buy plantains.’
- c. mé nzíí wúmbè gyàgà
 mɛ-H nzíí wúmbe-H gyàgà
 1S-PRES PRES.PROG want buy
 békwàndò.
 H-be-kwàndò
 OBJ.LINK-be8-plantain
 ‘I am wanting to buy plantains.’

Aspectual Auxiliaries and Modality Also aspectual auxiliaries can express modality. The PROSPECTIVE marker *múà* tonally clusters with the IRREALIS categories and expresses possibility, as shown in (12).

- (12) *ká wè múà wáà vólè mè...*
ká wε múà wáà vólε mè
 if 2S PROSP 2S.FUT[Kwasio] help 1S.OBJ
 ‘If you can help me...’

3.3 *nâ*-Complement Clauses: Subjunctive vs. Indicative

The Subjunctive

- The subjunctive primarily occurs in *nâ*-complement clauses
- The subjunctive encodes
 - wishes/orders (13a)
 - obligation (13b)
 - prohibition (13c)
 - intention/purpose (13d)
 - possibility (13e)

- (13) a. Wish/order
á láá mè nâ mé vé’è bwánò
a-H láà-H mè nâ mε-H vé’è b-wánò
 3S-PRES tell-R 1S.OBJ COMP 1S-PRES give.SBJV ba2-child
bèfùmbí.
be-fùmbí
 be8-orange
 ‘He tells me that I should give the children oranges.’
- b. Obligation
yî mpìnàgà nâ wé ké’è sùkúli.
yî mpìnàgà nâ wε-H ké’è sùkúli
 7 Ø3.obligation COMP 2S-PRES go.SBJV Ø7.school
 ‘It’s an obligation that you go to school.’
- c. Prohibition

yî mpìndá nâ wé djíwó'ò
 yî mpìndá nâ wε-H djíwó'ò
 7 ∅9.prohibition COMP 2S-PRES steal.SBJV
 bésâ.
 H-be-sâ
 OBJ.LINK-be8-thing

'It's forbidden that you steal things.'

d. Intention/purpose

á lèmbó nâ bùdì báà bà múà
 a-H lèmbó-H nâ b-ùdì báà ba múà
 1S-PRES know-R COMP ba2-person 2.DEM.PROX 2 PROSP
 búèlè nâ bá dyúù nyè.
 búèlè nâ ba-H dyúù nyè
 fish COMP 2-PRES kill.SBJV 1.OBJ

'He knows that these people are about to fish [= look for him] in order to kill him.'

e. Possibility

ká yí nyí mē mbò... mpángì yí kùgá
 ká yi-H nyí-H mē m-bò mpángì yi-H kùga-H
 when 7-PRES enter-R 1S N3-arm ∅7.bamboo 7-PRES can-R
 nâ nyî wè mbò.
 nâ nyî wè m-bò
 COMP enter.SBJV 2S N3-arm

'When it goes into my arm... the bamboo can sting your arm.'

Subjunctive in Main Clauses The subjunctive is not restricted to subordinate clauses, but can also occur in main clauses, as shown in (14).

(14) bèyá nzíyè bíyè kfùmàlà.
 bèya-H nzíyè bíyè kfùmala
 2P-PRES come.SBJV 1P.OBJ find

'You (pl) may come to meet us.'

Indicative Uses in *nâ*-Complement Clauses The indicative is used in *nâ*-complement clauses for:

- cognition (think, know, remember) (15a)
- perception (hear, see) (15b)

- emotion (be happy) (15c)
- reported discourse (say) (15d)

(15) a. Cognition

á lèmbó nâ bá gyámbó
a-H lèmbɔ-H nâ ba-H gyàmbɔ-H
1-PRES know-R COMP 2-PRES cook-R
békwàndò.
H-be-kwàndò
OBJ.LINK-be8-plantain
‘He knows that they cook plantains.’

b. Perception

á nyé nâ bá gyámbó
a-H nyê-H nâ ba-H gyàmbɔ-H
1-PRES see-R COMP 2-PRES cook-R
békwàndò.
H-be-kwàndò
OBJ.LINK-be8-plantain
‘He sees that they cook plantains.’

c. Emotion

á sísó nâ bá gyámbó
a-H sísɔ-H nâ ba-H gyàmbɔ-H
1-PRES be.happy-R COMP 2-PRES cook-R
békwàndò.
H-be-kwàndò
OBJ.LINK-be8-plantain
‘He is happy that they cook plantains.’

d. Reported discourse

á kí nâ bá gyámbó
a-H kî-H nâ ba-H gyàmbɔ-H
1-PRES says-R COMP 2-PRES cook-R
békwàndò.
H-be-kwàndò
OBJ.LINK-be8-plantain
‘He says that they cook plantains.’

