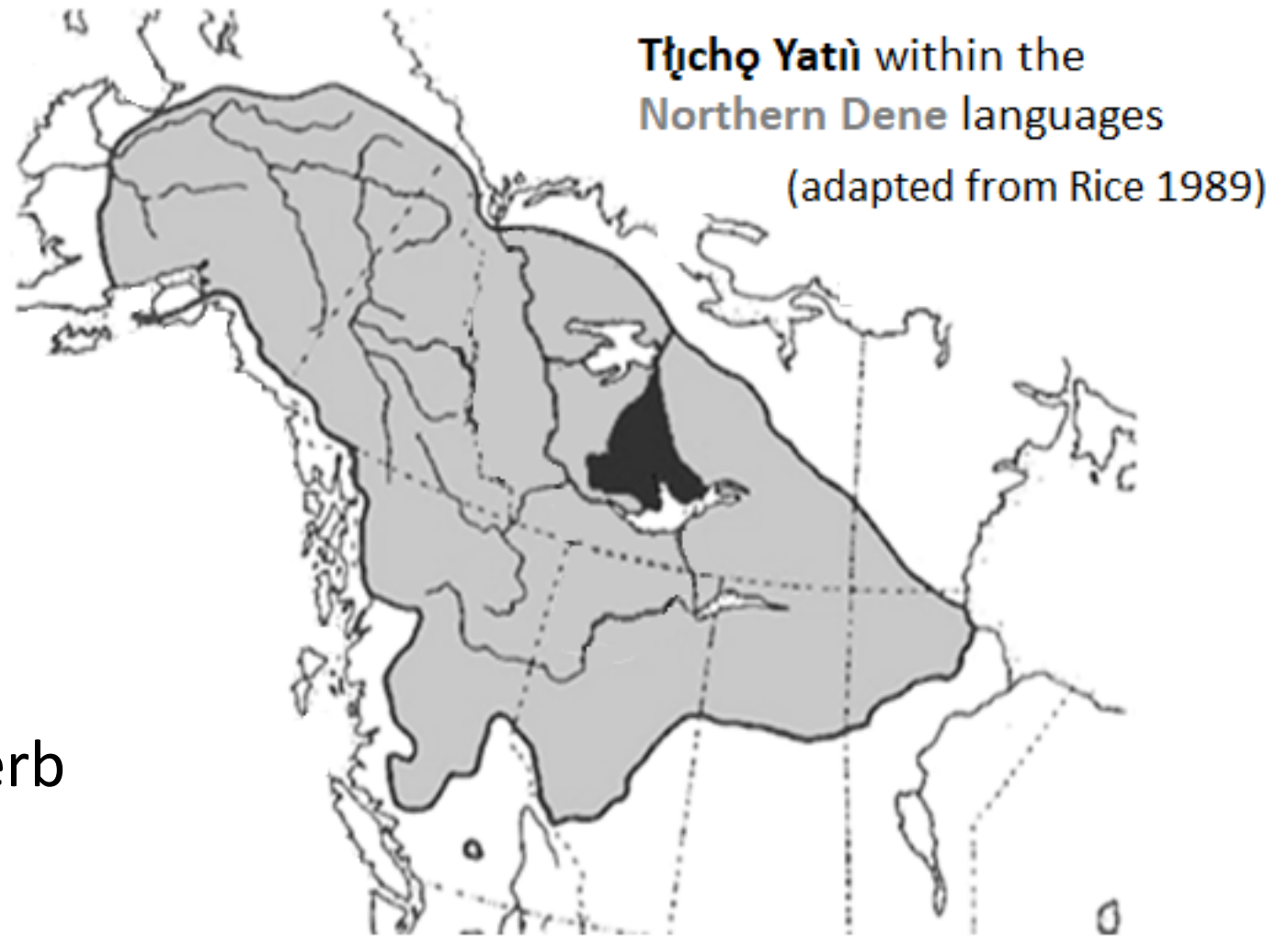


A-bar movement and functional heads: Diagnostics for Dene clause structure

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Tłıchq Yatı̀

- aka Tłıchq, Dogrib
- Dene (Athapaskan) language family
- spoken between Great Slave and Great Bear Lakes
- ~1,700 speakers (StatsCan 2016); endangered
- Like other Dene languages, verb morphology is highly agglutinative



