Modelling multilingual acquisition of speech: Natural Growth Theory of Acquisition

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Numerous models have been proposed to account for bilingual acquisition and, more recently, also multilingual acquisition with L3 in focus. However, a holistic explanatory framework which would account for the complexity of the acquisition process in a multilingual mind is still lacking. In this paper we want to provide a critical assessment of the relevant approaches to L2 and L3 acquisition and offer a new theory, called the Natural Growth Theory of Acquisition (NGTA). The theory will be supported by the generated data as well as used to interpret it. The evidence will come from recent studies on L3 phonology (Wrembel 2015) and phonotactics and morphonotactics (Dressler & Dziubalska-Kołaczyk 2006, Dziubalska-Kołaczyk 2014). The Natural Growth Theory is informed by natural phonology on the one hand, and complexity theory (Kretzschmar 2015) on the other. It is holistic in the sense that it incorporates each and every aspect of the acquisition process: a gradual dynamic emergence of Ln phonology, the input from L1 and other L's, influence of typology, universals, and context. NGTA is conceived as a general theory of language acquisition, but so far it has been substantiated for speech.

The major goal of this contribution is to interpret empirical evidence within the framework of the proposed Natural Growth Theory of Acquisition (NGTA). The data selected for testing the predictions of the NGTA come from two series of studies. The L3 phonological studies involved accentedness ratings to tap perceived global accent; voice onset time acoustic measures; and oral protocols to measure metaphonological awareness. They were conducted on four groups of multilingual participants (N=128) with complementary language combinations (i.e. Polish, English, French and German as L1/L2/L3). The interpretation of the results largely corroborates the predictions of NGTA. The (mor)phonotactic studies, in turn, were conducted on word initial, medial and final clusters in Polish and English (and other languages), and were based on the data coming from dictionaries, generated paradigms, written language corpora as well as child and second language. The results are explicable in terms of NGTA, which allows to explain the markedness-related predictions referring to the behaviour of (mor)phonotactic sequences.

References:
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