## METALINGUISTIC AWARENESS OF TRENDS AS A DRIVING FORCE IN LINGUISTIC EVOLUTION: AN EMPIRICAL STUDY

## KEVIN STADLER, ELYSE JAMIESON, KENNY SMITH, SIMON KIRBY

Centre for Language Evolution School of Philosophy, Psychology and Language Sciences The University of Edinburgh, Edinburgh, Scotland kevin.stadler@ed.ac.uk

Like other culturally replicated traits, human languages – whether spoken or signed – evolve continually. But, unlike many other cultural traits, linguistic conventions are *arbitrary*: the exact form of a morpheme or syntactic word order convention matter much less than the fact that there *is* a convention that is understood by all. Consequently, once a convention is established there is a pressure to maintain it, and not to replace it with another form – so what selective forces cause languages to keep evolving?

Sociolinguistic research of the past decades has shown that language changes spread across social groups in an orderly fashion, a process which is typically explained by the notion of *prestige* – a metalinguistic property of linguistic variants that determines whether a speech community will seek to adopt the new variant or not. A positively evaluated variant might be taken up thanks to its *overt prestige* value, while the spread of negatively evaluated variants (those perceived as 'wrong' or otherwise imbued with negative associations) is said to be due to *covert prestige*. Crucially, the establishment of social prestige is itself a puzzle to be solved: the choice of which linguistic form becomes 'prestigious' is as arbitrary as the choice of using one form over another. The prestige value of a variant needs to be negotiated and spread across the speech community in the first place, a process which requires just as much explanation as the diffusion of the linguistic form that it is supposed to explain.

To put the notion of metalinguistic prestige on a more solid footing, Labov (2001, ch. 14) suggested that the steady advancement of changes across generations might be driven by adolescents' awareness of the directionality of linguistic changes, combined with a pressure to discriminate themselves from older speakers. While experiments have shown that the latter pressure can indeed drive linguistic divergence of an artificial language when social group membership is marked explicitly (Matthews, Roberts, & Caldwell, 2012), empirical evidence that humans are able to exploit information on the directionality of ongoing changes

is still missing.

In this work we report results from a first quantitative investigation of the human capacity for tracking language evolution in progress. Using a questionnaire methodology we collected data on speakers' implicit and explicit awareness of three ongoing syntactic changes to verb positioning in the local variety of Scots spoken in Shetland, an island group to the North of Great Britain. 77 participants were asked to report their perceived usage levels of different age and speaker groups for the three changing variables as well as a stable, non-changing control. Our results show that individuals can reliably identify which of the competing linguistic variants are older and which are newer. The data also indicates that individual perceptions of apparent time differences (when younger speakers are leading a change, with the usage levels of older speakers 'lagging behind') can be used reliably to determine the directionality of the changes in progress.

The efficacy of 'trend-amplifying' selection mechanisms such as the one suggested by Labov has already been demonstrated theoretically by means of computational modelling (Stadler, Blythe, Smith, & Kirby, 2016). In particular, Mitchener (2011) showed that a model of language change that is based on perceived usage differences between age groups can successfully produce directional selection of arbitrary variants. Our quantitative results indicate that the information required by such mechanisms is indeed readily available to humans, and might consequently be used to coordinate changes across a community. Our results are in support of the idea that language evolution, rather than just being the result of drift and the incidental accumulation of errors in transmission and acquisition, is actively maintained and driven by individuals. Evidence to this end suggests that the origin of human language as we know it rests not only on an increased linguistic capability, but on metalinguistic capacities that are sensitive to variation and able to exploit usage patterns to actively guide linguistic divergence and change.

## References

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