Strategies of Relativization in Hong Kong Sign Language

Gladys Tang, Prudence Lau, Jafi Lee
Centre for Sign Linguistics and Deaf Studies
Chinese University of Hong Kong
Deaf colleagues:
  ◦ Kenny Chu, Brenda Yu and Pippen Wong for being our informants and models, and for discussing the data with us.
Summary of Presentation

- Brief review of strategies of relativization in spoken languages from a typological perspective.
- Brief review of RCs in signed languages studied so far
- Presentation of data on RCs in HKSL
- Justifications for Internally headed relatives in HKSL
Introduction

  - All languages use relative clauses but they vary in terms of the strategies of relativization adopted, e.g.
    - Restrictive vs appositives
    - Use of relative elements such as personal pronouns, relative pronouns, relative affix/clitics, ..

- RCs are subordinate clauses
  - BUT RCs are distinguished from other subordinate clauses by their demonstrating a link between a nominal element in the relative clause with that in the matrix clause

- Dryer (1992)
  - A much higher tendency of occurrences for externally headed relatives than other types of relatives like internally headed relatives or correlatives
  - More postnominal than prenominal relatives
    - 98% of VO languages and 58% of OV languages have postnominal relatives
Semantic Characteristics

- Downing (1978)
  - Coreference
    • An element linking the relative clause and the matrix clause – the relativized NP
  - Assertion
    • The relative clause is an assertion about the relativized NP
  - Modification
    • The relative clause restricts the identification of the relativized NP by some property – restrictive RCs
Syntactic properties

• de Vries (2002): The distribution of the head N gives rise to different types of relatives:
  ◦ a. Postnominal relatives (e.g. English)
    • [S-matrix … [N [RC] …]
      (1) The girl kissed the [baby who sat next to her].
  ◦ b. Prenominal relatives (e.g. Mandarin)
    • [S-matrix … [RC ] N] …]
      (2) [Ta chang ge     DE shengyin] hen  gao    ting.
        he sing   song   DE  voice      very good  hear
        ‘The voice with which he sings is nice to listen to.’
      (Huang et. al. 2009, p.213)
De Vries’ typology cont’

- c. Head Internal relatives (e.g Ancash Quechua)
  - $[S\text{-matrix} \ldots [[_{RC} \ldots N \ldots]] \ldots]$
  - (3) $[\text{Nuna bestya-ta ranti-shqa-n} \ alli \ bestya-m \ ka-rqo-n].$
    - man horse-ACC buy-PERF-3 good horse-EVID be-PAST-3
    - ‘The horse that the man bought was a good horse.’

- d. Correlatives (e.g Hindi)
  - $[S\text{-matrix} \ _{RC} (\ldots) N \ldots] [S\text{-matrix} \ldots (\text{Dem}) \ldots]$
  - (4) $[\text{jo laRke KhaRe HaiN}, \ ve \ lambe haiN].$
    - REL boys standing are those tall are
    - Which boys are standing, they are tall.
    - (Grosu and Landman 1998)
**Syntactic properties**

<table>
<thead>
<tr>
<th>Properties</th>
<th>Post-nominal</th>
<th>Pre-nominal</th>
<th>IHRC</th>
<th>Correlative</th>
</tr>
</thead>
<tbody>
<tr>
<td>Internal Head</td>
<td>✗</td>
<td>✗</td>
<td>✓</td>
<td>✓</td>
</tr>
<tr>
<td>Nominalized</td>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>✗</td>
</tr>
</tbody>
</table>

de Vries 2002:

a. Both IHRCs and correlatives contain a head N in the relative clause
b. Post- & pre-nominal RCs are externally headed
c. Post- & pre-nominal relatives, and IRHCs are nominalized DPs
d. Correlatives are not nominalized DPs, but clauses left adjoined to the matrix clause
Relative clauses in signed languages

- **Types:**
  - Postnominal RCs: ASL, DGS, LSB
  - Head Internal RCs: ASL, LIS
  - Correlatives: LIS

- **Relative elements:**
  - Relative pronouns: DGS
  - Correlative markers: LIS
  - Relative Conj/C₀: ASL
  - Determiner-like: LIS

