

Testing multilingual speakers in both mono- and multilingual mode: Some insights from psycholinguistic research

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Most studies on multilingual language processing are based on monolingual testing: multilinguals are tested in each language separately. However, multilinguals' language processing and understanding may be the result of a dynamic interaction between all languages of their repertoire (e.g. Cummins 2000 and García 2009). In two studies, we tested multilingual speakers in two conditions, when the task involved only one language or when it involved their whole language repertoire. We investigated the effects of the two conditions on multilinguals' language processing and understanding.

In Study 1 (Torregrossa et al. 2022), 33 Greek-Italian bilinguals (8-11 years) rated the acceptability of grammatical and ungrammatical Italian sentences and were asked to explain what was wrong with the unacceptable ones. Sentences were presented in 3 conditions: (1) single grammatical/ungrammatical Italian sentences; (2) pairs of ungrammatical Italian sentences with their grammatical Italian counterpart; (3) grammatical/ungrammatical Italian sentences with ungrammatical/grammatical Greek translation. Children were better at noticing and explaining errors in condition 3, where their other language (Greek) was activated. We also assessed children's grammatical processing abilities in Italian through a sentence repetition task. Children with lower grammatical processing abilities were found to benefit most from the condition where Greek was activated.

In Study 2, children played with Cheeky, a monkey who travelled and encountered problems at 8 locations. At each location, children found Text A with information about 3 super-fruits offering super powers. Children also got Text B, a story describing Cheeky's problem. They had to draw inter-textual inferences to decide which fruit Cheeky ate to solve the problem (e.g. a fruit that can make you jump high when you are in a hole). Text A and B were either presented in the same language (either Italian or German) or in different languages (Italian-German /German-Italian). In the two bilingual conditions, children were more likely to integrate information from Text A and Text B when they explained the inference.

From both studies, multilingual tests emerge as a more ecological way to assess multilinguals' language processing abilities than monolingual tests, since they allow multilingual children to access their whole linguistic repertoire. The comparison between the results of the two testing modes has allowed us to gain psycholinguistic insights into multilingual processing: multilingual testing seems to be associated with a deeper sentence and discourse processing than monolingual testing.

References: [1] Cummins, J. (2000). *Language, power and pedagogy: Bilingual children in the cross-fire*. Multilingual Matters. [2] García, O. (2009). *Bilingual education in the 21st century*. Wiley. [3] Torregrossa, J, Eisenbeiß, S., Bongartz, C. (2022). Boosting Bilingual Metalinguistic Awareness Under Dual Language Activation. *Language Learning*.

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