How can the early acquisition of Sign Language and Oral Language influence the syntactic performance of the oral language? A preliminary study in Portuguese Sign Language with prelingually deaf subjects.

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Abstract

The age of bilingual acquisition and its impact on language processing remain subject of debate, even though literature defends an early exposure to both languages for a good attainment (DeKayser & Larsson, 2005; Wartenburger et. al. 2003).

Studies have shown that the early onset of a structured language is critical specially for the syntactic outcome in a first (L1) and in a second language (L2) (Curtiss, 1977; Newport & Johnson, 1989) what leads to a sensitive period of language. This finding seems to be independent of language modality so that sign languages show the same age constraints (Bouldreault & Mayberry, 2006; Cormier, Schembri, Vinson & Orfanidou, 2012). Nevertheless, some controversy remain owing to the level of proficiency on both languages, school placement, relation/differences between languages motivation and the linguistic background of families (Bialystok & Miller, 1999; Muñoz & Singleton, 2011).

The Deaf Community has become a target of interest due to its heterogeneity in the age of language acquisition (AoA) and the variance in academic achievement (Mayberry, 1993). Moreover sign language is a natural language but with a specific visual-motor modality which allows the exploration of different sensory-motor system for comprehension and production. In this regard the present study aims to analyze the influence of AoA of Portuguese Sign Language (LGP) and Portuguese (LP) on the syntactic outcome of Written Portuguese (PE) of bilingual deaf people. The sample was comprised by 13 prelingually and profoundly deaf students, attending a degree in PRÓ-LGP from the Catholic University of Portugal, proficient in LGP, their L1 and in LP, their L2.

Two syntactic tasks were applied in the beginning: a Sentence to Picture Matching from the PALPA-P language battery and a Grammatical Judgement task specifically designed for this study, containing grammatical and ungrammatical sentences belonging to five type of syntactic structures: simple, composed, passive, relative and "integrantes" (a kind of subordinate clauses in Portuguese). After that, the participants were asked to write about the "Cookies Theft" picture (Godglass & Kaplan, 1983) in order to assess syntactic production.

Results show that only the L2 AoA obtained a negative and significant correlation in all the tasks. Other possible variables of influence such as age of hearing loss detection and the hearing status of parents did not correlate. The fact that picture tasks elicit learners' linguistic knowledge and that deaf rely on visual resources may have influenced performance in the Picture to Sentence matching task. On the other hand, the