

# Case on embedded subjects in Sakha\*

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5 December 2022

## 1 Introduction

- Sakha adjunct clause constructions have been presented as striking data for uniquely Dependent Case Theory (DCT) (Baker & Vinokurova 2010, henceforth B&V)
- Accusative case can surface on what seems to be the subject of the adjunct clause, in *prima facie* absence of a functional head<sup>1</sup>

- (1) Masha Misha-(**ny**) kel-ie      dien jie-ni      khomuy-da  
Masha Misha-ACC come-FUT DIEN house-ACC tidy-PST.3SG  
'Masha tidied up the house (thinking) Misha would come' (Vinokurova 2005: 368)

The same mechanism can assign accusative case in complement clauses, either with *dien* or with a nominalized participial clause:

- (2) B&V: 39
- a. Min [ ehigi-(ni) [ bugun kyaj-yax-xyt dien ]] erem-mit-im  
1SG [ 2PL-ACC [ today win-FUT-2PL DIEN ]] hope-PTPL-1SG  
'I hoped that you would win today.'
- b. Min [ ehigi-(ni) [ bugun kyaj-byk-kyt-yn ]] ihit-ti-im.  
1SG [ Spl-ACC [ today win-PST-2PL-ACC ]] hear-PST-1SG  
'I heard you won today.'

### Our claim

These embedded constructions can be analyzed via Case-by-Agree; moreover, the DCT algorithm fails to cover the full range of facts

1. The adjunct clause is actually a **ConverbP**, not a CP
2. Accusative case on the embedded subject of adjunct clauses is assigned from the converb *di-en* 'say-CVB' via ECM
3. There is also a CP with complementizer *dien*, whose accusative case on its embedded subject comes from the matrix verb, via ECM and optional raising-to-object
4. The DCT analysis cannot account for the full range of embedded construction data, whereas the Case-by-Agree account does

\*Thank you to Julie Anne Legate and Martin Salzmann for guidance and discussion. Thank you also to Lefteris Paparounas, Athulya Aravind, the Penn field methods class, and the Penn Syntax Reading Group for lively discussion. I am very grateful for my consultants: Aiyyna Sleptsova, Maria Menkyarova, and their families, and my heart goes out to the Sakha people in this turbulent time. All errors are my own.

<sup>1</sup>Standard Leipzig glossing is used, except for the following: AOR=aorist, CVANT=converb of anteriority, CVSIM=converb of simultaneity, CVIMM=converb of immediate past, PRT=particle. I adopt Vinokurova's (2005) Romanization of Cyrillic, where q = [ɣ]~[ʁ] and y = [i]~[u]. Long vowel phonemes are represented as doubles (e.g. aa = [a:]), consistent with the orthography.

## Roadmap

- §2 Complementizer *dien* vs. converb *di-en*
- §3 Accusative case in converb *di-en* constructions
- §4 Accusative case in complementizer *dien* constructions
- §5 Dependent Case vs. Case-by-Agree
- §6 Conclusion

## 2 Complementizer *dien* vs. Converb *di-en*

- Like many Turkic languages, the complementizer *dien* is historically derived from the converb of anteriority form of the verb of saying, *di-en* ‘say-CVANT’ (Baker 2011)<sup>2</sup>
- Four tests to distinguish the complementizer *dien* from the converb *di-en*:
  1. **Subject agreement morphology**
  2. **Semantic restriction on subjects**
  3. Insertion of the word *baran* ‘after’<sup>3</sup>
  4. Replacement with other converb forms<sup>4</sup>

⇒ Adjunct clauses have converb *di-en* and verb complement clauses have complementizer *dien*

### 2.1 Subject agreement morphology

- Converbs can optionally have subject agreement morphology (Pakendorf 2007)<sup>5</sup>...

- (3) Sahyl-lar kihi iher-in keor-eon-**ner** kuot-an xaal-byt-tar  
fox-PL man come-3SP.ACC see-CVB-3PL run-CVB stay-PST-3PL  
‘The foxes, after seeing the man coming, ran away.’

... while complementizers cannot

- (4) a. oqo-lor jie-ge kel-bit-ter dien-(\***ner**) surax kyrjyk  
child-PL home-DAT come-PST-3PL COMP-3PL rumor true  
‘The rumor that the children came home is true.’  
b. oqo jie-ge kel-bit-ter dien-(\***ner**) surax-tar kyrjyk  
child home-DAT come-PST-3PL COMP-3PL rumor-PL true  
‘The rumors that the child came home are true.’

- DIEN in adjunct clauses can optionally have subject agreement...

- (5) a. Min ehigi-(ni) kel-iex-xit di-en jie-ni xomuy-d-um  
1SG 2PL-ACC come-FUT-2PL say-CVANT house-ACC tidy-PST-1SG  
‘I, (saying) you all would come, tidied the house.’  
b. Min ehigi-(ni) kel-iex-xit di-em-**min** jie-ni xomuy-d-um  
1SG 2PL-ACC come-FUT-2PL say-CVANT-1SG house-ACC tidy-PST-1SG  
‘I, (saying) you all would come, tidied the house.’

<sup>2</sup>More on the converb of anteriority in the Appendix in Section 7.1.1

<sup>3</sup>Data for this test are in the Appendix in Section 7.1.4

<sup>4</sup>Data for this test are in the Appendix in Section 7.1.5

<sup>5</sup>More on the agreement paradigm in the Appendix in Section 7.1.2

- c. \*Min ehigi-(ni) kel-iex-xit di-en'-n'it jie-ni xomuy-d-um  
 1SG 2PL-ACC come-FUT-2PL say-CVANT-2PL house-ACC tidy-PST-1SG  
 'I, (saying) you all would come, tidied the house.'

... while DIEN in complement clauses cannot<sup>6</sup>

- (6) a. min ehigi-(ni) kel-iex-xit dien bil-bit-im  
 1SG 2PL-ACC come-FUT-2PL COMP know-PST-1SG  
 'I knew that you would come.'  
 b. min ehigi-(ni) kel-iex-xit diem-min bil-bit-im  
 1SG 2PL-ACC come-FUT-2PL DIEN-1SG know-PST-1SG  
 'I, after saying that you would come, realized (something else).'  
 NOT: 'I knew that you would come.'  
 c. \*min ehigi-(ni) kel-iex-xit dien'-n'it bil-bit-im  
 1SG 2PL-ACC come-FUT-2PL DIEN-2PL know-PST-1SG  
 'I knew that you would come.'

⇒ Adjunct clauses have converb *di-en* and verb complement clauses have complementizer *dien*

## 2.2 Semantic restriction on subjects

- The subject of the converb event is controlled by the subject of the matrix event (Haspelmath and König 2020; Petrova 2011)<sup>7</sup>

- (7) Itini бүтєr-en min sarsyn bar-ya-m  
 after finish-CVANT 1SG tomorrow leav-FUT-1SG  
 'After finishing that, I will leave tomorrow.' (Petrova 2011, 294a)

- The matrix subject of an adjunct clause construction is restricted to entities that can speak, (8), just like matrix verb 'say', (9)

- (8) oqo/#sylgy ehigi-(ni) beqehee aan-y sap-patax-xyt di-en xahaa-ttan bar-byt  
 child/horse 2PL-ACC yesterday gate-ACC close-NEG.PST-2PL say-CVANT stable-ABL leave-PST

'The child/#horse, (saying) that you didn't close the gate yesterday, left the stable.'

- (9) oqo/#sylgy ehigi-(ni) beqehee aan-y sap-pat-ax-xyt die-bit  
 child/horse 2PL-ACC yesterday gate-ACC close-NEG-PST-2PL say-PST  
 'The child/#horse said you didn't close the gate yesterday.'

- The restriction goes away when the *di-en* clause is replaced with a nominalized participial clause

- (10) sylgy [ ehigi aan-y sap-patax-xyt ]-yttan xahaa-ttan bar-byt  
 horse [ 2PL gate-ACC close-NEG.PST-2PL ]-ABL stable-ABL leave-PST  
 'The horse, because you didn't close the gate, left the stable.'  
 (lit: 'from you not closing the gate.')

<sup>6</sup>Moreover, this subject agreement morphology is available for the VP-level converbs, (i), so the lack of availability of agreement suggests that this *dien* is not a converb.

(i) Min suur-em-min kel-bit-im  
 1SG run-CVANT-1SG come-PST-1SG  
 'I came running.'

<sup>7</sup>More on the subject control in converb phrases is in the Appendix in Section 7.1.3

- The matrix subject of the complement clause construction does not have such a restriction

- (11) oqo/sylgy ehigi-(ni) kel-bik-kit      dien   bil-er  
 child/horse 2PL-ACC come-PST-2PL COMP know-AOR  
 ‘The child/horse knows that you came.’

⇒ Adjunct clauses have converb *di-en* and verb complement clauses have complementizer *dien*

### 2.3 Interim conclusion

<i>Test</i>	Complement <i>dien</i>	Converb <i>di-en</i>
Subject agreement	*	✓
Semantic restriction	No restriction	Restricted to speaking entities
<i>baran</i> ‘after’	*	✓
Other converbs	*	✓

Table 1: Diagnostics for distinguishing converb *di-en* from complementizer *dien*

⇒ Adjunct clauses have converb *di-en* and verb complement clauses have complementizer *dien*

## 3 Accusative case in converb phrases

Accusative case on the embedded subject of the adjunct converb *di-en* clauses comes from the converb *di-en* ‘say-CVANT’ via ECM

- **Motivation**

1. Matrix *di-* ‘say’ optionally assigns accusative case to the embedded subject of its CP complement

- (12) Masha Misha-(**ny**) kel-ie      **die**-bit  
 Masha Misha-ACC come-FUT say-PST.3SG  
 ‘Masha said Misha will come.’

2. Co-occurrence of converb *di-en* and accusative case: when a verbal form of *di-* ‘say’ is not present, accusative case on the embedded subject is unavailable<sup>8</sup>

We will look at these more in §5 with data.

- **Evidence for ECM:** accusative-marked embedded subject is located within the complement clause of ‘say’

- Embedded subject is in the embedded clause

1. **Local scrambling of embedded locatives**
2. Scrambling the entire *di-en* clause
3. Coordination
4. NPI

- Embedded subject cannot raise into the matrix clause

1. **Condition A**

<sup>8</sup>Data for this claim can be found in the Appendix in Section 7.2.1 and Section 7.6.2

Construction	Has <i>di-</i> ‘say’	ACC
Matrix say	✓	✓
Adjunct <i>di-en</i> clause	✓	✓
Adjunct participial clause	✗	*
Noun complement clause	✗	*
<i>Glad</i> -type complement clause	✗	*
<i>Glad</i> -type <i>di-en</i> clause	✓	✓
<i>Glad</i> -type participial clause	✗	*
Other converb clause	✓	✓

Table 2: The availability of accusative case on the embedded subject of various embedded constructions

2. Gapping<sup>9</sup>
3. No matrix scrambling of embedded subject<sup>10</sup>
4. Stranding in scrambling<sup>11</sup>

### 3.1 Embedded subject is in the embedded clause

#### 3.1.1 Local scrambling of embedded locatives

##### Adjunct converb *di-en* clause construction

- The Condition on Extraction Domains (CED) predicts that extraction from the adjunct island is not allowed

- (13) \*Masha ayan-tan jie-ni [kergen-e/in *t\_ayan* sarsyn teonn-ue di-en ]  
Masha trip-ABL house-ACC [husband-NOM/ACC *t\_trip* tomorrow return-FUT say-CVANT ]  
suui-da  
clean-PST  
‘Masha, saying that (her) husband will return from a trip tomorrow, cleaned her house.’