Sources of data in this talk

- No fieldwork since 2019!
- Limited examples from pre-2019 fieldwork with community linguists and other fluent speakers
 - Marie-Louise Bouvier White, Mary Siemens, Mary Rose Sundberg, Leanne Mantla, the late Archie Wedzin and an anonymous consultant
- Most data drawn from published sources:
 - *Tłjchq Yatì Multimedia Dictionary* (Tłjchq Community Services Agency 2007)
 - *Weledeh Verb Dictionary* (Jaker, Sangris & Sundberg 2013)
 - Saxon 1986 (Doctoral dissertation)
 - *Dogrib New Testament* (Dogrib Translation Committee 2003)

Phrasal movement in Tł̥chq Yatì

- basic constituent order is SOV
- scrambling is common for information-structural purposes
- Two common types of movement above T
 - wh-movement
 - information-structural scrambling

Wh-movement

- *Wh-in situ* and fronted *wh-* are both grammatical in this language

1. Bob **ayì** ye-gha nà-ye-ehdì ha?
Bob **what** 4SG-for again-4SG-3SG.buy FUT
'What is Bob going to buy for her?' (Tłıchq Community Services Agency 2007)

2. **Amì** bebì y-ı-ıts'ı?
who baby 4SG-3SG-kissed
'Who did the baby kiss?' (Ackroyd 1982:190)

Wh-movement

- Both trigger object agreement:

1. Bob **ayii** ye-gha nà-**ye**-ehdì ha?
Bob **what** 4SG-for again-**4SG**-3SG.buy FUT
‘What is Bob going to buy for her?’

2. **Amii** bebì **y-ɿ-ɿts'ɿ?**
who baby **4SG**-3SG.kissed
‘Who did the baby kiss?’

Wh-movement

- Both trigger possessive agreement:

1. **Amì** **we**-kwì eyits'q **amì w**-iizì de-k'e whe-ʔq?
who **3SG**-head and **who 3SG**-name REFL-on 3SG-LOC
'Whose head and whose name are on it?' (DTC 2003:Mark 12:16)

2. **Amì** s-ɲhʔà-a sìi **we**-yatì ehkw'ɪ hq̄t'e.
who 1SG-send-NMLZ FOC **3SG**-word right 3SG.COP
'Whoever sent me is trustworthy.' (Lit., 'whoever sent me, their word is right.')

Information-structural scrambling

- Both topic-fronting and focus-fronting are common in Tł̥chq Yatì
- Focused elements
 - Constituents in focus may be marked by *sìi* (DPs, PPs) (Saxon 1986)
 - A clause in focus may be marked by *hqt'e* (TPs) (Welch 2015)
- Topicalized elements
 - If clausal, may be marked by *ne*, which marks “a speaker’s commitment that *p* is part of CG” (Saxon 2014)
 - Constituent topics are unmarked
- Otherwise, since focused and topicalized constituents rarely co-occur, identifying which is which can be challenging

IS-fronting, binding and agreement

- Fronted elements bind (overt or covert) arguments; **verbs**, possessives, and adpositions may show agreement with these:

1. **S_i** **sì** [**∅_i** ede-gha go-**h**-de] hq̄t'e.
1SG **FOC** REFL-for AR-**1SG**-speak FOC
'It is I who testify for myself.' (DTC 2003: John 8:18)

2. **Sq̄m̄ba-nàgehts̄j̄-dq̄ò_i** [**eded_i** **kò** efe-ghone-**ge**-ètq̄] hq̄t'e.
money-collect-people **3** **even** REFL-of-**3PL**-love FOC
'Even tax collectors love each other.' (DTC 2003: Matthew 5:46)

3. **S_i** **zq̄** [ehts̄j̄ **∅_i** **se-nèhshq̄**].
1SG **only** granny **1SG-3SG**.raised
'Only me Granny raised.' (Saxon 1986:264)

IS-fronting, binding and agreement

- Fronted elements bind (overt or covert) arguments; verbs, **possesseees**, and adpositions may show agreement with these:

1. [Nakwenàòʔʔ s̀i] we-k̀òta go-ts'ò d̀ò
prophet FOC **3**-town AR-from people
 eyits'ò xàè we-`ot'ɔ̀ z̀ò d̀ò g̀iit'ɔ̀ niile
 and own **3**-family only people 3PL.OPT.honour NEG
 'Prophets are only honoured by people from their own town and their own family.' (DTC 2003: Matthew 13:57)

