Representation of grammatical gender at different stages of L2 vocabulary acquisition: evidence from gender congruency effect

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Second language (L2) vocabulary acquisition is a dynamic process. New L2 words are added to the mental lexicon incrementally, and during such process, they interact with the existing L1 and L2 entries at different levels, including the grammatical level. The majority of models of bilingual lexical access and word acquisition ignore the incrementality of this process and view word representations as static. The central question that this study addresses is whether newly learned words engage in interaction with the existing L1 representations at the grammatical level, as is typically observed for the words that are already integrated into the mental lexicon. More specifically, we investigate interactions between L2 and L1 gender representations both in newly learned and already known words. If such interaction exists, a grammatical gender congruency effect (GCE) is expected, whereby nouns that share the same grammatical gender in both languages receive processing advantage (Sá-Leite, Fraga, & Comesaña, 2019).

Intermediate Spanish language learners (with Russian as L1) will take part in the study (N>35). Based on the ratings of three Spanish instructors of a subset of phonologically-transparent Spanish nouns (words ending in *-o* are masculine and words ending in *-a* are feminine), stimulus words were grouped into two conditions: likely known and likely novel words (32 words in each condition, half – gender-congruent). In the experiment, each participant first translates all words from Spanish into Russian. Only those words are then used in the experiment that followed our predictions: i.e., the likely known words that elicited correct translations and the likely novel words for which the participant did not provide a translation or provided an incorrect translation. This way, the stimulus set is determined on a subject-specific basis. At the next stage, participants complete a learning protocol, during which they perform self-paced learning using flashcards. Immediately after the learning phase, participants perform an oral forward-translation task (from L1 into L2). Each participant produces each noun both in the agreement condition (*la aguja*) and in the bare noun condition (*aguja*). The order of the two conditions is randomized across participants. Additionally, participants perform a semantic translation recognition task and a word ending fill-in task, where they choose the correct ending of the word. A schematic of the design and procedure can be found in the attached figure. The experiment is in the data collection stage.

Based on previous findings (Paolieri, Padilla, Koreneva, Morales, & Macizo, 2019), we expect that “known” L2 words that are already integrated into the lexicon will engage in interaction with existing L1 translations, producing a GCE both at the syntactic and the lexical levels (in the agreement and in the bare noun conditions). Regarding “novel” L2 words, we hypothesize that participants will rely heavily on episodic memory and form-mappings (James, Gaskell, Weighall, & Henderson, 2017), resulting in a reduced or no GCE at the lexical level (with bare nouns). At the same time, when forced to use novel words in short-distance dependencies (for agreement), participants will have to access newly established grammatical representations, resulting in a GCE at the syntactic level. All in all, our findings will promote understanding of how L2 words interact with the existing L1 words at the grammatical level dynamically (at different stages of words acquisition).

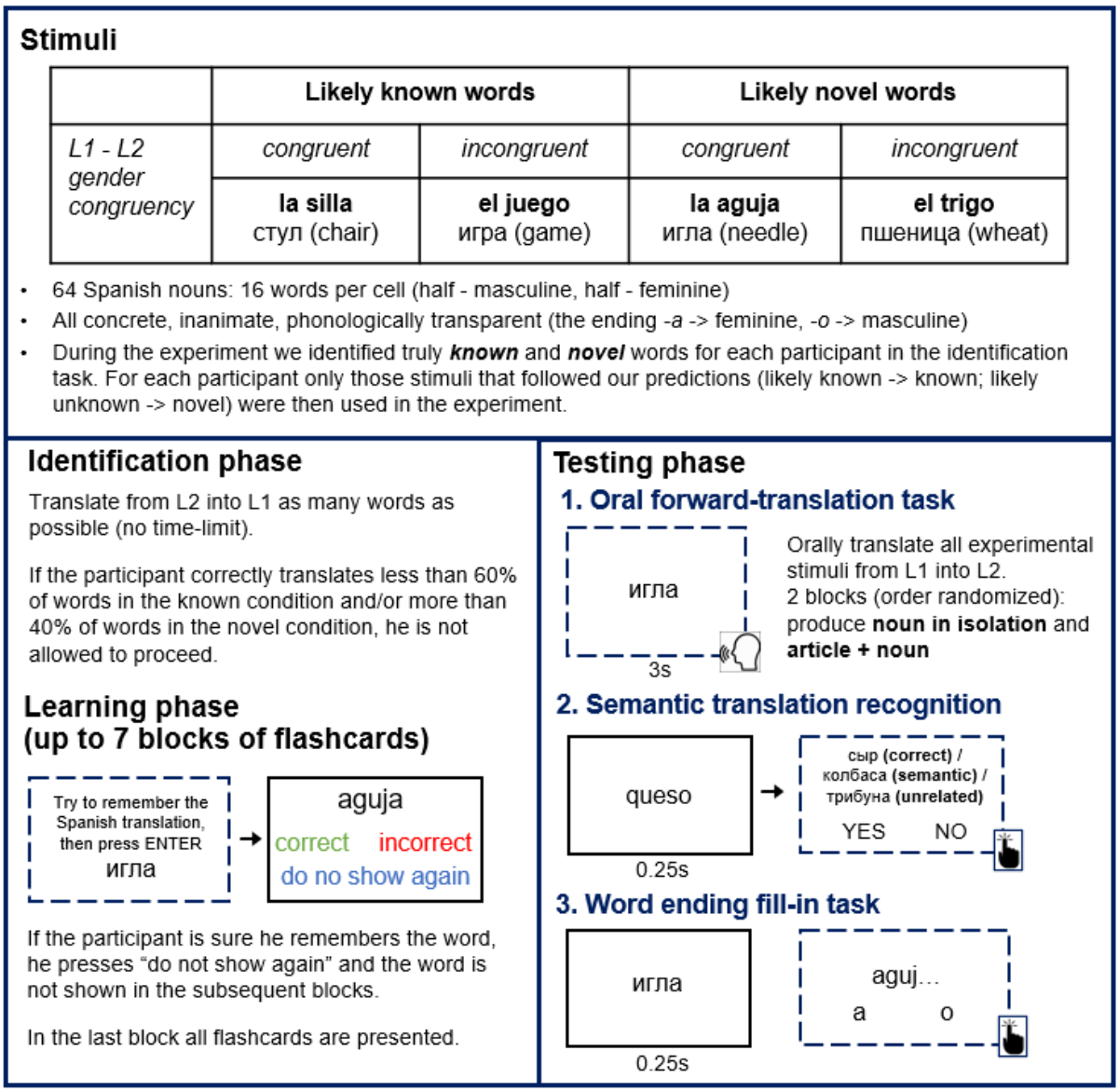

Figure. A schematic of the design and procedure used in the study.

References

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