Chapter 4
Relative clauses in sign languages: A typological survey

Introduction

As illustrated in the previous chapter, the literature on relativization in spoken languages is wide both in the number of languages investigated and in the proposals advanced to describe and analyse the phenomenon. Relativization in sign languages is still little explored; studies are however growing and more researchers have started analyzing relative constructions in different sign languages with the aim of deepening our understanding of these languages. This chapter continues adopting a typological view by illustrating the equivalent of relativization strategies in the sign languages for which a description of the construction is available. Such a survey is meant to show how sign languages exhibit the same cross-linguistic variation displayed by spoken languages in this domain and illustrates the way in which modality-specific syntactic properties such as NMMs and the linguistic use of space contribute to expressing relativization in sign languages.

Analyses of the equivalent of relative constructions are illustrated and discussed for American Sign Language (§ 4.1), Brazilian Sign Language (§ 4.2), German Sign Language (§ 4.3), Turkish Sign Language (§ 4.4), Catalan Sign Language (§ 4.5) and Hong Kong Sign Language (§ 4.6). Section § 4.7 sums up the information presented in this chapter.

4.1. Relative constructions in American Sign Language (ASL)

ASL is a coherent head-initial language displaying a SVO order. Example (300) exemplifies a declarative ASL sentence.

(300) MARY LOVE JOHN
'Mary loves John.'
(Neidle et al. 2000: 59)

A failed attempt to look for subordination in ASL was carried out by Thompson (1977) who, not finding the equivalent of relative pronouns and complementizers marking the dependent clause, concluded that ASL lacked relative clauses. Such a claim severely threatened the linguistic status of ASL by suggesting it to lack subordination, a crucial property of all natural languages.

A few years later, Liddell (1978, 1980) suggested that specific facial expressions co-occurring with a sequence of manual signs are responsible for marking the string as a relative clause. Liddell's (1978, 1980) investigations of ASL RCs led to the proposal that ASL has internally (301) and externally (302) headed restrictive relative clauses.

(301) [RECENTLY DOG CHASE+ CAT]$_{\underline{\text{r}}}$ COME HOME
'The dog which recently chased the cat came home.'
'The cat which the dog recently chased came home.'
(Liddell 1978: 66)

(302) $_1$ASK$_3$ GIVE$_1$ [DOG [URSULA KICK]$_S$ THAT$_c$]$_{NP}$ (r, nod)
'I asked him/her to give me the dog that Ursula kicked.'
(Liddell 1978: 85)

Both structures are marked by a specific NMM (glossed 'r') consisting of backward head tilt, raised eyebrows and tensed upper lip distinguishing relative constructions (301) from conjoined clauses (303).

(303) RECENTLY DOG CHASE CAT COME HOME
'The dog recently chased the cat and came home.'
(Liddell 1978: 71)

Liddell (1978) presents formational, semantic, and syntactic evidence for the relative status of the sentences in (30–302). In IHRCs, the NMM spreads over the head of the relative clause and over the relative CP, as shown in (301), while in EHRCs the NMM spreads over the relative CP but not over the head, as shown in (302).

In (301), the NMM spreading over the head as well as the occurrence of temporal adverbials preceding the head and scoping over the relative CP are taken as evidence that the head sits inside the relative CP. Notice that in sentences like (301) where two NPs are present inside the relative CP and

neither one is marked, both may be interpreted as the head. Such sentences may be potentially ambiguous, as indicated in the translation.

The relative clause may also optionally display a sign glossed THAT_a which Liddell claims appears between the subject and verb of the relative CP and which he analyzes as a relative conjunction marking the relative CP as subordinate; see (304).

(304) r
[RECENTLY DOG THAT_a CHASE + CAT]$_{S1}$]$_{NP}$ COME HOME
'The dog that recently chased the cat came home.'
'The cat that the dog recently chased came home.'[129]
(Liddell 1978: 75)

ASL relative clauses are strongly preferred in sentence-initial position. When extraposed, they are followed by an affirmative nod and/or by the sign THAT_c, as shown in (302) and in (305).

(305) i
r
ME FEED [[DOG BITE CAT THAT_b]$_S$ THAT_c]$_{NP}$
'I fed the dog that bit the cat'.
'I fed the cat that the dog bit.'
(Liddell 1978: 78)[130]

ASL relative clauses may be topicalized, as shown in (306). In this case, the NMMs for relative constructions and topics share the same non-manual component, namely raised eyebrows; it is therefore difficult to assert the presence of an independent topic NMM.