2. [D̀ò ɬ̀ò-le-a z̀ò eyɪ t̩ɬɪ k'e a-ge-t'ɔ̀-ɔ̀]
 person many-NEG-DIM only **that trail** LOC thus-3PL-go-NMLZ
 s̀i we-l̀ò while ts'ò gee-da ha.
 FOC **3**-end not.exist to 3PL-see FUT
 'Only a few people who go on that trail will see its end.' (DTC 2003: Matthew 7:14)

IS-fronting, binding and agreement

- Fronted elements bind (overt or covert) arguments; verbs, possessives, and **adpositions** may show agreement with these:

1. **S_i** [se-ts'ihʔò dɯ nèk'e dɔ hazqò
1SG **1SG**-because.of this earth people all

naxɪ-dza-gɯ-hwhq ha].
2PL-LEX-3PL-hate FUT (DTC 2003: Matthew 24:9)
'You will be hated by all nations because of me.'

2. **Shìh_i** sɿ [done Ø_i ye-mqɔ ɿ-dè].
hill FOC person **4**-around 3-go
'The hill, people go around it.' (Saxon 1986: 112)

How many Specs between C and T?

- The existence and optionality of both wh- raising and IS-fronting raises questions:
- How many left-peripheral Specs exist?
- If both topicalized and focused constituents can be fronted, are these two projections or one, and what is the relationship to Spec CP?

Telling topic from focus

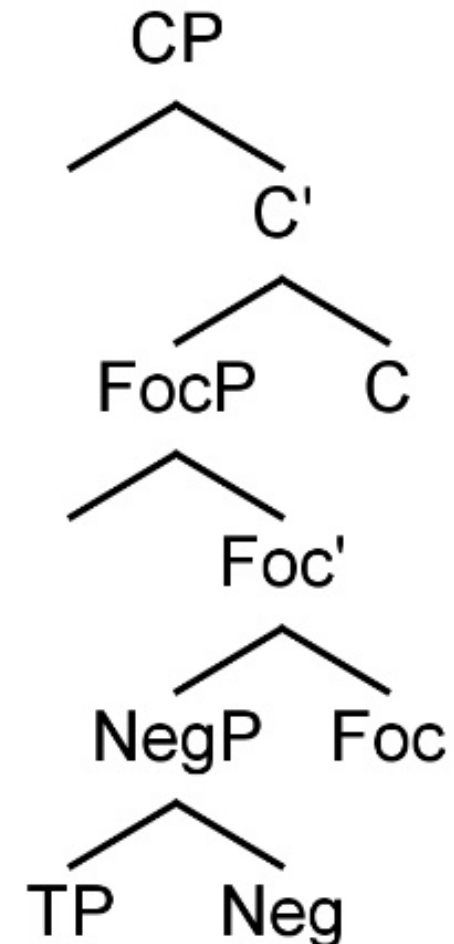
- Co-occurrence of unambiguously topicalized and focussed non-wh constituents is very rare in this language
- When it does occur, we find topic preceding focus:

1. **Judea** **nè-k'e**, **kòta** **Bethlehem** **gò-yeh** **sì**
Judea **land-LOC** **town** **Bethlehem** **AR-called** **FOC**
ekọ kòta gò-laa hazọ nahk'e wet'aaʔà họt'e.
there town AR-LOC.PL all than 3-important FOC
'In the land of Judea, the town called Bethlehem, that place is more important than all towns.' (DTC 2003: Matthew 2:6)

2. **Kwik'ı**, **cheko** **sì** **nà-y-ıızhì**.
gun **boy** **FOC** **LEX-4-3.broke**
'As for the gun, the boy broke it.' (Saxon 1986:65)