- Raising the locative above the embedded subject is allowed; the embedded subject must be within that adjunct clause

- (14) Masha [ ayan-tan **kergen-e/in** *t\_ayan* sarsyn teonn-ue di-en ] jie-ni  
Masha [ trip-ABL husband-NOM/ACC *t\_trip* tomorrow return-FUT say-CVANT ] house-ACC  
suui-da  
clean-PST  
‘Masha, saying that (her) husband will return from a trip tomorrow, cleaned the house.’

##### Matrix ‘say’ construction

- Sakha does not have long-distance scrambling

- (15) \*Masha ayan-tan miexe [ kergen-e/in *t\_ayan* sarsyn teonn-ue ] die-bite  
Masha trip-ABL 1SG.DAT [ husband-NOM/ACC *t\_trip* tomorrow return-FUT ] say-FUT  
‘Masha said that (her) husband will return from a trip tomorrow.’

- The locative can scramble above the embedded subject without resulting in a long-distance scrambling violation

<sup>9</sup>Data for this test are in the Appendix in Section 7.2.2

<sup>10</sup>Data for this test are in the Appendix in Section 7.2.3

<sup>11</sup>Data for this test are in the Appendix in Section 7.2.4

- (16) Masha [ ayan-tan **kergen-e/in** *t<sub>ayan</sub>* sarsyn teonn-ue ] die-bite  
 Masha [ trip-ABL husband-NOM/ACC *t<sub>trip</sub>* tomorrow return-FUT ] say-FUT  
 ‘Masha said that (her) husband will return from a trip tomorrow.’

⇒ Embedded subject is in the embedded clause of ‘say’

### 3.1.2 Scrambling the *di-en* phrase

- For adjunct *dien* constructions, the entire converb *di-en* clause can scramble to the front. The embedded subject, regardless of the case, is moved along with the clause.

- (17) a. [[ kergene ayan-tan sarsyn teonn-ue ] di-en ] Masha *t<sub>dien</sub>*  
 [[ husband.NOM trip-ABL tomorrow return-FUT ] say-CVANT ] Masha *t*  
 jie-ni suui-da  
 house-ACC.3S.POSS clean-PST  
 ‘Saying that (her) husband would return from a trip tomorrow, Masha cleaned the house.’
- b. [[ kergen-in ayan-tan sarsyn teonn-ue ] di-en ] Masha *t<sub>dien</sub>*  
 [[ husband-ACC trip-ABL tomorrow return-FUT ] say-CVANT ] Masha *t*  
 jie-ni suui-da  
 house-ACC.3S.POSS clean-PST  
 ‘Saying that (her) husband would return from a trip tomorrow, Masha cleaned the house.’

⇒ Embedded subject is in the embedded clause of ‘say’

### 3.1.3 Coordination

- When embedded clauses of ‘say’ are coordinated, regardless of case on the embedded subject of the first conjunct, the embedded subject of the second conjunct can have nominative or accusative case.

- (18) a. Kim da(qany) [ **Ayaana** yll-ya-khtaakh ], otton [ **Sardaana-Ø/ny**  
 who PRT [ Ayaana[NOM] sing-FUT-must ] and [ Sardaana-NOM/ACC  
 un’kuul-ueo-khteekh ] die-bete5e  
 sing-FUT-must ] say-NEG.PST  
 ‘No one said that Ayaana must sing and Sardaana must dance.’
- b. Kim da(qany) [ **Ayaana-ny** yll-ya-khtaakh ], otton [ **Sardaana-Ø/ny**  
 who PRT [ Ayaana-ACC sing-FUT-must ] and [ Sardaana-NOM/ACC  
 un’kuul-ueo-khteekh ] die-bete5e  
 sing-FUT-must ] say-NEG.PST  
 ‘No one said that Ayaana must sing and Sardaana must dance.’
- c. ...ol eren min Ayaana-(ny) yll-ya-khtaakh die-bit-im, otton en Sardaana-ny  
 ...but 1SG Ayaana-ACC sing-FUT-must say-PST-1SG, and 2SG Sardaana-ACC  
 un’kuul-ueo-khteekh die-bit-in  
 dance-FUT-must say-PST-2SG  
 ‘...but I said that Ayaana must sing and you said that Sardaana must dance’ (a)✓, (b)✓

⇒ Embedded subject is in the embedded clause of ‘say’

### 3.1.4 NPI

- The NPI *kim da(qany)*, ‘who PRT,’ which means it is licensed by negation on the verb (Baker and Vinokurova 2010; Kirby 2021).

- (19) a. kim da(qany) kel-beteqe  
           who PRT       come-NEG.PST  
           ‘No one came.’  
       b. \*kim da(qany) kel-bite  
           who PRT       come-PST  
           ‘No one came.’

- The NPI is licensed only with clause-mate negation

- (20) a. \*Min kim-n’e da(qany) [ kel-bet       dien ] et-ti-m  
           I    who-DAT PRT   [ come-NEG.AOR DIEN ] tell-PST-1SG  
           ‘I told no one to come.’ (lit. ‘I told anyone that they should not come.’)  
       b. Min kim-n’e da(qany) [ kel-er       dien ] ep-pete5-im  
           I    who-DAT PRT   [ come-AOR DIEN ] tell-NEG.PST-1SG  
           ‘I did not tell anyone to come.’ (lit. ‘I did not tell anyone that they should come.’)

### Adjunct converb *di-en* clause construction

- The NPI, regardless of case marking, is not licensed by negation on the matrix verb, (21-a), or on the converb, (21-b); rather, it is licensed only by negation on the embedded verb, (21-c).

- (21) a. \*Min [ **kim-(i)** da kel-ie       di-en       ] jie-bin       suii-bataq-ym  
           1SG [ who-ACC PRT come-FUT say-CVANT ] house-1SG.POSS.ACC clean-PST.NEG-1SG  
           ‘I did not clean the house saying that anyone would come.’  
       b. \*Min [[ **kim-(i)** da kel-ie       ] die-bekke       ] jie-bin       suii-but-um  
           1SG [[ who-ACC PRT come-FUT ] say-CVB.NEG ] house-1SG.POSS.ACC clean-PST-1SG  
           ‘I cleaned the house without saying that anyone would come.’  
       c. Min [ **kim-(i)** da kel-bet       ] di-en       jie-bin       suii-but-um  
           1SG [ who-ACC PRT come-NEG.AOR ] say-CVANT house-1SG.POSS.ACC clean-PST-1SG  
           ‘I cleaned the house saying that no one came.’

### Matrix ‘say’ construction

- The NPI is not licensed by negation on the matrix verb

- (22) a. ??Aisen [ **kim** da uchutaal-tan kinige-ni uor-but ] die-betex  
           Aisen [ who PRT teacher-ABL book-ACC steal-PST ] say-NEG.PST  
           ‘Aisen didn’t say that anyone stole the book from the teacher.’ (he just implied it)  
       b. \*Aisen [ **kim-i** da uchutaal-tan kinige-ni uor-but ] die-betex  
           Aisen [ who-ACC PRT teacher-ABL book-ACC steal-PST ] say-NEG.PST  
           ‘Aisen didn’t say that anyone stole the book from the teacher.’ (he just implied it)

- The NPI is licensed by negation on the embedded verb

- (23) Aisen [ **kim-(i)** da uchutaal-tan kinige-ni uor-bataqa ] die-bite  
           Aisen [ who-ACC PRT teacher-ABL book-ACC steal-NEG.PST ] say-PST  
           ‘Aisen said that no one stole the book from the teacher (the book was just misplaced).’

⇒ Embedded subject is in the embedded clause of ‘say’

## 3.2 Condition A

- Reciprocals<sup>12</sup> must be bound locally

<sup>12</sup>We use reciprocals rather than reflexives due to the logophoric interpretations of reflexives that may be confounding.

- A reciprocal that is the embedded object cannot be bound by a matrix subject

- (24) \*Aita uonna Misha min beie-beie-ler-in keor-but-um dien bil-bit-tere  
 Aita and Misha 1SG self-self-3PL-ACC see-PST-1SG COMP know-PST-3PL  
 ‘Aita and Misha know that I saw each other (the other).’ (i.e. Aita knows that I saw Misha,  
 and Misha knows that I saw Aita)

#### Adjunct converb *di-en* clause construction

- When the reciprocal is the embedded subject, the result is ungrammatical because it is not bound by a local antecedent (either the matrix subject or the controlled subject of the converb ‘say’)

- (25) a. \*Aisen uonna Sardaana [PRO [ **beie-beie-ler-e** yalj-yax-tara ] di-en ]  
 Aisen and Sardaana [PRO [ self-self-3PL.POSS-NOM sick-FUT-3PL ] say-CVANT ]  
 salaamat on’or-but-tara  
 porridge make-PST-3PL  
 ‘Aisen and Sardaana both made porridge fearing that each other would fall sick.’  
 b. ??Aisen uonna Sardaana [PRO [ **beie-beie-ler-in** yalj-yax-tara ] di-en ]  
 Aisen and Sardaana [PRO [ self-self-3PL.POSS-ACC sick-FUT-3PL ] say-CVANT ]  
 salaamat on’or-but-tara  
 porridge make-PST-3PL  
 ‘Aisen and Sardaana both made porridge fearing that each other would fall sick.’

- In contrast, when the reciprocal is a matrix object, the result is grammatical because it is bound by a local antecedent

- (26) Aisen uonna Sardaana **beie-beie-ler-iger** [[ yalj-yax-tara ] di-en ] salaamat  
 Aisen and Sardaana self-self-3PL.POSS-DAT [[ sick-FUT-3PL ] say-CVANT ] porridge  
 on’or-but-tara  
 make-PST-3PL  
 ‘Aisen and Sardaana made porridge for each other fearing that they would fall sick.’

#### Matrix ‘say’ construction

- When reciprocal is the embedded subject, the result is ungrammatical because it is not bound by a local antecedent (the matrix subject)

- (27) a. \*Misha uonna Sardaana [ **beie-beie-ler-e** yalj-byt-tara ] diebittere.  
 Misha and Sardaana [ self-self-PL-NOM be.sick-PST-PL ] say-PST-3PL  
 ‘Misha and Sardaana said that each other got sick.’  
 b. \*Misha uonna Sardaana [ **beie-beie-ler-in** yalj-byt-tara ] diebittere.  
 Misha and Sardaana [ self-self-PL-ACC be.sick-PST-PL ] say-PST-3PL  
 ‘Misha and Sardaana said that each other got sick.’

- In contrast, when the reciprocal is matrix indirect object, the result is grammatical because it is bound by a local antecedent

- (28) Misha uonna Sardaana **beie-beie-ler-iger** [ yalj-byt-tara ] diebittere.  
 Misha and Sardaana self-self-PL-DAT [ be.sick-PST-PL ] say-PST-3PL  
 ‘Misha and Sardaana said to each other that they got sick.’

⇒ Embedded subject cannot be in the matrix clause



### 3.3 Analysis of accusative case

- Embedded subject is in the embedded clause

		Scrambling		Coordination	Matrix	NPI	
		Local locatives	Move with emb. clause		Matrix Matrix	say say	Embedded Embedded
Adjunct	NOM	✓(14),	✓(17)	–	* (21-a),	* (21-b),	✓(21-c),
<i>dien</i>	ACC	✓(14),	✓(17)	–	* (21-a),	* (21-b),	✓(21-c),
Matrix	NOM	✓(16)	–	✓NOM/ (88-a)	–	?? (22-a)	✓(23)
‘say’				✓ACC			
	ACC	✓(16)	–	✓NOM/ (88-b)	–	*(22-b)	✓(23)
				✓ACC			

Table 3: Test results for matrix ‘say’ and converb ‘say’ constructions showing that the embedded subject is inside the embedded clause.