(306) r/t
[BOY EAT POSS HAMBURGER] IX FORCE GIVE 1-DOLLAR
'The boy who ate my hamburger, I forced (him) to give me a dollar.'
(Pfau and Steinbach 2005)

Coulter (1983) offers a different analysis for Liddell's pioneering description of ASL relative clauses claiming that they are not embedded, thus they do not originate as main clause arguments, and that they are better accounted for as conjoined relative clauses whose relativized argument within the second clause is deleted.

Fontana (1990) follows Coulter in proposing a conjoined analysis of the construction by interpreting ASL relative clauses similar to

left-dislocation structures as adjoined clauses organised in terms of topic-comment structures.[131]

A long time elapsed after the initial passionate discussion on ASL relative clauses without new investigation being undertaken, despite many studies on relative clauses in spoken languages.

About ten years after Fontana's proposal, Neidle (2002) claims that ASL relative clauses are correlatives, however without providing arguments for her proposal. She suggests that ASL relative clauses are housed in the same left periphery projection above TP hosting focussed constituents, 'if' and 'when' clauses, with which they share the same non-manual marking of focussed NPs.

It is only very recently that new fieldwork on ASL relative clauses has been undertaken. In her study, Galloway (2012) claims that ASL exhibits externally-headed relative clauses, internally-headed relative clauses and correlatives. She focuses on the syntactic and semantic properties of IHRCS and correlatives, providing and discussing evidence for their status.

In her view, previous analyses have wrongly conflated IHRCs and correlatives. She therefore devotes her study to showing that they are indeed different constructions.

Under her analysis, within correlative constructions, the correlative clause always occupies a left-peripheral position and it is marked by the non-manual 'brow raise' ('br'). The main clause obligatorily contains a correlate, the sign marked THATpt ('pt' standing for a deictic pointing sign co-articulated with the sign THAT), an independent demonstrative pronoun produced with the non-manual 'nose wrinkle' ('wr'). Example (307)[132] illustrates the structure corresponding to an ASL correlative construction.

(307) DOG BITE$_{woman}$ WOMAN THATpt$_{dog}$ COP SHOOT^1[133]
br br+wr
'The cops shot the dog that bit the woman.'

Regarding (307), Galloway accounts for the presence of the correlate in the matrix clause initial position, which is its object, by claiming that ASL objects are often topicalized. Galloway points out that the correlate may also be found in its in situ position within the matrix clause, as shown in (308).

(308) MOTHER BUY SHIRT ME FOLD THATpt$_{shirt}$
br wr
'I folded the shirt mother bought.'

Furthermore, in ASL correlative structures, plural referents require a plural demonstrative pronoun as correlate ('pt-circle-wr' or 'pt-arc-wr' in the glosses). Galloway claims that in (309) the interpretation of the sentence is that the number of books the doctor borrowed is exactly three and all of them are missing.

(309) MEDIC BORROW THREE BOOK (br) pt-circle (wr) MISSING++
'The three books that the doctor borrowed are missing.'

In accordance with the literature, ASL correlatives allow three possibilities for the spell-out of the nominal head: (i) the nominal head can be produced only inside the correlative clause (BOOK in 310a); (ii) it can surface only in the main clause (DOG in 310b); or (iii) it can appear in both clauses (BOOK in 310c).[134]

(310) a. [DOCTOR BORROW pt BOOK] (br) [THAT pt_{book} MISSING] (wr)
'The book the doctor borrowed is missing.'

b. [COP SHOOT^1] (br) [THAT^1 DOG $BITE_{woman}$ WOMAN PT^1_{dog}] (br+tns)
'The dog that the cops shot bit the woman (that's why they shot him).'

c. [pt GIRL BORROW BOOK] (br) [THAT BOOK GONE] (wr)
'The book the girl borrowed is missing.'

Galloway claims that ASL correlatives have maximalizing semantics, as shown with the interpretation of quantified NPs in (309). According to her, further evidence for the correlative interpretation of ASL relative constructions is provided by the incompatibility of ASL correlative structures with atelic predicates in the main clause, as illustrated in (311a) where the telic verb BUY in the main clause leads to a grammatical sentence and (311b) where the atelic verb LIVE is responsible for the unacceptability of the correlative structure.