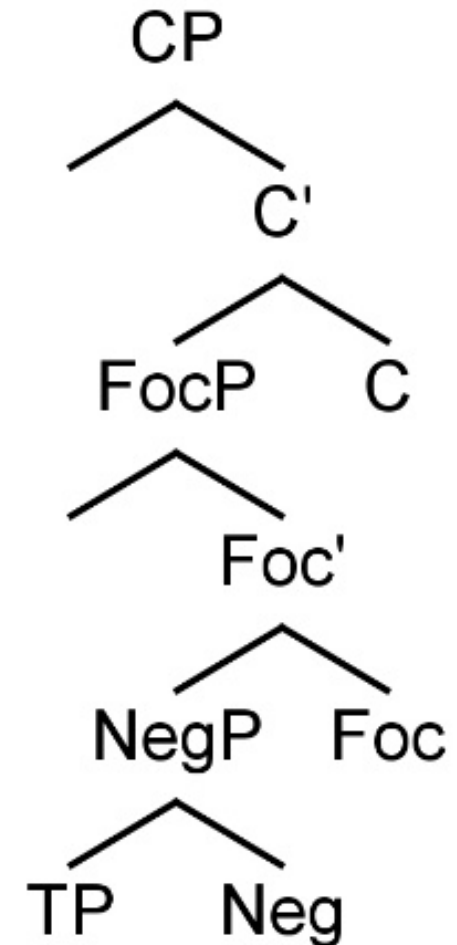
Diagnosing clause structure

- In Tł̥chq̣, there is a closed class of postverbal particles that show strict ordering and co-occurrence restrictions (Welch 2015)
 - Tense >> Negation >> Clausal Focus >> Complementizers & Discourse markers
- These restrictions can be used to delineate at least two heads (Foc and Neg) between C and T



Diagnosing clause structure

- In Tłıchq, there is a closed class of postverbal particles that show strict ordering and co-occurrence restrictions (Welch 2015)
 - Tense >> Negation >> Clausal Focus >> Complementizers & Speaker-evaluative markers
- These restrictions can be used to delineate at least a Foc head between C and T



Diagnosing clause structure

<i>p</i>	T	Neg	clausal Foc	C
...	<i>ha</i> (future)	<i>le</i> (negated)	<i>hqt'e</i> (focused)	<i>sɔnɪ</i> (dubitative)
				<i>la</i> (surprise)
				<i>nì</i> (question)
				<i>sòò</i> (prohibitive)
	∅ (non-future)	∅ (non-negated)	∅ (non-focused)	<i>nqò</i> (evidential)
				<i>gha</i> (purposive)
				<i>t'à</i> (because)
				μ (relativizing)
				∅ (neutral)

Diagnosing clause structure

- Saxon (2014) identifies an additional discourse marker, *ne*:
 - “... use of *ne*... depends on a speaker’s commitment that *p* is part of CG, and calls on the addressee to acknowledge that *p* is in CG.”
- As in some uses of *eh* in Canadian English, *ne* is a way of saying ‘as we both know...’
- This is essentially clausal topicalization!
- Like *hət’e*, the clausal focus marker, *ne* occurs in the right periphery. It precedes the speaker evaluative markers and complementizers

Diagnosing clause structure

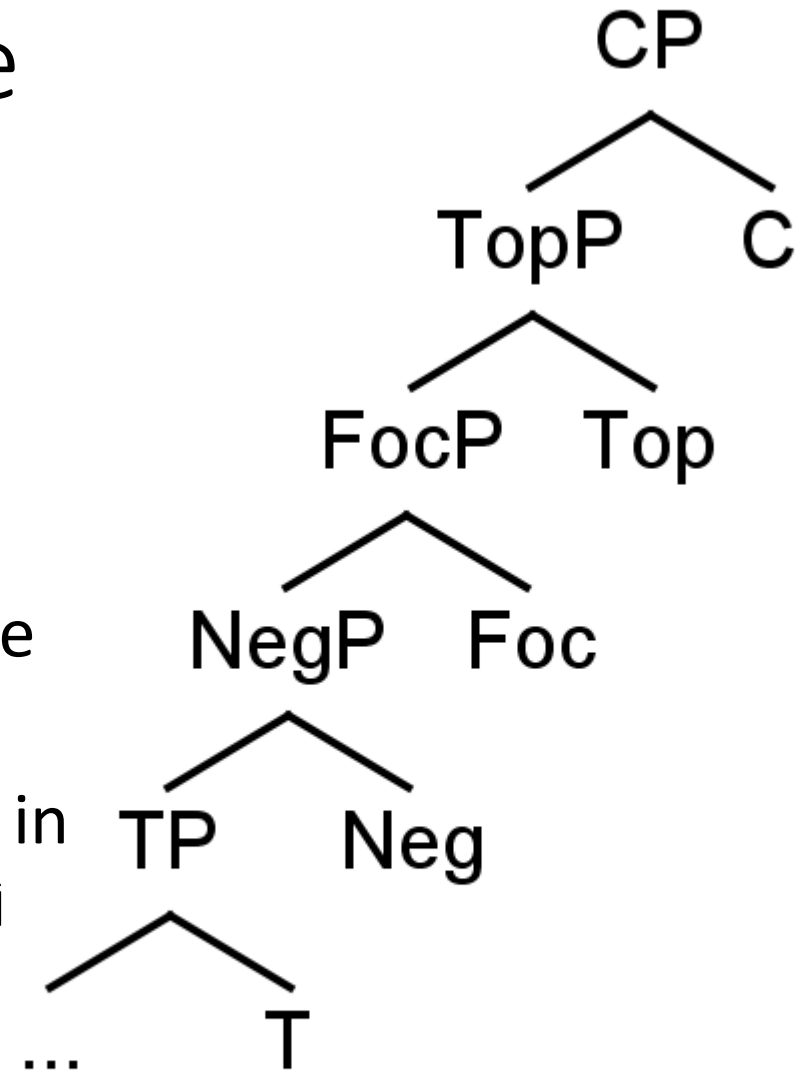
- Like *hət'e*, the clausal focus marker, *ne* occurs in the right periphery. It precedes the speaker evaluative markers and complementizers
- It follows *hət'e*, the focus marker:
 1. ... *hani dii ndè ke nàgɔdè hət'e ne.*
thus this land on 3PL.lived **FOC TOP**
'That's how they lived on this land.' (Michel Paper, cited by Jaker, Sangris & Sundberg 2013)