- Embedded subject is not in the matrix clause

		Cond A	Gapping	Scrambling	
				Long-distance	Stranding
Adjunct	NOM	* (25-a)	* (80-a)	* (82)	* (84)
<i>dien</i>	ACC	* (25-b)	* (80-b)	* (82)	* (84)
Matrix	NOM	* (27-a)	* (81-a)	* (83)	* (85)
‘say’	ACC	* (27-b)	* (81-b)	* (83)	* (85)

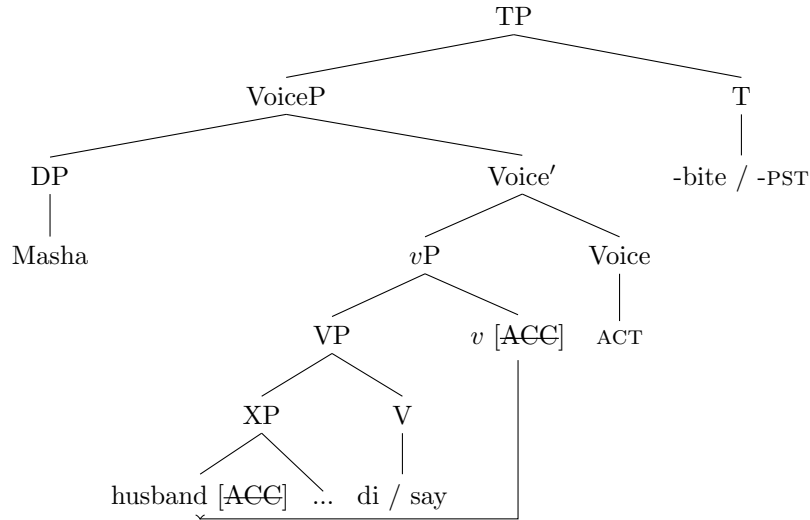
Table 4: Test results for matrix ‘say’ and converb ‘say’ constructions showing that the embedded subject is not in the matrix clause

(29) *The Phase Impenetrability Condition (PIC)*

In phase  $\alpha$  with head  $H$ , the domain of  $H$  is not accessible to operations outside  $\alpha$ , only  $H$  and its edge are accessible to such operations. (Chomsky 2000 [1998], ex. 21)

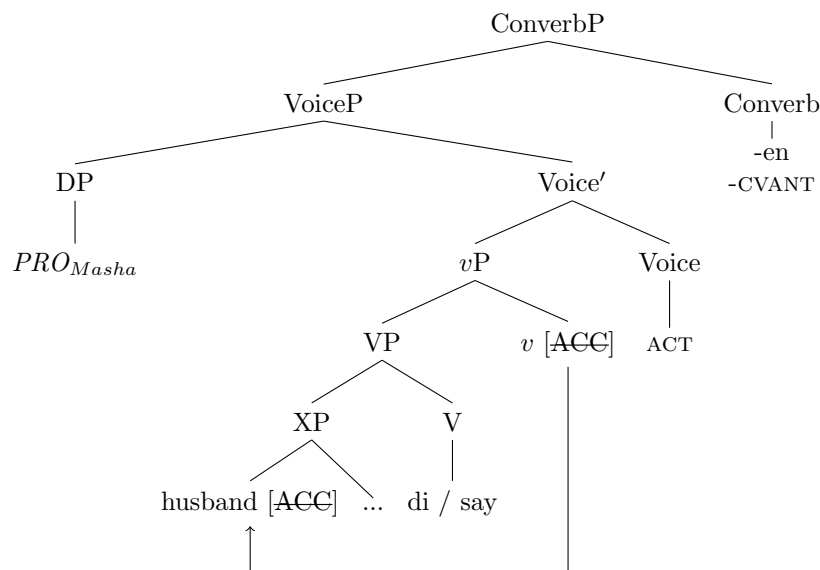
### Matrix ‘say’ construction

- (30) a. Masha **ker-gen-in** **ayan-tan** **sarsyn** **teonn-ue** **die-bit**  
 Masha husband-ACC trip-ABL tomorrow return-FUT say-PST  
 ‘Masha said that (her) husband would return from a trip tomorrow.’  
 b.



### Adjunct converb *di-en* clause construction

- (31) a. Masha **ker-gen-in** **ayan-tan** **sarsyn** **teonn-ue** **di-en** jie-ni suui-da  
 Masha husband-ACC trip-ABL tomorrow return-FUT say-CVANT house-ACC clean-PST  
 ‘Masha, saying that (her) husband would return from a trip tomorrow, cleaned the house.’  
 b.



⇒ Accusative case on the embedded subject of the complement clause of ‘say’ comes from the verb of saying (matrix ‘say’ or converb *di-en* ‘say-CVANT’) via ECM

## 4 Accusative case in complement clauses

Accusative case on the embedded subject of the verb complement clause comes from the matrix verb via ECM and optional raising-to-object

- Verb complement clauses (which lack the converb *di-en*)

- (32) Masha ehigi-(ni) kel-bikkit dien bil-bite  
 Masha 2PL-ACC come-2PL COMP know-PST  
 ‘Masha knew that you came.’

- **Motivation**

1. Passivization

- Matrix passive results in a loss of accusative case marking

- (33) a. En chaasky-ny alja-p-pyt-yn  
 2SG cup-ACC break-CAUS-PST-2SG  
 ‘You broke the cup.’  
 b. chaasky-(\*ny) aljat-ylyn-na  
 cup-ACC break-PASS-PST  
 ‘The cup was broken.’

- Passivizing the matrix verb results in a loss of accusative case marking on the embedded subject

- (34) a. Masha ehigi-(ni) kel-bik-kit dien bil-bite  
 Masha 2PL-ACC come-PST-2PL COMP know-PST  
 ‘Masha knew that you came.’  
 b. ehigi-(\*ni) kel-bik-kit dien b-illi-bite  
 2PL-ACC come-PST-2PL COMP know-PASS-PST  
 ‘It was known that you came.’

2. Participial clauses

- In contrast to adjunct participial clauses, which don’t allow accusative case marking on the embedded subject...

- (35) Masha Misha-(\*ny) kel-en ih-er-itten jie-tin  
 Masha Misha-ACC come-CVANT come-AOR.3SG-ABL house-3S.POSS.ACC  
 xomuy-but  
 tidy-PST  
 ‘Masha tidied the house because of Misha’s coming.’ (lit. from Misha’s coming)

...complement participial clauses allow for accusative case on the embedded subject

- (36) Masha ehigi-(**ni**) kel-bik-kit-in bil-bite  
 Masha 2PL-ACC come-PST-2PL-ACC know-PST  
 ‘Masha knew that you came’  
 (lit. ‘Masha knew your coming.’)

- **Evidence for ECM with optional raising-to-object:** accusative-marked “embedded subject” can be in the embedded clause or in the matrix clause
  1. Accusative-marked “embedded subject” is in the embedded clause
    - (a) **Local scrambling of locatives**
    - (b) Scrambling the entire *di-en* clause<sup>13</sup>
    - (c) Coordination<sup>14</sup>
  2. Accusative-marked “embedded subject” can be in the matrix clause
    - (a) **Condition A**
    - (b) Gapping
    - (c) Local matrix scrambling of “embedded subject”
    - (d) Stranding in scrambling
  3. Accusative-marked “embedded subject” is not a proleptic object
    - (a) **Specificity**
    - (b) Relations to non-subject entities<sup>15</sup>
    - (c) Overt pronoun<sup>16</sup>
    - (d) Quantifier scope<sup>17</sup>
    - (e) Respects coordinate structure constraint<sup>18</sup>

#### 4.1 Local scrambling of embedded locatives

- No long-distance scrambling in Sakha, for *dien* constructions and for participial clause constructions
  - (37) \*Boston-n’a Ayaana [ Misha ehiil  $t_{Boston}$  kelie dien ] bil-bite  
 Boston-DAT Ayaana [ Misha next.year  $t_{Boston}$  come-FUT COMP ] know-PST  
 ‘Ayaana knew that Misha will come to Boston next year.’
  - (38) \*Boston-n’a Ayaana [ Misha-(ny) ehiil  $t_{Boston}$  kel-er ]-in bil-bite  
 Boston-DAT Ayaana [ Misha-ACC next.year  $t_{Boston}$  come-AOR.3SG ]-ACC know-PST  
 ‘Ayaana knew that Misha is coming to Boston next year.’
- Given that scrambling locatives across the embedded subject is grammatical, we can infer that they are still within the embedded clause, (39).
  - (39) Ayaana [ Boston-n’a Misha-(ny) ehiil  $t_{Boston}$  kel-ie dien ] bil-bite  
 Ayaana [ Boston-DAT Misha-ACC next.year  $t_{Boston}$  come-FUT COMP ] know-PST  
 ‘Ayaana knew that Misha will come to Boston next year.’
  - (40) Ayaana [ Boston-n’a Misha-(ny) ehiil  $t_{Boston}$  kel-er ]-in bil-bite  
 Ayaana [ Boston-DAT Misha-ACC next.year  $t_{Boston}$  come-AOR.3SG ]-ACC know-PST  
 ‘Ayaana knew that Misha is coming to Boston next year.’

⇒ Accusative “embedded subject” can be in the embedded clause

<sup>13</sup>Data for this test are in the Appendix in Section 7.3.1

<sup>14</sup>Data for this test are in the Appendix in Section 7.3.2

<sup>15</sup>Data for this test are in the Appendix in Section 7.3.3

<sup>16</sup>Data for this test are in the Appendix in Section 7.3.4

<sup>17</sup>Data for this test are in the Appendix in Section 7.3.5

<sup>18</sup>Data for this test are in the Appendix in Section 7.3.6

## 4.2 Accusative-marked “embedded subject” can be in matrix clause

### 4.2.1 Condition A

- Recall that a reciprocal must be bound locally
- Whereas the sentence with the nominative reciprocal is ungrammatical, we find that the sentence with the accusative-marked reciprocal is grammatical since it is bound by a local antecedent: the matrix subject

- (41) a. \*Aisen uonna Sayaana [beie-beie-lerie                    jie-qe       kel-lel-ler        dien ]  
           Aisen and    Sayaana [self-self-3PL.POSS.NOM home-DAT come-FUT-3PL COMP ]  
           bil-bit-tere  
           know-PST-3PL  
           ‘Aisen and Sayaana knew that each other would come home.’  
       b. Aisen uonna Sayaana beie-beie-lerin                    [jie-qe       kel-lel-ler        dien ]  
           Aisen and    Sayaana self-self-3PL.POSS.ACC [home-DAT come-FUT-3PL COMP ]  
           bil-bit-tere  
           know-PST-3PL  
           ‘Aisen and Sayaana knew that each other would come home.’
- (42) a. \*Aisen uonna Sayaana [ beie-beie-lerie                    jie-5e       kel-lel-ler        ]-in  
           Aisen and    Sayaana [ self-self-3PL.POSS.NOM home-DAT come-FUT-3PL -]ACC  
           bil-bit-tere  
           know-PST-3PL  
           ‘Aisen and Sayaana knew that each other would come home.’  
       b. Aisen uonna Sayaana beie-beie-lerin                    [ jie-5e       kel-lel-ler        ]-in  
           Aisen and    Sayaana self-self-3PL.POSS.ACC [ home-DAT come-FUT-3PL ]-ACC  
           bil-bit-tere  
           know-PST-3PL  
           ‘Aisen and Sayaana knew that each other would come home.’