(311) a. MY FATHER BUILD HOUSE (br) THATpt ME BUY (wr)
'I bought the house my father built.'

br wr
b. ??MY FATHER BUILD HOUSE THATpt ME LIVE

Galloway points out that ASL internally (312a) and externally headed relative clauses (312b) are both fully acceptable with atelic verbs.

br+tns
(312) a. MEDIC BORROW BOOK GONE SINCE
'The book the doctor borrowed has been missing.'
tns
b. BOOK pt^B MEDIC BORROW SINCE GONE
'The book the doctor borrowed has been missing.'

While she avoids discussing ASL EHRCs, she points out some differences between ASL correlatives and IHRCs.

Like correlative structures, IHRCs display a SVO order and frequently appear in the left periphery of the sentence. Galloway suggests the left-periphery position to be due to topicalization of the relative clause. She capitalizes on the lack of the demonstrative correlate THATpt to claim that the sentence in (313) is different from the ones illustrated above and analyzed by Galloway as correlatives.

br+tns
(313) THAT SENATE VOTE_{law} LAW ME $\text{SUPPORT}_{\text{law}}$
'I support the law the senator voted for.'

She presents two pieces of evidence for analyzing the relative clause in (313) as internally-headed. The first argument she discusses is the RC position: as opposed to correlatives, IHRCs can occupy an argumental position within the main clause. This possibility is illustrated in (314).

tns
(314) COP SHOOT^1 DOG pt^1 $\text{BITE}_{\text{woman}}$ WOMAN
'The cops shot the dog that bit the woman.'

The second argument in favour of an IHRC analysis is the nominal status of the relative clause: she claims that in (313) nominalization of the relative clauses is achieved by the tensed ('tns') facial expression which, according to Galloway, is only present in IHRCs and not in correlatives. In (315) below, the relative clause is nominalized through the presence of the clause-final pointing sign 'pt+' that she analyses as a determiner.[135]

br
(315) BOY CL>"spray" WATER pt+ KICK MY #DOG
'The boy who watered (the lawn) kicked my dog.'

4.2. Relative constructions in Brazilian Sign Language (LIBRAS)

The basic word order of Brazilian Sign Language is SVO (316).

(316) JOHN LIKE SOCCER
'John likes soccer.'
(Quadros 2003: 142)

According to Nunes and Quadros (2004), Brazilian Sign Language has EHRCs lacking overt relative pronouns. Sentence (317) exemplifies a relative clause in LIBRAS.

(317) GIRL [BICYCLE FALL]$_r$ IS HOSPITAL
'The girl that fell off the bicycle is in the hospital.'
(Nunes and Quandros 2004: 180)

4.3. Relative construnctions in German Sign Language (DGS)[136]

German Sign Language displays a SOV word order (318).

(318) IX_1 $POSS_1$ FAMILY $_1VISIT_3$
'I visit my family.'

According to Pfau and Steinbach (2005),[137] DGS displays post-nominal EHRCs obligatorily introduced by a relative pronoun (RPRO) assuming a different realization according to the human (RPRO-H) vs. non-human (RPRO-NH) feature of the head of the relative clause. The relative pronoun is produced in a position of the signing space already introduced in the discourse context and associated with the head. Optionally, the head of the relative clause is followed by an indexical pronominal sign such as IX_3 in (319a). Example (319) illustrates the construction.

re
(319) a. [MAN (IX_3) [$RPRO\text{-}H_3$ CAT STROKE]$_{CP}$]$_{DP}$
'the man who is stroking the cat'

re
b. [BOOK [RPRO-NH$_3$ POSS$_1$ FATHER READ]$_{CP}$]$_{DP}$
'the book which my father is reading'

As shown in the glosses, the NMM composed of raised eyebrows ('re'), identical to the non-manual marking of topicalised constituents in DGS, only spreads over the relative pronoun.

Pfau and Steinbach observe two properties suggesting that the head is external to the relative clause: (i) the obligatory presence of a relative pronoun, and (ii) the scope of a temporal adverbial preceding the head.

As evident from the translation provided for the sentence in (320), the temporal adverbial YESTERDAY can only refer to the main clause predicate and not to the relative clause predicate.

re
(320) YESTERDAY [MAN (IX$_3$) [PRO-H$_3$ CAT STROKE]$_{CP}$]$_{DP}$ ARRIVE
'The man who is stroking the cat arrived yesterday.'
*'The man arrives who stroked the cat yesterday.'