Diagnosing clause structure

<i>p</i>	T	Neg	clausal Foc	clausal Top	C
...	<i>ha</i> (future)	<i>le</i> (negated)	<i>hqt'e</i> (focused)	<i>ne</i> (topicalized)	<i>sɔnɪ</i> (dubitative)
					<i>la</i> (surprise)
					<i>nì</i> (question)
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					<i>t'à</i> (because)
					μ (relativizing)
					∅ (neutral)

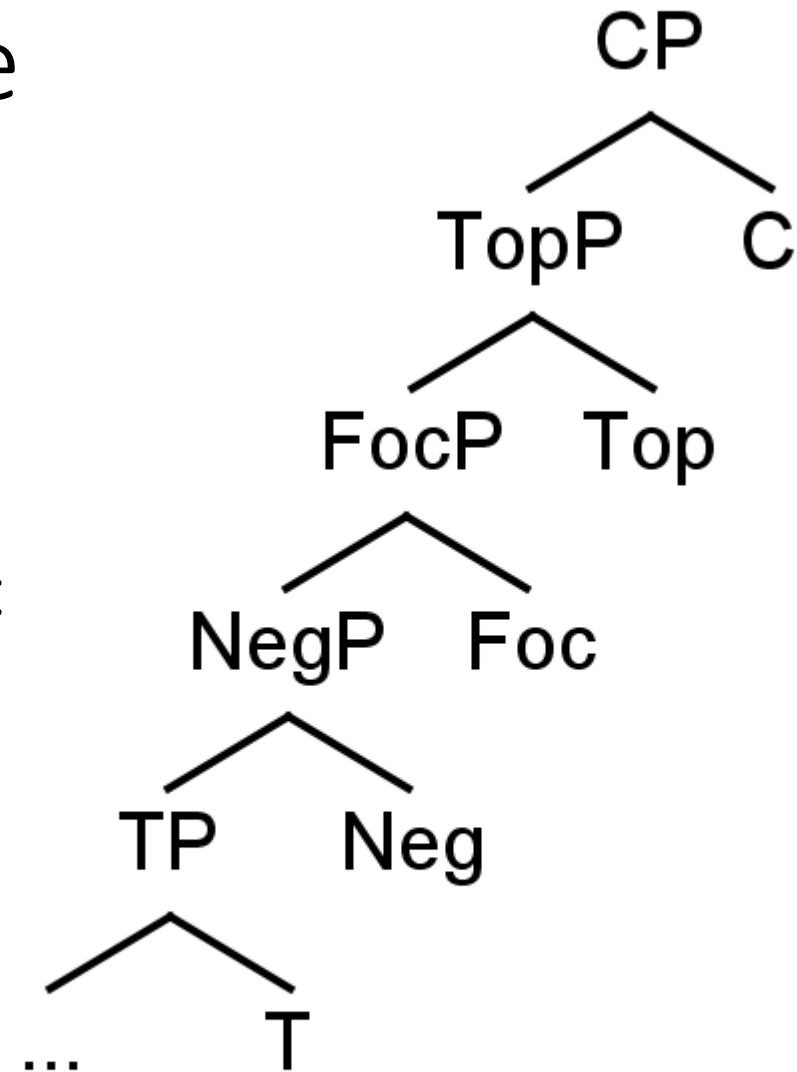
Diagnosing clause structure

- So what?
- Foc >> Top >> C is a mirror (in this right-headed language) of the projections proposed by Rizzi (1997), Cinque (1999) and subsequent cartographic work on the left periphery in I-E languages
- It is *also* a mirror of the ordering we find in left-dislocated constituents in Tł̨ch̨ Yatì



