Reduplication in Sign Language

Reduplication is highly productive morpho-syntactic practise in sign language. The purpose of the present Paper is to give a general overview of how reduplication in sign language(s) functions, i.e. to illustrate by means of selected examples what meanings can be expressed and which forms of reduplication can be found in the various sign languages. Hence, theoretical assumptions and papers on this subject matter are only briefly discussed at the end of this Paper. For further information, please consult the attached Bibliography.

Before some reduplication types in various sign languages can be presented, the crucial difference between reduplication and repetition in sign language has to be explained. Repetition is considered "to be generally composed of a single repetition of the lexical movement with a (non-meaningful) return/transition movement in between" (Wilbur 2005: 596). Repetition is thus inherent in the sign and lexically or prosodically determined (cf. Wilbur 2005; Pfau & Steinbach 2006), whereas morphosyntactic reduplication consists of at least two repetitions (in the majority of cases we find three repetitions) and serves grammatical functions (cf. Wilbur 2005: 597f). In Swedish Sign Language, for example, the sign for 'wait' consists of one repetition of the root, but if the sign is reduplicated, the root sign is repeated three times.

(1) **Repetition** vs. **reduplication** in Swedish Sign Language/Tecknad Svenska (SSL/TS) (Bergman & Dahl 1994: 402f):

WAIT:	'wait' – citation form (the colon indicates one repetition or twice the root).
WAIT+++	'be waiting, wait for a while' – three times the root sign WAIT, the three pluses indicating three repetitions of the root

Function and form

The meanings expressed through and the word formation processes performed by reduplication are generally speaking the same as those found in spoken languages, e.g. habitual, iterative and continuative aspects, plurality, reciprocity and noun-verb derivations and conversions. Some of these will be discussed in more detail below, in regard to their formal properties. In contrast to the function, some formal aspects of reduplication in sign language are completely different from those observable in spoken languages. Due to the visual channel and the use of three dimensions, forms in sign language are not restricted to those detected in spoken languages.

Two common reduplication types in terms of formal features in sign language(s) are, apart from simple reduplication (see example (2) below), the so-called 'sideward' (example (3)) and 'backward' (example (4)) reduplication (cf. Pfau & Steinbach 2006). In German Sign Language (Deutsche Gebärdensprache – DGS), for instance, the plural of mid-sagittal nouns[1] is formed by simple reduplication, where the whole sign is produced three times.

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[1] i.e. nouns, whose signs are demonstrated with both hands in the mid-sagittal plane.

(2) **Simple reduplication** for nominal plural in German Sign Language/Deutsche Gebärdensprache (DGS) (Pfau & Steinbach 2006: 146):

'house'   'houses'

DGS nouns demonstrated single-handed in the sideward signing space with a simple movement and without the involvement of the body, i.e. sideward non body-anchored nouns, are pluralized by employing sideward reduplication. The whole sign is reduplicated with a movement to the right (for left-handed signers to the left).

(3) **Sideward reduplication** for nominal plural in DGS (Pfau & Steinbach 2006: 144f):

'person'   'persons'
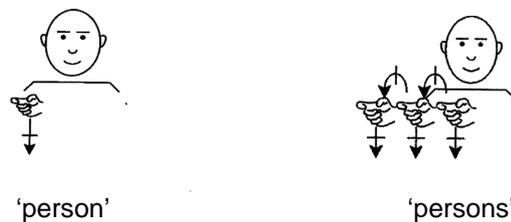
In British Sign Language (BSL), the sideward reduplication of verbs indicates distribution (multiplicity), e.g. the sign for 'TEACH' when reduplicated sideward, indicates 'TEACH-EACH-OF-THEM'. (Sutton-Spence & Woll 1999: 108)

The second type, which features a change in the direction of the reduplicant, with regard to the direction of the non-reduplicated sign, is called backward reduplication. This type can be found for instance in German Sign Language, where it is used to express a reciprocation of the verb. Two-handed agreeing verbs[2] form reciprocal constructions by demonstrating the reduplication with both hands into the reverse direction of the non-reduplicated verb. In example (4), the subscripts and superscripts indicate the points in the signing space: subscripts represent the points of the dominant hand and superscripts those of the non-dominant hand.

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[2]   i.e. verbs, which are demonstrated with both hands but, which have no fixed starting- and ending point within the signing space; they agree with the points already established for the participants within the signing space.

(4) Reciprocal **backward reduplication** in DGS (Pfau & Steinbach 2005: 573):

$_x$wir_beide$_y$ $_x{}^x$helf$_y{}^y$helf$_x{}^x$

we.two   help:REC

'we are helping each other.'

$_x$WIR_BEIDE$_y$ $_x{}^x$HELF$_y{}^y$HELF$_x{}^x$
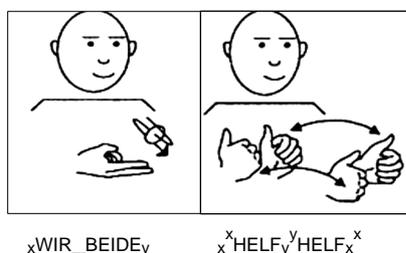
In addition to the direction of the movement, duration and velocity also play an important role in the reduplication system of some sign languages. In Swedish Sign Language, for example, there is a general distinction between fast and slow reduplication of verbs affecting the aspect system of the language. The sign WAIT: has two reduplicated forms which express different aspectual meanings. The notation in example (5) has to be read the following way: VERB+++ is the demonstration for fast reduplication, while VERB### represents slow reduplication. The colon indicates lexical repetition, as explained above.

(5) **Fast** and **slow reduplication** in SSL/TS (Bergman & Dahl 1994: 402f):

WAIT: 'wait'

WAIT+++   'be waiting, wait for a while'

WAIT###   'wait for a long time'

Thus when referring to formal features and patterns in regard to reduplication in sign language, it should be remembered, that sign language is a visually communicated language with the possibility of demonstrating subject matter simultaneously, and at different rates in a three-dimensional space. In addition to the movement and the shape of the hand(s), facial expression also communicates special meanings. Even though facial expression is an important and constantly appearing part of sign languages, it will not be discussed here, as the description of this aspect of sign languages would 'explode' the scope of the present Paper, which is merely to provide a survey of basic formal (and functional) characteristics of reduplication in sign language.

Theoretical assumptions

Reduplication in sign language has been thoroughly investigated by Ronnie B. Wilbur on American Sign Language (e.g. 2005, in collaboration with Petersen 1997) and by Roland Pfau and Markus Steinbach on German Sign language (e.g. 2003, 2005, 2006). In these studies, the domain of reduplication is defined with respect to the phonological, semantic and lexical properties of the signs in more detail. The morphological status of reduplication process(es) is also discussed in Bergman and Dahl (1994) who investigate verbal reduplication in Swedish Sign Language at the intersection of inflectional and derivational morphology .

The status of parts of speech in sign language(s) is another point of discussion in the literature (cf. Erlenkamp 2000). This issue is of importance here, because reduplication is often described as derivation or a conversion process between word classes. Another interesting question

arising in this context is whether it is legitimate to speak of derivation or conversion by reduplication in sign language, although the existence of distinct word classes is arguable?

In short, reduplication is a feature of the majority of sign languages and is applied in many different usages. Therefore, the interested reader is referred to the references below.

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