As for its position in the sentence, the relative clause may appear: (i) in situ, following its head, as shown in (321a), a relative clause modifying a subject, and in (321b), a relative clause modifying an object;[138] (ii) fronted, as in (322); or (iii) extraposed, as in (323).

(321) a. [WOMAN [RPRO-H$_{3a}$ MAN IX$_{3b}$ $_{3a}$HELP$_{3b}$]$_{CP}$]$_{DP}$ KNOW $_{3a}$PAM$_1$[139]
'The woman who is helping the man knows me.'

b. INDEX$_1$ [BOOK [RPRO-NH$_3$ TABLE LIE-ON]$_{CP}$]$_{DP}$ KNOW
'I know the book which is lying on the table.'

re
(322) [BOOK [RPRO-NH$_3$ POSS$_1$ FATHER READ]$_{CP}$]$_{DP/i}$ IX$_1$ **t$_i$** KNOW
'I know the book which my father is reading.'

(323) IX$_1$ [MAN IX$_3$ **t$_i$**]$_{DP}$ LIKE $_1$PAM$_3$ [RPRO-H$_3$ CAT STROKE]$_{CP/i}$
'I like the man who is stroking the cat.'

When the relative clause is in situ, the (optional) pronominal sign and the relative pronoun are usually collapsed into one.

When fronted, the whole DP containing the relative clause and head is topicalized and marked by the non-manuals indicating topicalization.

On the other hand, extraposition only involves movement of the relative clause but no specific manual or non-manual marking surfaces, with the exception of the otherwise optional indexical pronominal sign (IX_3) referring to the head that is required when extraposition of the relative clause takes place. In this case, fusion of the indexical pronominal sign and relative pronoun is blocked.

Pfau and Steinbach observe that in DGS, extraposed relative clauses modifying non-human entities may receive a double interpretation either as relative clauses or as independent sentences surfacing a topicalized demonstrative pronoun (DEM). This ambiguity is due to the identical phonological representation of demonstrative pronouns and the relative pronoun used for non-human entities in DGS. Example (324) shows the double reading available for such a sentence.

re
(324) IX_1 BOOK GREEN IX_3 LIKE [RPRO-NH_3/DEM_3 TABLE LIE-ON]
'I like the green book which lies on the table.'
'I like the green book. It lies (there) on the table.'

Pfau and Steinbach assume DGS relative clauses to be adjoined to the DP they modify in its base position and that the head is base-generated outside the relative clause. They further propose that the relative pronoun raises to the specifier of the highest topic phrase. This checks the [+rel] feature realized by the non-manual marking, which is therefore obligatory and only spreads over the relative pronoun with which it is associated. In Pfau and Steinbach's analysis, movement of the relative pronoun to the specifier of the highest topic phrase is confirmed by the impossibility of it being preceded by sentence-initial constituents like topics (325a) or temporal adverbials (325b).

re re
(325) a. *MAN (IX_3) [$BOOK_i$ RPRO-H_3 WOMAN t_i $_{3a}GIVE_{3b}$]
'the man who gives the book to the woman'

re
b. *MAN (IX_3) [YESTERDAY RPRO-H_3 CAT STROKE]
'the man who was stroking the cat yesterday'

Pfau and Steinbach claim that the sentences discussed here receive a restrictive interpretation. They report that appositive relative clauses have also been identified in DGS (see Happ and Vorköper 2006: 487); these are not

introduced by the relative pronoun and are marked by a different non-manual marking (glossed 'app'), namely, pursed lips and a slight headnod.

(326) EIGHTEEN CENTURY EIGHT NINETY, EIFFELTOWER,
app
[INDEX$_2$ KNOW PARIS IX$_3$], BUILD
'In 1889, the Eiffel Tower, that is in Paris, was built/completed.'

They suggest that further research is needed to find out whether the sentence in (326) is a genuine appositive relative clause or just a parenthetical construction.

4.4. Relative constructions in Turkish Sign Language (TİD)

According to Sevinç (2006), Turkish Sign Language is a SOV language (327).