- **Non-manuals:**
  - Brow raise: ASL, LIS, DGS, LSB
    - Tensed eyes & cheeks, head tilts backward (ASL, LIS), upper lip raised (ASL)
Two ways to distinguish head external from head internal RCs (Liddell 1980; Pfau & Steinbach 2005; Cecchtto et al. 2006):

- Spread of non-manuals
- Scope of temporal adverbials over the matrix and relative clause
Nonmanuals: IHRCs

- Nonmanuals: spread over the entire RC, including the head N

(1) [Recen\textsubscript{ly} DOG (THAT\textsubscript{a}) CHASE CAT] COME HOME.
   ‘The dog which recently chased the cat came home.’
   ‘The cat which the dog recently chased came home.’
   (ASL, Liddell 1980: 162)

(2) TODAY MAN, PIE BRING PE, YESTERDAY (INDEX\textsubscript{i}) DANCE.
   ‘The man that brought the pie today danced yesterday.
   (LIS, Branchini & Donati (2009)
Nonmanuals: EHRCs

- Nonmanuals scope over the relative pronoun or the head external RCs

\( \mathbf{\underline{\text{rel}}} \)

(1) \text{YESTERDAY} \quad [\text{MAN IX}_3 [\text{RPRO-H}_3 \text{ CAT STROKE}]_{\text{CP}}]_{\text{DP}} \text{ ARRIVE.}

‘The man who is stroking the cat arrived yesterday.’
(DGS, Pfau and Steinbach 2007: 513)

\( \mathbf{\underline{\text{rel}}} \)

(2) \text{\textsc{1ASK}3 GIVE1 DOG} \quad [[\text{\textsc{URSULA KICK}S THAT}_C]\text{ ]]_{\text{NP}}

‘I asked him to give me the dog that Ursula kicked.’
(ASL, Liddell 1980: 162)

Note:

LSB has postnominal RCs without a relative pronoun/complementizer (Nunes & de Quardros 2004, cited in Pfau and Steinbach 2005.)
Nonmanuals: Correlatives

\[ \text{re} \]

(1) \text{BOY}_i \quad \text{CALL PROREL}_i \quad \text{HE}/\text{pro}_i \quad \text{LEAVE DONE}.\]

‘A boy that called left.’

(Cecchetto et.al. 2006)
Temporal Adverbials: IHRCs

- In ASL, LIS, DGS the temporal adverbial precedes the head noun, taking scope over the RC:

\[ \text{RECENTLY DOG (THAT}_a\text{) CHASE CAT] COME HOME.} \]

‘The dog which recently chased the cat came home.’

‘The cat which the dog recently chased came home.’

*‘The dog which chased the cat recently came home.’

(ASL, Liddell 1980: 162)
Temporal Adverbials: EHRCs

- In DGS, the temporal adverbial precedes the external head N, taking scope over the matrix clause.

  (1) \textsc{Yesterday} [\textsc{Man Ix}_3 \mathinner{\overline{\textsc{RPro-H}_3 \text{Cat Stroke}}} \mathinner{\overline{\textsc{CP}}} \mathinner{\overline{\textsc{DP}}} \text{Arrive}].

  ‘The man who is stroking the cat arrived \textit{yesterday}.’

  *‘The man who stroked the cat \textit{yesterday} arrive.’
RCs in HKSL (non-manuals)

- The relative clause is marked nonmanually by brow raise, and sometimes accompanied with forward head movement and eye contact with the addressee.
- The prosodic boundary markers for an intonational phrase like an eye blink or a pause may occur at the clause final IX.
- Nonmanuals differences:
  - Clause initial IX:
    - Brisk pointing, gaze at location of the nominal referent (but gaze at addressee when signing the head N)
  - Clause final IX:
    - A hold with the IX sign accompanied with mouth open and eye contact with the addressee
The lady who is walking (there) will fly to HK tomorrow.
br/hm-for/bl

2. [ Ix_i, female_i, typing_ix_ji ] Ix-I don't like t_i.
   'I don't like the lady who is typing'
RCs in HKSL: Scope of temporal adverbials

- Similar to other signed languages, the temporal adverbial is left adjoined to the clause and scope over it.
- The temporal adverbial defines the domain of interpretation of the event in which the nominal is a part.
The lady that is typing will fly to the US to lecture tomorrow.
RCs in HKSL: distribution of IX