Diagnosing clause structure

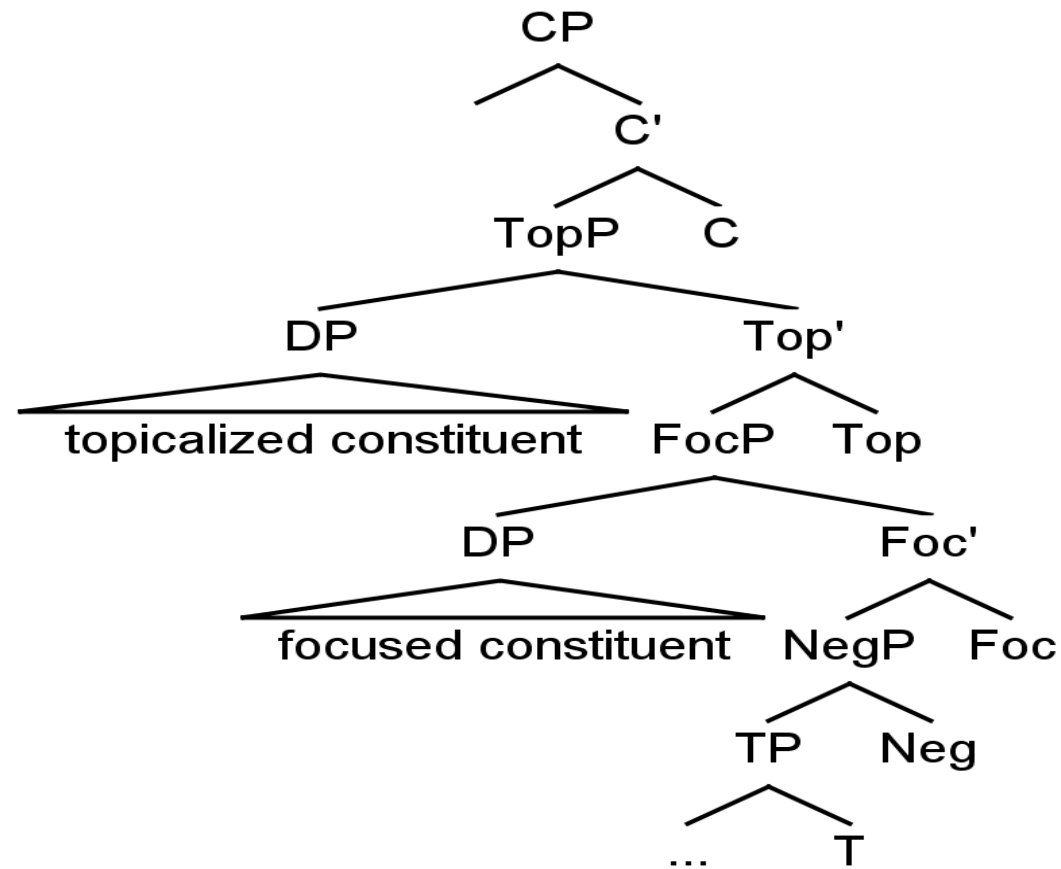
- At the *right* periphery, we find clausal focus marking, inside clausal topic marking, among functional heads rightwards of T (in this SOV language)
- At the *left* periphery, we find constituent focus, inside constituent topic, leftwards of Spec TP
- Conclusions:
 - clausal structure employs the same architecture to topicalize or focus both arguments (in Spec positions) and propositions (in Head positions)



Findings

- multiple landing sites for phrasal movement on left periphery
- multiple landing sites for head-movement on right periphery
 - Copulas at v, Asp, T
 - IS-functional heads at Foc, Top
 - Discourse and linking functional heads at C (very possibly further articulated (Saxon 2013))
- parallel structure:
 - clausal topic and focus in right periphery
 - constituent topic and focus on left periphery
 - constituents in Spec positions of clausal IS functional heads?