(327) ADAM IND$_i$ KADIN IND$_j$ BAG˘IR$_j$
man locus$_i$ woman locus$_j$ shout-at
'This man shouted at that woman.'
(Sevinç 2006: 31)

Kubuş's (2010) analysis of relativization in TİD detects different relativization strategies adopted by signers. These seem, however, to favour IHRCs. Before getting into Kubuş' description of TİD IHRCs, let us quickly review the other two strategies observed by Kubuş: (i) EHRCs, also used with a non-restrictive interpretation, as illustrated in (328); and (ii) free relative clauses lacking both an overt head and a relative pronoun, as in (329), which Kubuş (2010) suggests should receive a maximalizing interpretation.

(328) CANSU MESSAGE SEND. SAMET CALL [MESSAGE SEE NOT] CALL[140]
rel
'Cansu has sent a message. Samet, who did not see the message, called.'
(Kubuş 2011a)

(329) [ENGLISH KNOW] PRIZE WIN
'The one who knows English very well won the prize.'
(Kubuş 2010)

As anticipated, TİD signers seem to strongly prefer production of IHRCs. They are marked by specific non-manuals (rel-NMMs) composed of raised cheeks, squinted eyes, a tensed upper lip and an optional head shake, very similar to the non-manuals marking topics in TİD. An optional relativization marker / nominalizer element (REL) displaying different forms (flat, dual form, plural form) marks the right periphery of the relative clause and is associated with raised eyebrows and an optional mouthing /o/ (open lip). Kubuş proposes the relativization marker to be a grammaticalized form of indexical pointings. The sentence in (330) illustrates the construction.

(330) rel
[HOUSE SOME *PAPER WALL*$_i$ EXIST] REL$_i$ FOR REMOVE
'The wall papers which some houses have should be removed.'
(Kubuş and Rathmann 2011)

Evidence for the position of the head inside the relative clause is provided by the temporal adverbials introducing the relative clause and scoping over the relative clause predicate but not over the main clause predicate, as shown in (331).

(331) rel
[BEFORE TELL-NOT PART] STOP
'Let's skip the part (of the story) that I did not tell yet.'
(Kubuş 2011a)

Kubuş (2011a) provides evidence for the dependent status of the relative clause by showing that it cannot be produced in isolation (332a) or without the relevant NMMs (332b), and that the head (CHILD) cannot be duplicated in the main clause (332c).

(332) a. rel
*[PARK CHILD$_i$ PLAY O$_i$]
'The child who plays in the park'

b. *[PARK CHILD$_i$ PLAY O$_i$]

c. rel
*[PARK CHILD$_i$ PLAY O$_i$] IND$_i$ CHILD $_1$GIFT$_2$ CHOCOLATE

By applying a set of tests as diagnostics to investigate the semantics of TİD IHRCs, Kubuş concludes that they should receive a restrictive interpretation. As for their superficial position with respect to the main clause, Kubuş (2010)

reports that a corpus-based analysis indicates that 77% of relative clauses precede the main clause, 21% are produced within the main clause and only 2% follow the main clause.

4.5. Relative constructions in Catalan Sign Language (LSC)[141]

The word order in Catalan Sign Language is SOV (333).

(333)
				hs
SANTI	CARN	MENJAR	NO
Santi	meat	eat	not

'Santi doesn't eat meat.'
(Pfau and Quer 2007)

Mosella (2011, 2012) claims Catalan Sign Language displays restrictive circum-nominal or internally-headed relative clauses. The relative clause in LSC exhibits: (i) a head always occupying its base position within the relative clause; (ii) an optional nominalizer element glossed MATEIX (meaning 'same') occupying either a clause-initial or clause-final position; and (iii) specific NMMs associated with the nominalizer element and composed of raised eyebrows, a body lean and, optionally, of squinted eyes marking shared information. The sentence in (334) illustrates the construction.

(334) rel
YESTERDAY MAN COME MATEIX POSS$_1$ FRIEND
'The man who came yesterday is my friend.'

Mosella observes that relative clauses in LSC never occupy a position internal to the matrix clause, as shown by the ungrammaticality of (335a). They are either fronted (335b) or postposed (335c).

(335) a. *JOAN [BOOK YESTERDAY BUY (MATEIX)] BRING NOT

b. rel
[BOOK YESTERDAY BUY (MATEIX)] JOAN BRING NOT

c. rel
JOAN BRING NOT [BOOK YESTERDAY BUY (MATEIX)]
'Joan hasn't brought the book that he bought yesterday.'

When the relative clause is fronted, the nominalizer element, MATEIX, can be overt (336a) or covert (336b). If it is overt, the rel-NMM can optionally

spread over some syntactic material other than the nominalizer MATEIX; if it is covert, spreading of the rel-NMM over the relative clause is compulsory, as shown by the ungrammaticality of (337).

