Parametric dependencies result in correct predictions about word accent typology

It is a well-known fact that metrical stress theories are, frequently, excessively powerful. The goal of this paper is to suggest a parametric system that generates all, and only, the attested phonological accent languages.

The *Scales-and-Parameters* (S&P) theory that I propose is a parametric, non-metrical theory that assumes separation of accent and rhythm (motivated in van der Hulst & Goedemans 2014), assigned on distinct planes. I will focus here on word accent systems, leaving aside rhythm. S&P takes as a point of departure the Primary Accent First (PAF) theory (van der Hulst 1996, 2010), which is interesting in that it overgenerates less than metrical theories and does not undergenerate.

A peculiar feature of S&P is the introduction of dependency relations among certain parameters in the system. In this talk, I present one such important dependency holding between the Nonfinality, Weight and Select parameters. Nonfinality makes the final syllable extrametrical, Weight decides whether the system is weight-sensitive, while Select chooses the {Leftmost/Rightmost} heavy syllable in the accent domain (*i.e.* the span of syllables where accent can fall) for accent.

Detailed inspection of StressTyp (the largest-to-date typological database of stress patterns) has revealed a non-trivial extrinsic dependency: for *bounded* weight-sensitive systems with Nonfinality (Yes), "Select" is always set to "Right" (1a). That is, (1b) is ruled out.

(1) a. l h l l (h ˈh) <σ>]   b. *l h l l (ˈh h) <σ>]

For example, Classical Latin has [konˈstruktus] 'collected together', not *[ˈkonstruktus] (2b):

(2) a.   *   Select (Right)   b. *   Select (**Left**)
         *   *   Weight Projection   *   *   Weight Projection
      (h   h) <σ>]   Domain Size (Bounded)   (h   h) <σ>]   Domain Size (Bounded)
     konsˈtruktus   Nonfinality (Yes)   *ˈkonstruktus   Nonfinality (Yes)

From this, the *Accent Locality Prediction* (ALP) is drawn that, *in the general case, in languages with nonfinality, the heavy syllable other than the rightmost one in the accent domain is never accented.*

Testing ALP (against data in StressTyp and the literature) for unbounded systems, including those where Nonfinality (Yes) and the Nonfinality Unit is not the syllable, reveals that no such system has Select (Left). For example, in Sindhi, we never find the configuration (3b).

(3) a. mokɪˈlaɳi   [(h l ˈh)<h>] 'farewell'   b. *[(ˈh l h) <σ>]

Therefore, ALP is borne out, leading to a parameter dependency whereby Weight (Yes) & Nonfinality (Yes) → Select (Right), which blocks Select (Left). This and a number of other parametric dependencies strongly reduce the parameter space of the S&P system and contribute to its descriptive adequacy for phonological accent languages (as supported by a series of tests against StressTyp records).

References

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