Unified picture of clausal and constituent IS



Remaining issues

- Rare examples of multiple A'-movement show orders hard to explain:

1. **Victor** **sii** **ʔayii** Bob **ye**-gha nà**ye**ehndì ha ?
Victor **FOC** **what** Bob **4**-for **4.3**.buy FUT

‘As for Victor, what is Bob going to buy for him?’ (Saxon 1986:77)

- Surprising for several reasons
- Both *Victor* and *ayii* are left-dislocated
- Other data suggest we should find dislocated constituents in the order TOP >> FOC

Remaining issues

- A few examples of multiple A'-movement depart are hard to explain:
 1. **Victor** **sii** **ʔayii** Bob **ye**-gha **nàye**ehndì ha ?
Victor **FOC** **what** Bob **4**-for **4.3**.buy FUT
'As for Victor, what is Bob going to buy for him?' (Saxon 1986:77)
- If *Victor* is in focus (which the translation suggests is not the case), what is *ayii*?
 - (multiple topics fine, multiple foci not, in languages with structural focus: Kiss 1998, Erteschik-Shir 2007)
- If *ayii* is a topic (Grewendorf 2011), why is it rightward of *Victor*?
- If *ayii* is in focus, why is *Victor* marked with *sii*?

Possible explanations

- Possible explanations:
- *sìi* may mark topic or focus depending on dialect
 - around 40 years of documentation have treated it as focus
- *sìi* may be a general “IS-marker”, interpreted as focus *unless* another constituent is in focus
 - if true, what is the motivation, since one would expect a topic leftward of a *wh*-word in any case?
 - Also, left-dislocation itself is a marking of topicalization: why use *sìi* as well?
- IS projections may be recursive
 - If true, why do we not see multiple foci more often?

Possible explanations

- Possible explanations:
- Spec CP may be available as an “overflow valve” for IS-driven movement
 - If true, IS-moved constituents should be able to move to higher clauses
 - Certainly true for English:
 1. Terry wishes Sandy would appoint **Kim** treasurer.
 2. **Kim**, Terry wishes Sandy would appoint \emptyset treasurer.
 - Multiple movement to higher clauses should be barred:
 1. ***Kim**, **Sandy**, Terry wishes \emptyset would appoint \emptyset treasurer.
- True in Tł̥chq̣ Yatì?
- Needs to be checked in post-pandemic fieldwork!

Possible explanations

- Possible explanations:
- Multiple Topic and Focus positions may exist in a finer-grained structure (see, e.g., Benincà & Poletto 2004)
- An intriguing possibility: the multitude of functional particles I've labelled C have structural differences among them
- Saxon et al. 2013 demonstrated they have different selectional properties
- If they instantiate different functional heads in an exploded C, they ought to have different Spec positions
- Prediction: order of these heads should mirror the order of finer-grained landing sites for A-bar movement
- Corpus work insufficient for this
- Needs to be checked in post-pandemic fieldwork!

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A bonus: the category of a question marker

- Tɬɨchɔ Yatì marks polar questions in one of three ways:
 - Intonation only: Whatì go-ts'ò a-ne-t'ɨ?
 Whatì AR-to thus-2SG-go
 'Are you going to Whatì?'
 - Final particle *nì*: Whatì go-ts'ò a-ne-t'ɨ nì?
 Whatì AR-to thus-2SG-go Q
 'Are you going to Whatì?'
 - Initial particle *asjì*: **Asjì** Whatì go-ts'ò a-ne-t'ɨ?
 Q Whatì AR-to thus-2SG-go
 'Are you going to Whatì?'
- Are *asjì* and *nì* of the same category (C)?

A bonus: the category of a question marker

PRO

- *Asj̀̀* is used to introduce both direct questions (as above) and embedded questions, like English *whether*
- *Asj̀̀* and *nì* do not co-occur

CON

- All other complementizers and discourse markers are rigidly right-edge; *asj̀̀* is left-edge
- The long low-tone final vowel of *asj̀̀* is unlike other complementizers, but like adverbs and possessed nouns

A bonus: the category of a question marker

- If *asj̀̀* is a lexical word of category Adv or N, we should expect to find it left-dislocated in Spec TopP (or possibly Spec CP)!
- **Question**, this can be discovered through fieldwork?