⇒ Accusative-marked “embedded subject” can be in the matrix clause

### 4.2.2 Gapping

- Turkish does not allow gapping of phrases in different clauses Ince 2007, 2009

- (43) \*Ali-Ø [Ahmet-in Ankara-ya gittiği]-ni sanıyor, Mehmet-Ø de Özgür-ün  
           Ali-NOM Ahmet-GEN Ankara-DAT went-ACC assuming-3SG, Mehmet-NOM also Özgür-GEN  
           Ankara-ya gittiği-ni sanıyor.  
           Ankara-DAT went-ACC assuming-3SG  
           ‘Ali thinks that Ahmet went to Ankara, and \*Mehmet (thinks) Özgür (went to Ankara).’ (Ince 2007: 24)

- In contrast, the accusative-marked object is in the matrix clause; thus, gapping is allowed

- (44) Ali-Ø Ahmet-i Ankara-ya gitti sanıyor, Mehmet-Ø de Özgür-ü  
           Ali-NOM Ahmet-ACC Ankara-DAT went-3SG assuming-3SG, Mehmet-NOM also Özgür-ACC  
           Ankara-ya gittiği-ni sanıyor.  
           Ankara-DAT went-ACC assuming-3SG  
           ‘Ali thinks that Ahmet went to Ankara, and Mehmet (thinks) Özgür (went to Ankara).’ (Ince 2007: 25)

- This test can also be used in Sakha. Elision must target a constituent, so if the remaining item is in the matrix clause, then gapping is okay

- (45) Min Sayaana-5a bar dien ep-pit-im, otton Keskil eyiekhe ~~bar dien ep-pit~~.  
 1SG Sayaana-DAT go COMP tell-PST-1SG and Keskil 2SG.DAT go COMP tell-PST  
 ‘I told Sayaana to go home, and Keskil (told) you (to go home).’

- Gapping is permitted with only the accusative-marked “embedded subject”

- (46) a. \*Min **Kesha** kel-bit dien bil-bit-im, onton en **Lyosha** ~~kel-bit~~  
 1SG Kesha come-PST.3SG COMP know-PST-1SG, and 2SG Lyosha come-PST.3SG  
~~dien bil-bit-in~~.  
 COMP know-PST-2SG  
 ‘I knew that Kesha came, and you (knew that) Lyosha (came).’  
 b. Min **Kesha-ny** [kel-bit dien ] bil-bit-im, onton en **Lyosha-ny**  
 1SG Kesha-ACC [come-PST.3SG COMP ] know-PST-1SG, and 2SG Lyosha-ACC  
~~kel-bit dien bil-bit-in~~.  
 come-PST.3SG COMP know-PST-2SG  
 ‘I knew that Kesha came, and you Lyosha.’
- (47) a. \*Min **Kesha** Boston’-n’a kel-bit-in bil-bit-im, onton en **Lyosha**  
 1SG Kesha Boston-DAT come-PST.3SG-ACC know-PST-1SG, and 2SG Lyosha  
~~kel-bit-in bil-bit-in~~.  
 come-PST.3SG-ACC know-PST-2SG  
 ‘I knew that Kesha came, and you Lyosha.’  
 b. Min **Kesha-ny** Boston’-n’a kel-bit-in bil-bit-im, onton en **Lyosha-ny**  
 1SG Kesha-ACC Boston-DAT come-PST.3SG-ACC know-PST-1SG, and 2SG Lyosha-ACC  
~~kel-bit-in bil-bit-in~~.  
 come-PST.3SG-ACC know-PST-2SG  
 ‘I knew that Kesha came, and you Lyosha.’

⇒ Accusative “embedded subject” can be in the matrix clause

#### 4.2.3 Matrix scrambling of “embedded object”

- Recall Sakha does not have long-distance scrambling
- the accusative-marked object can scramble locally within the matrix clause, while the unmarked (nominative) cannot, both for the *dien* clause and for the participial construction

- (48) Masha-\*(ny) Ayaana  $t_{Masha(ny)}$  [ ehiil Boston’-n’a kel-ie dien ] bil-bite  
 Masha-ACC Ayaana  $t_{Masha(ACC)}$  [ next.year Boston-DAT come-FUT COMP ] know-PST  
 ‘As for Masha, Ayaana knew that she will come to Boston next year.’
- (49) Masha-\*(ny) Ayaana  $t_{Masha(ny)}$  [ ehiil Boston’-n’a kel-er ]-in bil-bite  
 Masha-ACC Ayaana  $t_{Masha(ACC)}$  [ next.year Boston-DAT come-AOR.3SG ]-ACC know-PST  
 ‘As for Masha, Ayaana knew that she will come to Boston next year.’

⇒ Accusative “embedded subject” can be in the matrix clause

#### 4.2.4 Stranding in scrambling

- The entire *dien* clause or participial clause can be scrambled

- (50) [ Masha-(ny) ehiil Boston’-n’a kel-ie dien ] Ayaana  $t$  bil-bite  
 [ Masha-ACC next.year Boston-DAT come-FUT COMP ] Ayaana  $t$  know-PST  
 ‘Ayaana knew that Misha will come to Boston next year.’

- (51) [ Masha-(ny) ehiil Boston'-n'a kel-er ]-in Ayaana *t* bil-bite  
 [ Masha-ACC next.year Boston-DAT come-AOR.3SG ]-ACC Ayaana *t* know-PST  
 'Ayaana knew that Misha is coming to Boston next year.'

- When the complement clause is moved, the accusative-marked object can be left behind, while the unmarked (nominative) object cannot

- (52) [ ehiil Boston'-n'a kel-ie dien ] Ayaana Misha-\*(ny) *t* bil-bite  
 [ next.year Boston-DAT come-FUT.3SG COMP ] Ayaana Misha-ACC *t* know-PST  
 'I knew that Misha will come to Boston next year.'

- (53) [ ehiil Boston'-n'a kel-er ]-in Ayaana Misha-\*(ny) *t* bil-bite  
 [ next.year Boston-DAT come-AOR.3SG ]-ACC Ayaana Misha-ACC *t* know-PST  
 'I knew that Misha will come to Boston next year.'

⇒ Accusative “embedded subject” can be in the matrix clause

#### 4.3 “Embedded subject” is not a proleptic object: specificity

- Proleptic objects refer to specific entities, while raised objects do not have specificity restrictions (Salzmann 2006)
- The accusative-marked object does not necessarily have a specific reading

- (54) a. (min) kyyh-y laa5yr-tan bar-byt dien isti-bit-im... Kim buolaryn bil-e-bin  
 1SG girl-ACC camp-ABL leave-PST COMP hear-PST-1SG... who be know-AOR-1SG

‘I heard a girl left the camp... I know who it is’ (✓specific)

- b. (min) kyyh-y laa5yr-tan bar-byt dien isti-bit-im... xannyg-yn bil-bep-pim  
 1SG girl-ACC camp-ABL leave-PST COMP hear-PST-1SG... which-ACC know-NEG-1SG  
 ‘I heard a girl left the camp... I don’t know which’ (✓existential)

- (55) a. (min) kyyh-y laa5yr-tan bar-byt-yn isti-bit-im... Kim buolaryn  
 1SG girl-ACC camp-ABL leave-PST.3SG-ACC hear-PST-1SG... who be  
 bil-e-bin  
 know-AOR-1SG  
 ‘I heard a girl left the camp... I know who it is’ (✓specific)
- b. (min) kyyh-y laa5yr-tan bar-byt-yn isti-bit-im... xannyg-yn bil-bep-pin  
 1SG girl-ACC camp-ABL leave-PST.3SG-ACC hear-PST-1SG. which-ACC know-NEG-1SG  
 ‘I heard a girl left the camp... I don’t know which’ (✓existential)

⇒ Accusative-marked “embedded subject” is not a proleptic object ; it raises into the matrix clause

## 4.4 Summary

- Accusative-marked “embedded subject” can be in the embedded clause

		Scrambling		Coordination
		Local locatives	Move with emb. clause	
Complement	NOM	✓(39)	✓(86)	✓NOM/✓ACC(88)
<i>dien</i>	ACC	✓(39)	✓(86)	✓NOM/✓ACC (88)
Complement	NOM	✓(38)	✓(87)	✓NOM/✓ACC(89)
participial	ACC	✓(38)	✓(87)	✓NOM/✓ACC (89)

Table 5: Test results for complement clause constructions showing that the embedded subject can be in the embedded clause

- Accusative-marked “embedded subject” can be in the matrix clause, whereas the unmarked / nominative-marked one cannot

		Cond A	Gapping	Scrambling	
				Long-distance	Stranding
Complement	NOM	* (41-a)	* (46-a)	* (48)	* (52)
<i>dien</i>	ACC	✓(41-b)	✓(46-b)	✓(48)	✓(52)
Complement	NOM	* (42-a)	* (47-a)	* (49)	* (53)
participial	ACC	✓(42-b)	✓(47-b)	✓(49)	✓(53)

Table 6: Test results for complement clause constructions showing that the embedded subject can be in the matrix clause

- The accusative-marked “embedded subject” is not a proleptic object

Test	Examples
✓specific / ✓existential	(54), (55)
* related to non-subject entity	(90), (91)
*overt pronoun	(92), (93)
✓scope reconstruction	(94), (95)
✓respects CSC	(96), (97)

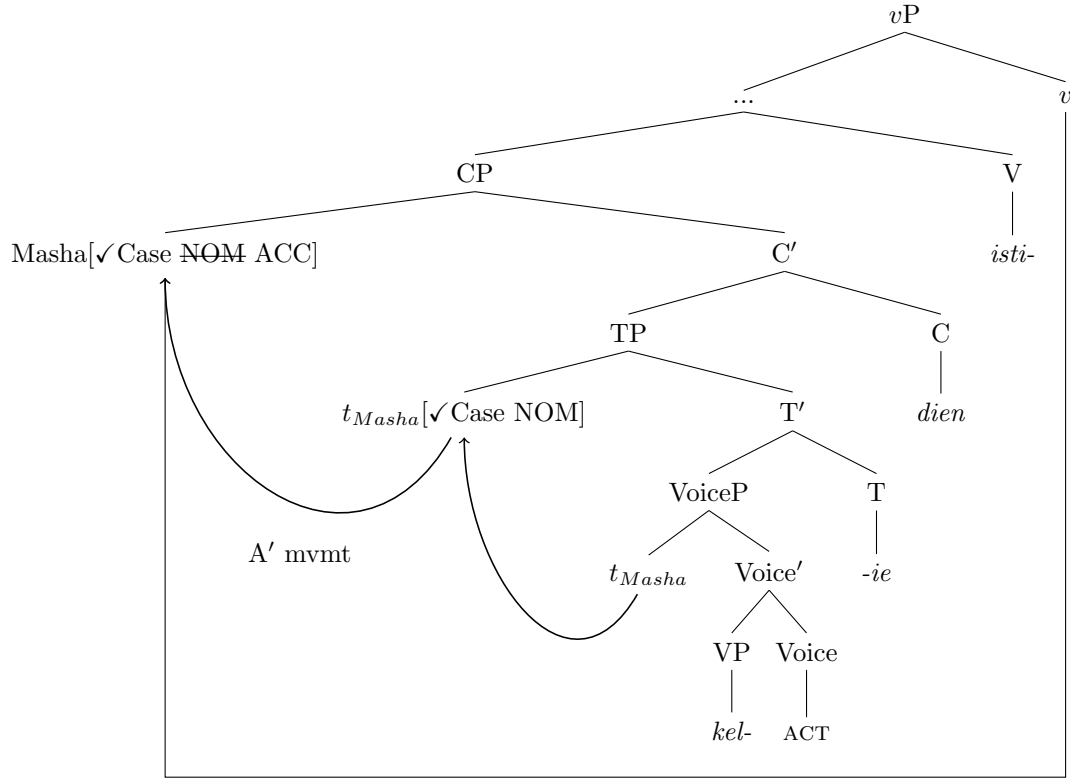
Table 7: Test results for proleptis vs. raising-to-object tests

## 4.5 Analysis

- We adopt Bruening 2001’s analysis of optional raising-to-object
  - The CP is a phase, which means that when its boundary is reached in the derivation, the contents are sent out and no longer are accessible in later steps of the derivation
  - Following the PIC, the material at the edge of the phase (i.e. the specifier positions) are accessible
  - The case feature has a delayed deletion after being checked, allowing its case to be overwritten, since the case feature is still active
  - The embedded subject can raise to the left edge to Spec,CP via A’-movement
  - From the Spec,CP position, the embedded subject can raise into the matrix clause via A-movement, allowing for reconstruction



- (56) a. Ayaana Misha-(ny) ehiil Boston-'n'a kel-ie dien isti-bite  
 Ayaana Misha-ACC next.year Boston-DAT come-FUT COMP hear-PST  
 'Ayaana heard that Misha will come to Boston next year.'  
 b.



