Polish (mor)phonotactics: acquisition and markedness

Paulina Zydorowicz (Adam Mickiewicz University)

Phonotactics has been of great interest for linguists for decades. Most of the works on Polish phonotactics have focused on description, frequency, universal patterns and the stability (or the lack of it) in casual speech context or language acquisition (Bargiełówna 1950, Dukiewicz 1985, Dunaj 1985, Dobrogowska 1990 and 1992, Dziubalska-Kołaczyk 1999, Madelska 2005, Milewski 2005). The authors often admitted that certain sound combinations result from morphological operations such as adding affixes to the base form e.g. chodzić – ws|chodzić (to go - to rise) however, the existence of morphological boundaries between consonants, although acknowledged, has rarely been taken into account as the main criterion for analysis.

In this report the author will try to show the interface between phonology and morphology on the basis of phonotactics or rather morphonotactics as proposed by Dressler and Dziubalska-Kołaczyk (2006). The authors define morphonotactics as "the area of interaction between morphotactics and phonotactics" (Dressler and Dziubalska-Kołaczyk 2006: 70). Therefore, the main focus of the empirical study is the investigation of consonant clusters with and without morphological boundaries. It is assumed that in languages a given number of clusters will arise at morpheme boundaries. Although these morphonotactic clusters are often marked, they might not be reduced in production as often as "lexical" clusters (i.e. within-a-morpheme clusters). A morphological cluster is more likely to be retained in production as it serves a morphological function (a new semantic or grammatical meaning is conveyed).

Additionally, Polish clusters will be analysed from the point of view of markedness. For that purpose, the author will use the Net Auditory Distance (NAD), a tool developed by Dziubalska-Kołaczyk and Grzegorz Krynicki (2007). The NAD between two sounds can be defined in terms of a metric on three-dimensional space spanned by phonetic properties: manner of articulation (MOA), place of articulation (POA) and voicing characteristic (Lx).

$$NAD = MOA + POA + Lx$$

These three values when added indicate the status of a cluster: preferred or dispreferred. For instance, the NAD for a preferred initial double cluster is defined below.

NAD
$$(C1,C2) \ge NAD(C2,V)$$

(the condition reads: the net auditory distance between the two consonants should be greater than or equal to the NAD between the second consonant and the vowel). Similar conditions can be formulated for medial and final doubles (and triples).

To verify the aforementioned claims, data from first language acquisition of Polish will be presented. Polish data come from recordings of one child, Zosia, and cover the period from the age of 1;7 until 3;2. The data were analysed auditorily by the author. The author will show what paths of development of morphonotactics the Polish child follows. Secondly, all intact and reduced consonant clusters will be analyzed from the perspective of markedness by means of the Net Auditory Distance tool.

References

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