The use of the subjunctive is determined by the modality of the subordinate clause and not by the predicate of the main clause or the general construction type (complement clause), as shown in (16).

(16) a. Subjunctive

á láá m̀è nâ mé vé'è bwánò
a-H láá-H m̀è nâ mε-H vé'è b-wánò
1-PRES tell-R 1S.OBJ COMP 1S-PRES give.SBJV ba2-child
b̀èfùmbí.
be-fùmbí
be8-orange

'He tells me that I should give the children oranges.'

b. Indicative

á láá m̀è nâ mé púó bvúbvù.
a-H láá-H m̀è nâ mε-H púó-H bvúbvù
1-PRES tell-R 1S.OBJ COMP 1S-PRES pay-R too.much

'He tells me that I pay too much.'

Conclusion

References

Expression of mood and modality is distributed across different parts of the grammar in Gyeli:

- Simplex predicates
 - realis/irrealis distinction is obligatory and formally encoded through tone
 - tense and mood form a cohesive system
- Complex predicates
 - modal and aspectual auxiliaries optionally and lexically encode modality
- *nâ*-Complement clauses
 - subjunctive/indicative distinction

Relation of Mood and Modality Realis/irrealis distinction among simplex predicates only applies to grammatical TM categories, not modality in general.

Example: Possibility modality as a semantic category found across different construction types

- simplex predicates/FUTURE → grammatical IRREALIS mood
- complex predicate/PROSPECTIVE → aspectual auxiliary
- *nâ*-complement clause → SUBJUNCTIVE

- (17) a. Simplex predicate
 mɛ̀ɛ̀ gyám̀b̀ò békwànd̀ò.
 mɛ̀ɛ̀ gyám̀b̀ò H-be-kwànd̀ò
 1S.FUT cook OBJ.LINK-be8-plantain
 ‘I will/might cook plantain.’
- b. Complex predicate
 mɛ̀ múà gyám̀b̀ò békwànd̀ò.
 mɛ̀ múà gyám̀b̀ò H-be-kwànd̀ò
 1S PROSP cook OBJ.LINK-be8-plantain
 ‘I’m about to cook plantain (but I might not).’
- c. *nâ*-complement clause
 yí kùgá nà mé gyám̀b̀óò
 yi-H kùga-H nà mɛ-H gyám̀b̀óò
 7-PRES can-R COMP 1S-PRES cook.SBJV
 békwànd̀ò.
 H-be-kwànd̀ò
 OBJ.LINK-be8-plantain
 ‘It is possible that cook plantain.’

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Abbreviations

| | | | |
|-------|-----------------------------|----------|-----------------------------|
| ∅ | prefixless noun class | N | nasal; N- noun class |
| 1-9 | agreement class 1-9 | NCA | non-complete accomplishment |
| 1-3P | first-third person plural | NEG | negation |
| 1-3S | first-third person singular | OBJ.LINK | object linker |
| AUX | auxiliary | PRES | present |
| ba | ba- noun class | PRF | perfect |
| be | be- noun class | PRIOR | priorative |
| COM | comitative marker | PROG | progressive |
| COMPL | absolute completive | PROSP | prospective |
| FUT | future | PST1 | recent past |
| H | high tone | PST2 | remote past |
| HAB | habitual | R | realis mood |
| HL | falling contour tone | RETRO | retrospective |
| IMP | imperative | SCOP | subject clause operator |
| INCH | inchoative | SBJV | subjunctive |
| L | low tone | SUB | subordinate |
| le | le- noun class | TM | tense-mood |
| LH | raising contour tone | V | verb |
| ma | ma- noun class | X | oblique |
| mi | mi- noun class | | |