## 5 The full distribution of accusative case

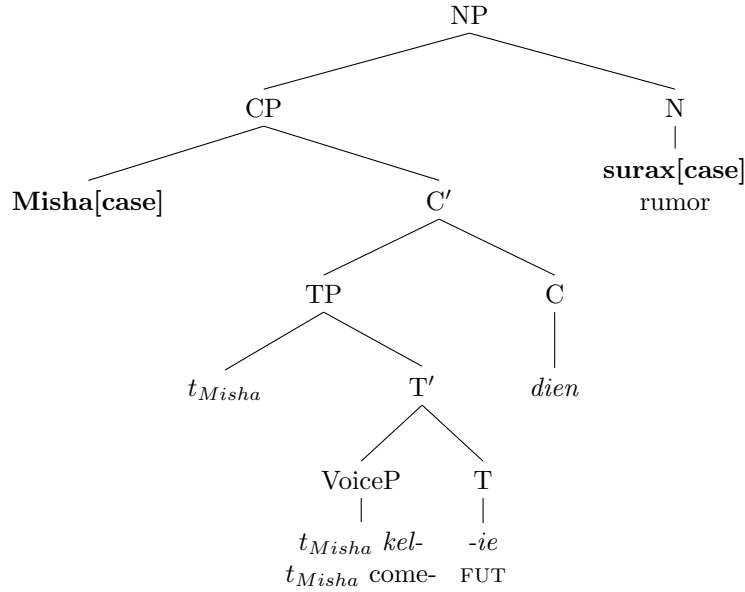
Construction	Clause type	ACC	Case-by-Agree	B&V
Noun complement clause	Complementizer <i>dien</i>	*		✓
Verbal complement	Complementizer <i>dien</i>	✓	matrix verb	✓
Verbal complement	Participial	✓	matrix verb	✓
Adjunct clause	Converb <i>di-en</i>	✓	converb <i>di-en</i>	✓
Adjunct clause	Participial	*		✓
<i>Glad</i> -type	Complementizer <i>dien</i>	*		✓
<i>Glad</i> -type	Converb <i>di-en</i>	✓	converb <i>di-en</i>	✓
<i>Glad</i> -type	Participial	*		✓
Other converb clause	Converb <i>di-CVB</i>	✓	converb	✓

Table 8: The various embedded constructions, the distribution of accusative case availability on the embedded subject, and our analyzed source of accusative case

### Noun complement clauses

- Consider the following noun complement clause

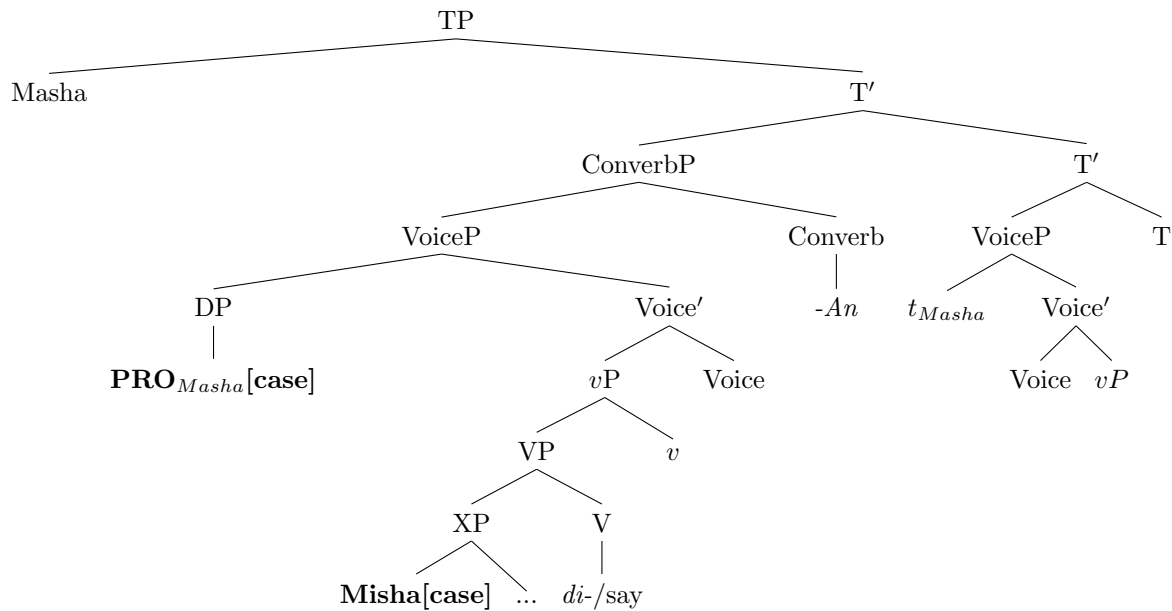
- (57) a. Misha-(\*ny) kel-ie      dien    surax kyrjyk  
 Misha-ACC   come-FUT COMP rumor true  
 ‘The rumor that Misha would come is true’  
 NOT: #the rumor, saying that Misha would come, is true  
 b.



#### Adjunct converb *di-en* clause

- Given the revised analysis of these clauses, not as CP's but rather as converb *di-en* clauses, the DCT analysis must be re-applied

(58)



## Adjunct participial clause

- Consider the following example:

(59) Masha Misha-(\*ny) kel-en ih-er-itten jie-tin xomuy-but  
Masha Misha-ACC come-CVANT come-AOR.3SG-ABL house-3S.POSS-ACC tidy-PST  
'Masha tidied the house because of Misha's coming.' (lit. from Misha's coming)

- B&V's analysis of adjunct *di-en* clauses as CP's indicates that their algorithm gives visibility into adjunct clauses
- Their analysis of verb participial complement clauses indicates that the embedded subject of participials can raise to be visible to case competitors
- Therefore, there shouldn't be anything blocking the embedded subject of an adjunct participial from raising into the edge of its clause and being visible → B&V incorrectly would predict that this gets accusative case

## 6 Conclusion

- There is a synchronic lexical ambiguity in Sakha between the complementizer *dien* and the converb *di-en* 'say-CVANT,' which correspond to two distinct embedded structures
  - The converb *di-en* heads a Converb Phrase that adjoins at the T' level
  - The complementizer *dien* heads a CP
- This work contributes to a larger discussion on "say" complementization
  - Other Turkic languages may not have complementizers (Major, submitted; Özyıldız 2016; i.a.)
  - Sakha differs in that it has a lexicalized complementizer that is distinct from the converb form
- We provide an analysis of accusative case using Agree with functional heads for each of the two structures under consideration
  - The source of accusative case in adjunct clauses is the converb *di-en*, assigned via ECM like matrix verb 'say'
  - The source of verb complement constructions is the matrix verb, assigned via ECM with optional raising-to-object

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## 7 Appendix

### 7.1 Complementizer vs Converb

#### 7.1.1 Converb Structure

- The converb of anteriority is marked by the suffix *-An* and marks an event that is interpreted to occur prior to the main event

(60) Sahyl-lar kihi ih-er-in keor-eon kuot-an xaal-byt-tar  
fox-PL man come-AOR-3S.POSS.ACC see-CVANT run-CVANT stay-PST-3PL  
‘The foxes, after seeing the man coming, ran away<sup>19</sup>.’

- These converb phrases are adjuncts, attaching at the T’ level.<sup>20</sup>
- The ConverbP contains a Voice projection:

1. The converb can have a distinct subject:

(61) Tahyrya ardakh tuh-en, salgyn yraahyr-byt  
outside rain fall-CVANT air clear-PST  
‘It rained outside, and the air cleared’ (Petrova 2011: 226a)

2. Passive morphology is available on the converb

(62) ihit suui-ull-an baran atyyla-m-myta  
dish clean-PASS-CVANT after clean-PASS-PST  
‘The dish was sold after it was cleaned’

3. The converb does not have tense morphology, and it is interpreted within the tense scope of the main event, (63).

(63) \*min suruk-tar-y be5ehee surui-an sarsyn yyt-ya-5ym  
1SG letter-PL-ACC yesterday write-CVANT tomorrow send-FUT-1SG  
(today I’m busy, so) ‘I wrote letters yesterday and will send them tomorrow.’

<sup>19</sup>The main verb *xaal-* ‘stay’ in combination with the converb *kuot-an* ‘run-CVANT’ means to run away

<sup>20</sup>The converb can also have a lower attachment site; it acts as a manner adverb and is interpreted as a VP-modifier, (i).

- (i) Min suur-en kel-bit-im  
1SG run-CVANT come-PST-1SG  
‘I came running.’

### 7.1.2 Subject agreement

- Converbs in Sakha can optionally have subject agreement:

	Singular		Plural	
	Fully inflected	Decomposed	Fully inflected	Decomposed
1st	di-em-min say-CVANT-1SG	di-An- <b>BIn</b>	di-em-mit say-CVANT-1PL	di-An- <b>BIt</b>
2nd	di-en-nin say-CVANT-2SG	di-An- <b>GIn</b>	di-en'-n'it say-CVANT-2PL	di-An- <b>GIt</b>
3rd	di-en say-CVANT[3SG]	di-An- $\emptyset$	di-en-ner say-CVANT-3PL	di-An- <b>lAr</b>

Table 9: Agreement paradigm for converbs, shown with the converbal form of ‘say.’

