# Markers of (dis)fluency across signers’ profiles

# in French Belgian Sign Language

## A comparative analysis between native, near-native and late signers

This study investigates the commonly held belief that native signers are more fluent than non-native signers. The aim is to describe the use of (dis)fluency markers ("fluencemes") in the non-pathological signing production of 4 native (N), 4 near-native (NN) and 4 late (L) signers of French Belgian Sign Language (LSFB) aged around 34. The corpus consists of semi-interactive samples (4min/signer, around 6.700 annotations of the hands and 3.500 annotations of gaze) from unprepared speech between two deaf participants on topics related to LSFB use. The criteria used to classify signers into the three a priori groups are the parents’ status (deaf/hearing), the age of LSFB acquisition and the type of education *[1]*.

(Dis)fluency is considered as the result of the combination of many independent markers which may contribute either positively or negatively to the fluency of a discourse, depending on their frequency and their context of occurrence *[2]*. We identified as potential fluencemes: (1) the speed *[3]*, (2) the use of both hands, (3) palm-ups *[4]*, (4) truncations, (5) stops of the hands between signs, and (6) the gaze direction *[5]*. All these fluencemes were coded in ELAN following a specific guideline *[6]*. Moreover, palm-ups and stops have also been annotated for the co-occurring nonmanuals *[7]*. The data was statistically analysed (frequency and ratio measures, ANOVA and Student T test).

Results suggest that the profiles defined on extra-linguistic criteria do not match properly with the (dis)fluency profile of the signers’ productions. The three groups are similar for the use of some fluencemes (floating gaze, stops expressing word search). Nevertheless, we noticed, between N and NN/L, significant differences regarding: speed, use of one- or two-handed signs, gaze direction shifts; and slight tendencies regarding: use of nonmanuals, truncations and palm-ups. N and L may have different strategies to manage their discourse. NN are at the intersection of the two other groups.

References:

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