(336) a. rel
TEACHER MY SON HELP+++ MATEIX IX_1 PLANT GIVE

b. rel
TEACHER MY SON HELP+++ IX_1 PLANT GIVE
'I gave a plant to the teacher who has helped my son a lot.'

(337) *rel
[PERSON SMOKE NO NEG] LAW TOBACCO SUPPORT
'The person who has never smoked supports the tobacco law.'

Mosella proposes the fronted relative clause to be located higher than CP, in topic position. Two pieces of evidence are provided supporting her claim: (i) the left peripheral *wh*-phrase cannot precede the relative clause; and (ii) the relative clause can be either preceded or followed by a topicalized constituent.

As for (i), *wh*-phrases in LSC occupy either the right periphery of the sentence or are in situ. They can, however, be produced in sentence-initial position forcing a repair strategy, namely spreading of the *wh*-NMM over the whole interrogative clause and doubling of the *wh*-phrase at the sentence's right-periphery. In the presence of a fronted relative clause, the leftward *wh*-phrase must follow the relative clause, as shown in (338).

(338) a. rel wh
[BOOK YESTERDAY BUY (MATEIX)] WHO BRING NEG WHO
'Who hasn't brought the book we bought yesterday?'

b. *WHO [BOOK YESTERDAY BUY MATEIX] BRING NEG WHO

Furthermore, Mosella observes that the fronted relative clause is not in the scope of the CP as the *wh*-NMM cannot spread over it, thus superseding the rel-NMM (339).

(339) a. rel
PARK YEAR_LAST FLOWER+ GARDENER PLANT (MATEIX)

wh
WHO WALK NOT-YET WHO
'Who has not yet walked through the park where the gardener planted flowers last year?'

b. *PARK YEAR_LAST FLOWER+ GARDENER PLANT (MATEIX)

wh
WHO WALK NOT-YET WHO

As for the interaction of the fronted relative clause with topics (ii), Mosella shows that it can be either preceded (340a) or followed (340b) by topicalized constituents.

(340) a. t rel
MARIA$_a$ [JOAN APPLE TABLE CL-put on MATEIX] $_a$PICK-UP
'Mary picked up the apple that Joan put on the table.'

b. rel t
[APPLE JOAN TABLE CL-put on MATEIX] MARIA$_a$ $_a$PICK-UP

She thus concludes that fronted relative clauses must be higher than Spec, CP, namely in TopicP.

Let us now turn to postposed relative clauses. Mosella analyzes the interaction of postposed RCs with *wh*-interrogative clauses, observing that two options are available.

In the first option, the relative clause can occur before the *wh*-phrase. If this happens, two NMM patterns may be found: the *wh*-NMM can either spread over the whole relative clause (341a), or both NMMs, relative and interrogative, appear (341b).

(341) a. wh
BRING NEG [BOOK YESTERDAY BUY MATEIX] WHO

b. wh rel wh
BRING NEG [YESTERDAY BOOK BUY MATEIX] WHO
'Who hasn't brought the book that we bought yesterday?'

In the former case (341a) the otherwise optional production of the sign MATEIX is obligatory due to the lack of the relative non-manual marking the clause.

Mosella observes that it is never the case that the relative clause follows the *wh*-phrase, as illustrated by the ungrammaticality of (342).

(342) a. *BRING NEG wh rel
WHO [BOOK YESTERDAY BUY MATEIX]

b. *BRING NEG wh
WHO [BOOK YESTERDAY BUY MATEIX]

The second available option is for the relative clause to be sandwiched between the two occurrences of the *wh*-phrase in an interrogative matrix clause displaying an in situ *wh*-phrase and a final *wh*-expression, as illustrated in (343).