- The agreement morphology follows that of present tense agreement:

	Singular		Plural	
	Fully inflected	Decomposed	Fully inflected	Decomposed
1st	di-e-bin say-AOR-1SG	di-A- <b>BIn</b>	di-e-bit say-AOR-1PL	di-A- <b>BIt</b>
2nd	di-e-gin say-AOR-2SG	di-A- <b>GIn</b>	di-e-git say-AOR-2PL	di-A- <b>GIt</b>
3rd	di-ir say-AOR[3SG]	di-Ar	di-el-ler say-AOR-3PL	di-A- <b>lAr</b>

Table 10: Agreement paradigm for present tense, shown with the verb ‘say’

### 7.1.3 Subject control

Evidence for subject control

- Sakha is a *pro*-drop language: if the subject of the converb was *pro* instead of subject-controlled PRO, we would expect that in a sentence like (64), the subject of the converb clause could be *pro*-dropped

- (64) \**pro*<sub>oqolor</sub> oskuola-5a bar-an en ahaa-byt-yn  
*pro*<sub>children</sub> school-DAT go-CVANT 2SG eat-PST-2SG  
 ‘After they (your children) went to school, you ate breakfast.’  
 c.f. ✓‘After you went to school, you ate breakfast.’

- Adding plural subject agreement marginally approves the sentence, given the proper context; however, a different construction not including converbs is much more natural to convey this.

- (65) ??*pro*<sub>oqolor</sub> oskuola-5a bar-an-nar en ahaa-byt-yn  
*pro*<sub>children</sub> school-DAT go-CVANT-PL 2SG eat-PST-2SG  
 ‘After they (your children) went to school, you ate breakfast.’

### 7.1.4 Insertion of the word *baran* ‘after’

- The word *baran* ‘after’ acts as a postposition when preceded by a converb of anteriority (Petrova 2008)
- *baran* is available in adjunct clauses...

- (66) Masha Misha-(ny) kel-ie di-en baran jie-tin xomuy-da  
 Masha Misha-ACC come-FUT say-CVANT after house-3S.POSS-ACC tidy-PST  
 ‘Masha, after saying that Misha would come, tidied the house.’

...but not in a complement clause (it forces a different structure as seen by the changed interpretation)

- (67) Keskil Aisen-(ny) kel-bet dien baran bil-bite  
 Keskil Aisen-ACC come-NEG.AOR DIEN after know-PST  
 ‘Keskil, after saying that Aisen is not coming, realized (something else).’  
 NOT: ‘Keskil knew that Aisen is not coming.’

- Moreover, *baran*-insertion and subject agreement co-vary.

- (68) a. min Aisen-(ny) kel-bet diem-(\*min) bil-bit-im  
 1SG Aisen-ACC come-NEG.AOR DIEN-1SG know-PST-1SG  
 I knew that Aisen is not coming.  
 b. min Aisen-(ny) kel-bet dien/m-(min) baran bil-bit-im  
 1SG Aisen-ACC come-NEG.AOR DIEN-1SG after know-PST-1SG  
 ‘I, after saying that Aisen is not coming, realized (something else).’  
 NOT: ‘I knew that Aisen is not coming.’

⇒ Adjunct clauses have converb *di-en* and verb complement clauses have complementizer *dien*

### 7.1.5 Replacement with other converbal forms

- -*An* marks the converb of anteriority (CVANT) (Petrova 2011)
- There is a rich system of converbs in Sakha
  - -*A/I*, the converb of simultaneity (CVSIM), which undergoes full reduplication<sup>21</sup> (Petrova 2011)

- (69) Masha Misha-(ny) kel-ie dii-dii jie-tin xomuy-but  
 Masha Misha-ACC come-FUT say.CVSIM-say.CVSIM house-3S.POSS-ACC tidy-PST  
 ‘Masha tidied the house (while) saying that Misha will come.’

<sup>21</sup>Moreover, there is another complementizer, *dii*, which is used exclusively with the verb *san-* ‘think.’ This complementizer likely came from the converbal form of simultaneity, though unlike the converb, the complementizer is not fully reduplicated. The difference in reduplication in the complementizer versus the converb is an interesting overt morphological difference, as the lack of morphological reduplication typically entails a purposive reading, which is not present with the complementizer *dii* (Petrova 2011).

The complementizers cannot be used in place of the other (e.g. using *dien* in a complement clause of *san-* instead of *dii* is ungrammatical, (i)).

- (i) a. Masha Keskil-(i) kel-ie dii sanaa-byt  
 Masha Keskil-ACC come-FUT COMP think-PST  
 ‘Masha thought that Keskil would come.’  
 b. \*Masha Keskil-(i) kel-ie dien sanaa-byt  
 Masha Keskil-ACC come-FUT COMP think-PST  
 ‘Masha thought that Keskil would come.’

This further supports the findings of this test, as the verb may select for a specific complementizer, while it may not necessarily be able to select for a specific converb form. We leave further analysis of this complementizer for future research.



- *-At*, the converb of immediate precedence (CVIMM)

(70) Masha Misha-(ny) kel-ie      di-et      jie-tin      xomuy-but  
 Masha Misha-ACC come-FUT say-CVIMM house-3S.POSS-ACC clean-PST  
 ‘Masha tidied the house right after saying that Misha will come.’

- Replacing complementizer *dien* with other converb forms results in a different interpretation

- *-A/I*, the converb of simultaneity (CVSIM), which undergoes full reduplication

(71) Masha Misha-(ny) kel-ie      dii-dii      bil-bite  
 Masha Misha-ACC come-FUT say.CVSIM-say.CVSIM know-PST  
 ‘Masha realized (something else) while saying that Misha will come.’  
 NOT: ‘Masha knew that Misha will come.’

- *-At*, the converb of immediate precedence (CVIMM)

(72) Masha Misha-(ny) kel-ie      di-et      bil-bite  
 Masha Misha-ACC come-FUT say-CVIMM know-PST  
 ‘Masha realized (something else) right after saying that Misha will come.’  
 NOT: ‘Masha knew that Misha will come.’

⇒ Adjunct clauses have converb *di-en* and verb complement clauses have complementizer *dien*

## 7.2 Accusative case in converb phrases

### 7.2.1 Co-occurrence of ‘say’ and accusative case marking

#### Participial constructions

- Like many Turkic languages, Sakha has two strategies for clausal embedding; the first with the *dien*, and the second with nominalized embedded clauses

(73) Masha [Misha-(\*)ny] kel-en      ih-er      ]-itten jie-tin      xomuy-but  
 Masha [Misha-ACC come-CVANT come-AOR.3SG ]-ABL house-3S.POSS-ACC tidy-PST  
 ‘Masha tidied the house because Misha came (lit. from Misha’s coming).’

- Crucially, the embedded subject cannot be marked with accusative case
- This is unsurprising given our analysis that *di-en* is the source of accusative case
- With a DCT analysis, however, this data poses a serious problem, discussed in Section 5

#### Noun complement clauses

- Claim: *dien* in noun complement clauses is the complementizer rather than the converb *di-en*
  - Most nouns that take a complement clause are not entities that are capable of speaking (e.g. rumor, news, etc)

(74) a. #sonun Misha kel-ie      die-bit  
       news Misha come-FUT say-PST  
       ‘The news said that Misha will come.’  
       b. #surax Misha kel-ie      die-bit  
       rumor Misha come-FUT say-PST  
       ‘The rumor said that Misha will come.’

- The *dien* in noun complement clauses cannot have subject agreement morphology, repeated in (75)<sup>22</sup>.

- (75) a. oqo-lor jie-ge kel-bit-ter dien-(\***ner**) surax kyrjyk  
 child-PL home-DAT come-PST-3PL COMP-3PL rumor true  
 ‘The rumor that the children came home is true.’  
 b. oqo jie-ge kel-bit-ter dien-(\***ner**) surax-tar kyrjyk  
 child home-DAT come-PST-3PL COMP-3PL rumor-PL true  
 ‘The rumors that the child came home are true.’

- As predicted, and as noted previously by B&V, the embedded subject of complement clauses of nouns cannot receive accusative case

- (76) Misha-(\*ny) kel-ie dien surax kyrjyk  
 Misha-ACC come-FUT COMP rumor true  
 ‘The rumor that Misha would come is true’  
 NOT: #the rumor, saying that Misha would come, is true

- (77) (Min) Misha-(\*ny) teonnu-but dien sonun-u ih-it-tim  
 1SG Misha-ACC return-PST COMP news-ACC hear-PST-1SG  
 ‘I heard the news that Misha returned.’

### Other converbal forms of ‘say’

- With both the converbs of simultaneity, *dii-dii* ‘say.CVSIM-say.CVSIM,’ and of immediate precedence, *di-et* ‘say-CVIMM,’ the embedded subject can have accusative case marking

- (78) Masha Misha-(ny) kel-ie dii-dii jie-tin xomuy-but  
 Masha Misha-ACC come-FUT say.CVSIM-say.CVSIM house-3S.POSS-ACC tidy-PST  
 ‘Masha tidied the house (while) saying that Misha will come.’

- (79) Masha Misha-(ny) kel-ie di-et jie-tin xomuy-but  
 Masha Misha-ACC come-FUT say-CVIMM house-3S.POSS-ACC clean-PST  
 ‘Masha tidied the house right after saying that Misha will come.’

### 7.2.2 Gapping

- Recall that gapping can be used as a test for clause-matehood

### Adjunct converb *di-en* clause construction

- The adjunct clause and matrix verb cannot be elided to the exclusion of the embedded subject

- (80) a. \*Min [ **Kesha** kel-ie ] di-en jie-ni xomui-du-m, onton en [ **Lyosha**  
 1SG [ Kesha come-FUT ] say-CVANT house clean-PST-1SG and 2SG [ Lyosha  
 kel-ie ] ~~di-en~~ ~~jie-ni xomui-du-m~~  
 come-FUT ] say-CVANT house clean-PST-2SG  
 ‘I cleaned the house thinking Kesha would come, and you (cleaned the house thinking)  
 Lyosha (would come).’  
 b. \*Min [ **Kesha-ny** kel-ie ] dien jie-ni xomui-du-m, onton en [ **Lyosha-ny**  
 1SG [ Kesha-ACC come-FUT ] say-CVANT house clean-PST-1SG and 2SG [ Lyosha-ACC  
 kel-ie ] ~~di-en~~ ~~jie-ni xomui-du-m~~  
 come-FUT ] say-CVANT house clean-PST-2SG  
 ‘I cleaned the house thinking Kesha would come, and you (cleaned the house thinking)  
 Lyosha (would come).’  
 (c.f. ✓and you cleaned Lyosha)

<sup>22</sup>We use an example with rumors rather than news, because rumors can have plural morphology, but news cannot

### Matrix ‘say’ construction

- With the matrix say construction, the embedded clause and verb cannot be elided to the exclusion of the embedded subject<sup>23</sup>

- (81) a. \*En [ **Sardaana** uchutaal-tan kinige-ni uor-but ] die-bit-in’, otton Sardaana [ en  
2SG [ Sardaana teacher-ABL book-ACC steal-PST ] say-PST-2SG and Sardaana [ **2sg**  
uchutaal-tan kinige-ni uorbut ] die-bit  
teacher-ABL book-ACC steal-PST ] say-PST  
‘You said that Sardaana stole the book, and Sardaana (said that) you (stole the book).’
- b. \*En [ **Sardaana-ny** uchutaal-tan kinige-ni uor-but ] die-bit-in, otton Sardaana [ **2sg**  
2SG [ Sardaana-ACC teacher-ABL book-ACC steal-PST ] say-PST-2SG and Sardaana [ **eyiigin**  
2SG.ACC teacher-ABL book-ACC steal-PST ] say-PST  
‘You said that Sardaana stole the book, and Sardaana (said that) you (stole the book).’

