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Code-Switching and Multimodal Language Production: The Interaction of Code-Switching, Speech Disfluency, and Gestures

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Abstract

Bilinguals produce code-switches (CS), speech disfluencies, and gestures during speech. While gestures are known to reduce cognitive load during disfluent speech, the interaction between CS and multimodal production remains understudied. This study investigated the relationship among CS, disfluency, and gesture use across L1-Turkish, L2-English, and Free-Language conditions using academic and daily topics. Results showed intrasentential CS occurred more frequently in Free-Language condition, whereas representational gestures were more prevalent in single-language conditions. Co-occurrences of representational gestures and speech disfluencies were significantly higher in academic topics, modulated by L2 proficiency. Furthermore, intrasentential CS co-occurred with representational gestures, both independently and simultaneously, with speech disfluency more in the Free-Language than L1-Turkish condition, again modulated by proficiency. In contrast, intersentential CS co-occurred with non-representational gestures in Free-Language condition. Results suggest that bilinguals use representational gestures to maintain a single language or manage complex intrasentential CS, while non-representational gestures serve as markers for intersentential CS.

Keywords: bilingualism, multimodal language, code-switching, gesture, speech disfluency

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