(343) a. TODAY KID WHAT GIVE EXCITE [GIRL YESTERDAY SKIP-SCHOOL MATEIX] WHAT
(wh: WHAT GIVE EXCITE [GIRL YESTERDAY SKIP-SCHOOL MATEIX] WHAT; rel: GIRL YESTERDAY SKIP-SCHOOL MATEIX; wh: WHAT)
'What has the kid excitedly given today to the girl who missed school yesterday?'

b. TODAY KID WHAT GIVE EXCITE GIRL [YESTERDAY SKIP-SCHOOL MATEIX] WHAT
(wh: WHAT GIVE EXCITE GIRL [YESTERDAY SKIP-SCHOOL MATEIX] WHAT; wh: WHAT)

c. * TODAY KID WHAT GIVE EXCITE WHAT [GIRL YESTERDAY SKIP-SCHOOL MATEIX]
(wh: WHAT GIVE EXCITE WHAT [GIRL YESTERDAY SKIP-SCHOOL MATEIX]; rel: GIRL YESTERDAY SKIP-SCHOOL MATEIX)

From the evidence gathered, Mosella concludes that postposed relative clauses sit within the CP, and specifically she follows Alba (2010) in suggesting the presence of multiple right specifiers in LSC.

4.6. Relative constructions in Hong Kong Sign Language (HKSL)[142]

According to Sze (2003), Hong Kong Sign Language is a SVO language. Tang and Lau (2012) report HKSL to display IHRCs. Two pieces of evidence point towards the presence of IHRCs in HKSL: (i) the non-manuals marking relative clauses, i.e. the brow raise, are shown to scope over the head and the RC, as in (344); and (ii) temporal adverbials preceding the head are seen to scope over the relative clause but not over the main clause, as in (345).

(344) HEY! IX_3 LIKE [IX_i MALE EAT CHIPS IX_i]
(rel: IX_i MALE EAT CHIPS IX_i)
'Hey! She likes the man who is eating chips.'

(345) YESTERDAY IX_a FEMALE CYCLE IX_1 LETTER $SEND_a$
(rel: FEMALE CYCLE IX_1)
'I sent a letter to that lady who cycled yesterday.'

Tang and Lau report that in order for the temporal adverbial to have scope over the main clause, it has to follow the relative clause and precede the main clause, as in (346).

(346) rel
IX$_a$ FEMALE CYCLE (IX$_a$) TOMORROW FLY-TO-BEIJING
'The lady who is cycling will fly to Beijing tomorrow.'

As shown in the examples above, HKSL RCs display an indexical sign marking the right periphery of the clause (IX). It is accompanied by a different set of NMMs that Tang and Lau describe as 'mouth open' and 'eye contact with the addressee'. It is co-referential with the head of the relative clause showing spatial agreement with it and appears to be identical to the index sign occurring next to the head. Tang and Lau suggest IX to be more like a determiner than a relative pronoun whose presence is connected to the nominal status of the relative clause. When the relative clause is marked by the relevant NMMs, as in (346), the clause-final index sign may be omitted.

The relative clause may occupy an argument position, as in (344), but a sentence-initial position is also attested, as shown in (345) and in (347). Tang and Lau claim that in (347) the relative clause is topicalized to a left-peripheral position, and prosodic cues mark the end of the relative clause: a blink followed by a backward head tilt. Tang and Lau add that in fronted relative clauses, the similar non-manuals marking relative clauses and topicalized constituents make it difficult to distinguish between the two syntactic phenomena.

(347) rel/top
IX$_a$ BOY RUN IX$_1$ KNOW
'The boy that is running, I know (him).'

4.7. Summary

The literature on relativization in sign languages reviewed in this chapter has shown the same typological variation observed for spoken languages. More specifically, EHRCs have been detected in ASL, DGS, LIBRAS and TİD while IHRCs are present in ASL, TİD, LSC and HKSL. Correlatives have been observed in ASL and free relative clauses have been found in TİD.

Common syntactic features shared across these sign languages within the domain of relativization are: (i) the presence of non-manuals marking

the relative clause; (ii) the presence of a (optional) nominalizer element marking the right periphery of IHRCs associated with specific NMMs; (iii) a similarity between the non-manuals marking relative clauses and topicalized constituents; and (iv) a tendency for the relative clause to be fronted or postposed.

As for the correlation observed for spoken languages between head-final languages and the presence of IHRCs, evidence from sign languages does not seem to be clear-cut. From the data discussed in this chapter, both head-final (ASL, LSC, TİD) and head-initial (HKSL, ASL) languages seem to display IHRCs.

Finally, concerning the semantic properties of relative clauses in sign languages, all three typologies seem to be attested: restrictive, non-restrictive and maximalizing. A common feature seems to distinguish restrictive from non-restrictive relative clauses across sign languages: the presence of relative pronouns or nominalizer elements in restrictive but not in non-restrictive relatives and different non-manuals marking the two structures.