⇒ Embedded subject cannot be in the matrix clause

### 7.2.3 No matrix scrambling of embedded subject

- Recall that Sakha does not allow long-distance scrambling, either for the matrix ‘say’ construction or out of the adjunct clause, respecting the Adjunct Island Constraint

### Adjunct converb *di-en* clause construction

- The embedded subject cannot raise out of the embedded clause, suggesting that it is in the adjunct island rather than the matrix clause

- (82) \*Masha **kergen-e/in** jie-ni  $t_{kergene}$  ayan-tan sarsyn teonn-ue di-en  
Masha husband-NOM/ACC house-ACC  $t_{husb.}$  trip-ABL tomorrow return-FUT say-CVANT  
suui-da  
clean-PST  
‘Masha, saying that (her) husband would return from his trip tomorrow, cleaned the house.’

### Matrix ‘say’ construction

- The embedded subject cannot be raised above a matrix argument; like the other elements of the embedded clause, the embedded subject is subject to long distance violations

- (83) \*Ayaana **kergen-e/in** miexe  $t_{kergen}$  ayan-tan sarsyn teonn-ue die-bite  
Ayaana husband-NOM/ACC 1SG.DAT  $t_{husb.}$  trip-ABL tomorrow return-FUT say-PST  
‘Ayaana said to me that (her) husband would return from his trip tomorrow.’

⇒ Embedded subject cannot be in the matrix clause

### 7.2.4 Stranding in scrambling

- If the embedded subject was actually in the matrix clause, we might expect it to be able to be stranded when either the adjunct converb *di-en* clause moves or when the embedded clause of ‘say’ moves

<sup>23</sup>It could be the case that the embedded subject is in the ConverbP. We do not yet have data with this test showing that the embedded subject must be in the embedded clause of ‘say.’

## Adjunct converb *di-en* clause construction

- The adjunct converb *di-en* clause cannot move to the exclusion of the embedded subject

- (84) \* $\left[ \begin{array}{l} \text{ayan-tan sarsyn} \quad \text{teonn-ue} \quad \text{di-en} \\ \text{trip-ABL tomorrow return-FUT say-CVANT} \end{array} \right]$  Masha **ker-gen-e/in**  $t_{dien}$  jie-ni  
 $\left[ \begin{array}{l} \text{trip-ABL tomorrow return-FUT} \end{array} \right]$  Masha husband-NOM/ACC  $t_{dien}$  house-ACC  
 suui-da  
 clean-PST  
 ‘Masha, saying that (her) husband would return from his trip tomorrow cleaned the house.’

## Matrix ‘say’ construction

- The embedded clause cannot move to the exclusion of the embedded subject

- (85) \* $\left[ \begin{array}{l} \text{ayan-tan sarsyn} \quad \text{teonn-ue} \\ \text{trip-ABL tomorrow return-FUT} \end{array} \right]$  Masha **ker-gen-e/in**  $t$  die-bite  
 $\left[ \begin{array}{l} \text{trip-ABL tomorrow return-FUT} \end{array} \right]$  Masha husband-NOM/ACC  $t$  say-PST  
 ‘Masha said that (her) husband would return from his trip tomorrow.’

⇒ Embedded subject cannot be in the matrix clause

## 7.3 Accusative case in complement clauses

### 7.3.1 Scrambling the complement clause

- When the entire complement *dien* clause is moved, both the nominative-marked and accusative-marked object can move with it

- (86)  $\left[ \begin{array}{l} \text{Masha-(ny) ehiil} \quad \text{Boston'-n'a kel-ie} \quad \text{dien} \\ \text{Masha-ACC next.year Boston-DAT come-FUT COMP} \end{array} \right]$  Ayaana  $t$  bil-bite  
 ‘Ayaana knew that Masha will come to Boston next year.’
- (87)  $\left[ \begin{array}{l} \text{Masha-(ny) ehiil} \quad \text{Boston'-n'a kel-er} \\ \text{Masha-ACC next.year Boston-DAT come-AOR.3SG} \end{array} \right]$ -in Ayaana  $t$  bil-bite  
 ‘Ayaana knew that Masha is coming to Boston next year.’

⇒ Accusative “embedded subject” can be in the embedded clause

### 7.3.2 Coordination

- The full distribution of unmarked (nominative) and accusative case on the embedded subjects of both conjuncts is available<sup>24</sup>

- (88) a. Kim da(qany)  $\left[ \begin{array}{l} \text{Ayaana} \quad \text{yll-ya-khtaakh} \\ \text{who PRT} \quad \left[ \begin{array}{l} \text{Ayaana[NOM]} \quad \text{sing-FUT-must} \end{array} \right] \text{ and } \left[ \begin{array}{l} \text{Sardaana-NOM/ACC} \\ \text{un'kuul-ueo-khteekh} \end{array} \right] \text{ dien} \quad \text{bil-bete5e} \\ \text{sing-FUT-must} \quad \left[ \begin{array}{l} \text{COMP} \quad \text{know-NEG.PST} \end{array} \right] \end{array} \right]$   
 ‘No one knew that Ayaana must sing and Sardaana must dance.’
- b. Kim da(qany)  $\left[ \begin{array}{l} \text{Ayaana-ny} \quad \text{yll-ya-khtaakh} \\ \text{who PRT} \quad \left[ \begin{array}{l} \text{Ayaana-ACC} \quad \text{sing-FUT-must} \end{array} \right] \text{ and } \left[ \begin{array}{l} \text{Sardaana-NOM/ACC} \\ \text{un'kuul-ueo-khteekh} \end{array} \right] \text{ dien} \quad \text{bil-bete5e} \\ \text{sing-FUT-must} \quad \left[ \begin{array}{l} \text{COMP} \quad \text{know-NEG.PST} \end{array} \right] \end{array} \right]$   
 ‘No one knew that Ayaana must sing and Sardaana must dance.’

<sup>24</sup>B&V have in addition the NPI test showing that the embedded subject is licensed by embedded negation. These facts align with our analysis. However, this particular task was difficult for our consultants, and so we do not have clear data to present.

- c. ...ol eren min Ayaana-(ny) yll-ya-khtaakh dien bil-bit-im, otton en  
 ...but 1SG Ayaana-ACC sing-FUT-must COMP know-PST-1SG, and 2SG  
 Sardaana-ny un'kuul-ueo-khteekh dien bil-bit-in  
 Sardaana-ACC dance-FUT-must COMP know-PST-2SG  
 “... but I knew that Ayaana must sing and you knew that Sardaana must dance” (a)✓,  
 (b)✓

- Moreover, the particle *da(qany)* can act as a conjunctive particle when doubled, meaning ‘both...and’ (Kirby 2021)
- We use these particles with the participial clauses and find that indeed, the conjuncts are both the size of the embedded clause

- (89) a. [ **Ayaana** yll-ya-khtaa5 ]-yn da(qany) [ **Sardaana-(ny)** un'kuul-ueo-khtee5  
 [ Ayaana sing-FUT.3SG-must ]-ACC PRT [ Sardaana-ACC dance-FUT.3SG-must  
 ]-yn da(qany) kim da(qany) bil-bete5e  
 ]-ACC PRT who PRT know-NEG.PST  
 ‘Nobody knew both that Ayaana must sing and that Sardaana must dance.’
- b. [ **Ayaana-ny** yll-ya-khtaa5 ]-yn da(qany) [ **Sardaana-(ny)**  
 [ Ayaana sing-FUT.3SG-must ]-ACC PRT [ Sardaana-ACC  
 un'kuul-ueo-khtee5 ]-yn da(qany) kim da(qany) bil-bete5e  
 dance-FUT.3SG-must ]-ACC PRT who PRT know-NEG.PST  
 ‘Nobody knew both that Ayaana must sing and that Sardaana must dance.’
- c. ...ol eren min Ayaana-(ny) yll-ya-khtaa5-yn bil-bit-im, otton en  
 ...but 1SG Ayaana-ACC sing-FUT.3SG-must-3S.POSS.ACC know-PST-1SG, and 2SG  
 Sardaana-ny un'kuul-ueo-khtee5-yn bil-bit-in  
 Sardaana-ACC dance-FUT.3SG-must-3S.POSS.ACC know-PST-2SG  
 “... but I knew that Ayaana must sing and you knew that Sardaana must dance” (a)✓,  
 (b)✓

⇒ Accusative “embedded subject” can be in the embedded clause

### 7.3.3 Relations to non-subject entities

- Proleptic objects can refer to a non-subject entity while raised objects cannot (Davies 2005)
- However, that is not the case with these accusative-marked “embedded subjects”

- (90) \*Sardaana Aisen-(y) aaspyt sylga iye-te bar-byt dien ihit-te  
 Sardaana Aisen-ACC last year mother-3S.POSS leave-PST COMP hear-PST  
 ‘Sardaana heard of Aisen that his mother passed away last year.’
- (91) \*Sardaana Aisen-(y) aaspyt sylga iye-te bar-byt-yn ihit-te  
 Sardaana Aisen-ACC last year mother-3S.POSS leave-PST.3SG-ACC hear-PST  
 ‘Sardaana heard of Aisen that his mother passed away last year.’

⇒ Accusative “embedded subject” is not a proleptic object

### 7.3.4 Overt pronoun

- Proleptic objects are distinct arguments from the argument of the embedded verb, while raised objects are not (Davies 2005; Bruening 2001)
- Having an overt pronoun in the embedded clause is ungrammatical

- (92) Sardaana Aisen-(y) bugun (\*kini) kel-er      dien    isti-bite  
 Sardaana Aisen-ACC today 3SG    come-AOR COMP hear-PST  
 ‘Sardaana heard of Aisen that he is coming today.’
- (93) Sardaana Aisen-(y) bugun (\*kini) kel-er-in                      isti-bite  
 Sardaana Aisen-ACC today 3SG    come-AOR.3SG-ACC hear-PST  
 ‘Sardaana heard of Aisen that he is coming today.’

⇒ Accusative “embedded subject” is not a proleptic object

### 7.3.5 Quantifier scope

- Proleptic objects cannot undergo scope reconstruction into the embedded clause, while raised objects can
- The accusative-marked object can reconstruct into the embedded clause

- (94) (min) bary uoreneecchi-ler-y beqehee test-y    ustu-but-tar              dien    isti-bit-im  
 1SG    every student-PL-ACC    yesterday test-ACC copy.paste-PST-3PL COMP hear-PST-1SG  
 ✓‘Of every student, I heard that they cheated on the test yesterday.’                      every > hear  
 ✓‘I heard that every student cheated on the test yesterday.’                      hear > every
- (95) (min) bary uoreneecchi-ler-y beqehee test-y    ustu-but-tar-yn              isti-bit-im  
 1SG    every student-PL-ACC    yesterday test-ACC copy.paste-PST-3PL-ACC hear-PST-1SG  
 ✓‘Of every student, I heard that they cheated on the test yesterday.’                      every > hear  
 ✓‘I heard that every student cheated on the test yesterday.’                      hear > every

⇒ Accusative “embedded subject” is not a proleptic object

### 7.3.6 Coordinate structure constraint

- While proleptic objects can violate island constraints, due to the fact that there is no movement involved, raising must obey islands (Salzmann 2006; Bruening 2001; Davies 2005)
- It is not possible to have the accusative-marked object be a conjunct in a coordination, regardless of the order in which the conjuncts are presented

- (96) a. \*Min Sardaana-(ny) ehiil      kini uonna Misha kergennii buoluox-tara dien  
 Keskil Sardaana-ACC next.year 3SG and    Misha spouse    become-3PL COMP  
 isti-bit-im  
 hear-PST-1SG  
 ‘I heard about Sardaana that she and Misha will get married next year.’  
 b. \*Min Sardaana-(ny) ehiil      Misha uonna kini kergennii buoluox-tara dien  
 Keskil Sardaana-ACC next.year Misha and    3SG spouse    become-3PL COMP  
 isti-bit-im  
 hear-PST-1SG  
 ‘I heard about Sardaana that she and Misha will get married next year.’
- (97) a. \*Min Sardaana-(ny) ehiil      kini uonna Misha kergennii buoluox-tar-yn  
 Keskil Sardaana-ACC next.year 3SG and    Misha spouse    become-3PL-ACC  
 isti-bit-im  
 hear-PST-1SG  
 ‘I heard about Sardaana that she and Misha will get married next year.’  
 b. \*Min Sardaana-(ny) ehiil      Misha uonna kini kergennii buoluox-tar-yn  
 Keskil Sardaana-ACC next.year Misha and    3SG spouse    become-3PL-ACC  
 isti-bit-im  
 hear-PST-1SG

‘I heard about Sardaana that she and Misha will get married next year.’