- The RCs are flanked by a clause initial and a clause final IX.
- The clause initial IX is usually present, omitted if:
  - The bare noun is definite and not the first mention in the discourse. If the referent is first mention, clause initial IX is necessary.
- The clause final IX can be omitted, if:
  - The relative clause is marked by the appropriate nonmanuals for relativization. However, brow raise is obligatory, among others.
The lady who is cycling will fly to Beijing tomorrow.
4. [IX, FEMALE, SIT SOFA BLACK]  IX-I LIKE (IX-3)
‘I like the lady who is sitting on the black sofa’
RCs in HKSL: RCs in the sentence

- RCs in sentence initial position are preferred.
- In-situ RCs are acceptable, but low in occurrence.

- Subject relatives:

  \[
  \text{rel}
  \]

(1) \[[I_{X_i}\text{ FEMALE}_i\text{ CYCLE}]\quad \text{TOMORROW}\quad \text{pro}_i\quad \text{FLY}\quad \text{BEIJING}.

  ‘The lady who is cycling will fly to Beijing tomorrow.’
Object relatives:

\[ \text{(2) Hey! } \mathbf{IX}_3 \text{ LIKE } [ \mathbf{IX}_i \text{ MALE}_i \text{ EAT CHIPS } \mathbf{IX}_i ] \]

‘Hey! She likes the man that is eating chips.’

- Preposing of RC to sentence initial position

\[ \text{(3) Hey! } [ \mathbf{IX}_i \text{ MALE}_i \text{ EAT CHIPS } \mathbf{IX}_i ]_i \mathbf{IX}_3 \text{ LIKE } t_i. \]

‘Hey! She likes the man that is eating chips.’
2. Hey! $X_3$ LIKE $[X_i \text{ MALE}_i \text{ EAT CHIPS } X_i]$ ‘Hey! She likes the man that is eating chips.’
Analysis of RCs in HKSL: Some basic facts about HKSL

- SVO or SOV word order
- “Mixed headedness”: head initial below vP but head final above vP.

(1) KENNY LIKE DOGS. (SVO)
   ‘Kenny likes dogs.’

(2) KENNY DOG be_located+CL:dog IX-3 KICK+CL:dog (SOV)
   ‘Kenny kicked the dog

(3) KENNY ROW_BOAT CAN’T, CYCLE CAN.
   ‘Kenny can’t row; he can cycle.

(4) KENNY EAT_NOODLES FINISH, HAPPY.
   ‘Kenny ate the noodles; he was happy.’

(5) YESTERDAY KENNY COME WORK NOT_HAVE.
   ‘Kenny didn’t come to work yesterday.’

(6) KENNY COME WORK NOT_HAVE WHY?
   ‘Why didn’t Kenny come to work?’
Analysis of RCs in HKSL: IRHCs?

• The head noun is usually scoped over by the nonmanuals for relativization.
  ◦ Brow raise, open mouth, body lean forward are the typical nonmanuals. Brow raise has been associated with A’-dependencies in the signed language literature (Wilbur and Patschke 1999, Neidle et.al. 2000, Pfau and Steinbach 2005).
  ◦ Brow raise is most intense at the clause final IX. If IX is absent, the predicate, adjectival or verbal, will receive the stress prominence.
This clause that contains an internal head N occupies an argument position in the sentence, suggesting that it can be a complex DP of some kind.

Adopting the same set of nonmanuals, the clause cannot occur on its own, suggesting that it is a subordinate clause of some kind.

*(1) IX FEMALE TYPE IX
Analysis of RCs in HKSL: IRHCs

- The clause final IX is part of the RC, not the matrix clause, as evidenced by the presence of the prosodic markers.
- These prosodic markers are different from those observed in the subject pronoun copy in HKSL
  - (see next 3 slides)
[IX, FEMALE, TALK IX] MY BOSS.'
'The lady that talks is my boss.'
2. [IX, FEMALE, TALK] [IX-3 MY BOSS].
    ‘The lady talks; she is my boss.’
Compare ‘subject pronoun copy’:

GLADYS_{a} SUSPECT PIPPEN STEAL CAR IX_{a}

‘Gladys suspected that Pippen stole the car.’
Way Forward

- To develop a syntactic representation of IHRCs in HKSL
  - Taking into consideration the clause initial and final IX and the scope of the nonmanuals for relativization.
References