- Even the resumptive pronoun does not improve the grammaticality of the sentence

- (98) a. \*Min Sardaana-(ny) ehiil uonna Misha kergennii buoluox-tara dien  
Keskil Sardaana-ACC next.year and Misha spouse become-3PL COMP  
isti-bit-im  
hear-PST-1SG  
‘I heard about Sardaana that and Misha will get married next year.’  
b. \*Min Sardaana-(ny) ehiil Misha uonna kini kergennii buoluox-tara dien  
Keskil Sardaana-ACC next.year Misha and 3SG spouse become-3PL COMP  
isti-bit-im  
hear-PST-1SG  
‘I heard about Sardaana that she and Misha will get married next year.’
- (99) a. \*Min Sardaana-(ny) ehiil uonna Misha kergennii buoluox-tar-yn isti-bit-im  
Keskil Sardaana-ACC next.year and Misha spouse become-3PL-ACC hear-PST-1SG  
‘I heard about Sardaana that she and Misha will get married next year.’  
b. \*Min Sardaana-(ny) ehiil Misha uonna kergennii buoluox-tar-yn isti-bit-im  
Keskil Sardaana-ACC next.year Misha and spouse become-3PL-ACC hear-PST-1SG  
‘I heard about Sardaana that she and Misha will get married next year.’

⇒ Accusative “embedded subject” is not a proleptic object

## 7.4 The full distribution

### 7.4.1 Verbal complement

TODO The verbal complement clauses, repeated below in (100), are able to be fully analyzed via the dependent case algorithm, as described in the B&V paper.

- (100) B&V: 39a  
a. Min ehigi/ehigi-ni bugun kyaj-yax-xyt dien erem-mit-im  
1SG 2PL/2PL-ACC today win-FUT-2PL DIEN hope-PTPL-1SG  
‘I hoped that you would win today.’  
b. Min ehigi/ehigi-ni bugun kyaj-byk-kyt-yn ihit-ti-im.  
1SG 2PL/2PL-ACC today win-FUT-2PL-ACC hear-PST-1SG  
‘I heard you won today.’

Here, the embedded subject raises to the edge of the CP, where it is visible to be a case competitor with the matrix subject. Since the embedded subject is the lower of the two, it receives accusative case. Note that the embedded subject of participial clauses can raise to be visible to case competitors as well, even though the participial has a participial project embedding something smaller than a CP. This will be important for the following constructions.

### 7.4.2 Other converb clauses

TODO Finally, we look at the other converb constructions. These were the examples where we replaced *di-en* ‘say-CVANT’ with other converb forms of *di-* ‘say,’ repeated in (101).

- (101) a. Masha Misha-(ny) kel-ie dii-dii jie-tin xomuy-but  
Masha Misha-ACC come-FUT say.CVSIM-say.CVSIM house-3S.POSS-ACC tidy-PST  
‘Masha tidied the house (while) saying that Misha will come.’  
b. Masha Misha-(ny) kel-ie di-et jie-tin xomuy-but  
Masha Misha-ACC come-FUT say-CVIMM house-3S.POSS-ACC clean-PST  
‘Masha tidied the house right after saying that Misha will come.’

The accusative case is possible for the embedded subject. Given that the controlled subject *PRO* of the ConverbP can be an active case competitor, DCT can cover the facts. The analysis for this is parallel to that in the discussion of the adjunct *di-en* clauses.

In summary, with the full distribution of accusative case in various embedded constructions, the DCT analysis falls short, particularly in the constructions that do not allow accusative case-marking, while our analysis has full coverage. These examples bring up further questions of what the role and properties of *PRO* in Sakha are, and how it interacts with case.

## 7.5 Noun complement clauses

First, we briefly demonstrate that the noun complement clause with *dien* is indeed part of the NP as a complement rather than a verbal adjunct clause, as the converb phrase would be. We appeal to the scrambling facts. Looking at relative clauses, we see that head nouns cannot scramble away from their complex NPs by themselves. While the entire complex NP can scramble (102-b), the head to the exclusion of the relative clause cannot (102-c).

- (102) a. Sardaana Keskil atyylas-pyt yabloko-tyñ sie-bit  
Sardaana Keskil buy-PST apple-3S.POSS.ACC eat-PST  
'Sardaana ate the apple that Keskil bought.'
- b. Keskil atyylas-pyt yabloko-tyñ Sardaana sie-bit  
Keskil buy-PST apple-3S.POSS.ACC Sardaana eat-PST  
'Sardaana ate the apple that Keskil bought.'
- c. \*yabloko-tyñ Sardaana Keskil atyylas-pyt sie-bit  
apple-3S.POSS.ACC Sardaana Keskil buy-PST eat-PST  
'Sardaana ate the apple that Keskil bought.'

Likewise, the entire noun phrase with the *dien* clause can scramble, (103-b), but the movement of the head to the exclusion of the *dien* clause is illicit (103-c).

- (103) a. En miexe Sardaana bar-byt dien sonun-u ep-pit-in  
2SG 1SG.DAT Sardaana leave-PST COMP news-ACC tell-PST-2SG  
'You told me the news that Sardaana left.'
- b. En Sardaana bar-byt dien sonun-u miexe ep-pit-in  
2SG Sardaana leave-PST COMP news-ACC 1SG.DAT tell-PST-2SG  
'You told me the news that Sardaana left.'
- c. \*(sonun-u) en (sonun-u) miexe Sardaana bar-byt dien ep-pit-in  
news-ACC 2SG news-ACC 1SG.DAT Sardaana leave-PST COMP tell-PST-2SG  
'You told me the news that Sardaana left.'

This shows that the *dien* clause is indeed a part of the complex NP; the *dien* clause is not a verbal adjunct, as we might expect a converb phrase to be.

## 7.6 Glad-type verbs

- Another construction that is discussed are intransitive verbs that take *dien* clauses: *glad*-type constructions

- (104) Keskil [Aisen-y [kel-bet dien]] xomoj-do  
Keskil Aisen-ACC come-NEG.AOR DIEN become.sad-PST  
'Keskil, (saying) that Aisen is not coming, became sad.' (Vinokurova 2005: 366)

### Our claim

*glad*-type verbs are compatible with both the converb *di-en* as the complementizer *dien* constructions, presenting a problem for the DCT analysis



### 7.6.1 Diagnostics for separating lexical ambiguity

#### Subject agreement morphology

- Recall subject agreement is available for converbs and not for complementizers
- Subject agreement is possible on the DIEN in *glad*-type constructions

- (105) (Min) Misha-(ny) kel-bet di-em-min khomoi-du-m  
1SG Misha-ACC come-NEG.AOR say-CVANT-1SG be.sad-PST-1SG  
'I, saying that Misha is not coming, was sad.'

⇒ The DIEN in *glad*-type constructions can be a converb

#### Insertion of the word *baran* 'after'

- This post-position is only compatible with matrix verbs that are action verbs, so we were unable to use this test

#### Semantic restriction on subjects

- The matrix subject is semantically restricted for converbs and not for complementizers
- The matrix subject of the *glad*-type construction does not seem subject to such a restriction

- (106) a. oqo ehigi-(ni) beqehee ayan'-n'a bar-byk-kyt dien xomoj-do.  
child 2PL-ACC yesterday trip-DAT leave-PST-2PL DIEN be.sad-PST  
'The child was sad that you left on a trip yesterday.'  
b. sylgy ehigi beqehee ayan'-n'a bar-byk-kyt dien xomoj-do.  
horse 2PL yesterday trip-DAT leave-PST-2PL DIEN be.sad-PST  
'The horse was sad that you left on a trip yesterday.'

- However, combined with the subject agreement morphology test, we see a difference:

- (107) a. oqo-lor ehigi-(ni) beqehee ayan'-n'a bar-byk-kyt dien-ner xomoj-do.  
child-PL 2PL-ACC yesterday trip-DAT leave-PST-2PL DIEN-3PL be.sad-PST  
'The children were sad that you left on a trip yesterday.'  
b. #sylgy-lar ehigi beqehee ayan'-n'a bar-byk-kyt dien-ner xomoj-do.  
horse-PL 2PL yesterday trip-DAT leave-PST-2PL DIEN-3PL be.sad-PST  
'The horse was sad that you left on a trip yesterday.'

⇒ The DIEN in *glad*-type constructions can be a converb or a complementizer

#### Replacement with other converbal forms

- Replacement with other converbal forms is possible with the *glad*-type construction

- (108) (Min) Misha-(ny) kel-bet dii-dii xomoj-du-m  
1SG Misha-ACC come-NEG.AOR say.CVSIM-say.CVSIM be.sad-PST-1SG  
'I was sad while saying Misha didn't come.'

- However, in combination with a matrix subject that can speak vs. a matrix subject that cannot, there is a difference:

- (109) a. oqo Misha-(ny) kel-bet dii-dii xomoj-do  
child Misha-ACC come-NEG.AOR say.CVSIM-say.CVSIM be.sad-PST  
'The child was sad while saying Misha didn't come.'

- b. #sylgy Misha kel-bet                      dii-dii                      khomoidum  
       horse Misha come-NEG.AOR say.CVSIM-say.CVSIM be.sad-PST  
       ‘The horse was sad while saying Misha didn’t come.’

⇒ The DIEN in *glad*-type constructions can be a converb or a complementizer

### 7.6.2 Distribution of accusative case in *Glad*-type verbs

#### Complementizer *dien* construction

- We can force the complementizer *dien* in the *glad*-type structure by having a matrix subject that is unable to speak
- Accusative case is not allowed on the embedded subject only in this case

- (110) a. oqo ehigi-(ni) beqehee ayan'-n'a bar-byk-kyt    dien xomoj-do.  
           child 2PL-ACC yesterday trip-DAT leave-PST-2PL DIEN be.sad-PST  
           ‘The child was sad that you left on a trip yesterday.’  
       b. sylgy ehigi-(\*ni) beqehee ayan'-n'a bar-byk-kyt    dien xomoj-do.  
           horse 2PL-ACC yesterday trip-DAT leave-PST-2PL DIEN be.sad-PST  
           ‘The horse was sad that you left on a trip yesterday.’

- The DCT analysis would predict that both examples in (110) would pattern the same

#### Participial construction

- the *glad*-type verbs can take participial clauses, like the verbal adjunct *di-en* constructions
- These nominalized participial clauses receive ablative case, like the verbal adjuncts

- (111) Ayaana ehigi-(\*ni) kel-betek-khit-itten            khomoi-do  
       Ayaana 2PL-ACC come-NEG.PST-2PL-ABL be.sad-PST  
       ‘Ayaana became sad (because) you did not come (lit. from your not coming).’

- Also like the verbal adjuncts, accusative case is not available to the embedded subject