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Discussing Grammaticalization

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How Accommodating of Change is Grammaticalization? The Case of “Lateral Shifts”*

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Abstract

A recurring type of change involving grammatical elements, dubbed here a “lateral shift”, a change in which the element in question neither takes on greater grammatical status nor loses such status, is exemplified through a series of changes in verb endings in Greek. They are shown to be problematic for much of what has been said about the principle of unidirectionality within grammaticalization theorizing. For instance, one way in which lateral shifts are relevant to unidirectionality is that they show that the strongest and most restrictive formulation of the principle (i.e., that movement is *always* towards greater grammatical status) cannot be maintained. Moreover, the prevalence of such shifts suggests that characterizing changes in terms of movement “up and down a cline” may be missing a basic aspect of grammatical change, whether we call it “grammaticalization” or not.

“unmarked” about the paths of development taken by particular combinations of meaningful elements, as reflected in movement along several dimensions, e.g. from phrasal realization to word-level realization, from not being used in the expression of grammatical categories per se to being so used, etc. There have been many sides to the discussion and many voices, but a good part of the attention has been focused on what the best formulation of the principle is, and in particular how strong the principle is, how strong it can be, and how – once the principle is properly formulated – one is to deal with potential counterexamples to it. The debate on how to view unidirectionality continues, as several recent defenses of the notion suggest (Haspelmath 2004, Ziegeler 2003; 2004), yet there are some facts, touched on briefly in Joseph (2004a), that deserve, in my view, further amplification and consideration. Thus I here bring to light and further exemplify a persistent and recurring type of change – referred to as *lateral shifts* in Joseph (2004a) – that involves the creation and development of grammatical material. Such shifts thus ultimately bear on notions of unidirectionality, and would seem to demand some account from within the framework of grammaticalization.

1. Preamble

Many works in the grammaticalization literature have treated the principle of unidirectionality, a virtual axiom that underlies much of the explanatory value of grammaticalization. The basic idea behind the principle has always been the recognition that there is something “normal” or

2. Introducing lateral shifts

Lateral shifts can be defined as a change in the form of a grammatical affix that is not just a simple sound change (and so is a “higher level”, grammatical, change) but does not alter the element’s grammatical nature or status in terms of where it falls on the “cline” of grammatical status (from word to affix). Thus after the change, the element in question is neither more nor less gram-

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maternal than before, so it is a “movement”, in that change has occurred, but one that goes “laterally” on the cline, not up or down it.

This particular type of change can be exemplified by the following cases, all of which, as it happens, involve the reshaping of grammatical endings, in particular person/number/tense endings mostly of the imperfective aspect nonactive (i.e., middle or mediopassive) voice forms from the verbal system of Greek – mostly Modern Greek (MGrk) but some from Ancient Greek (AGrk). In all of these cases, an ending is altered in form, based on some other ending or endings in related paradigms. Each item is listed here with an indication of what the starting point is, what the related ending that affected the ending is, and what the final resulting ending is, with additional comments added as needed.

(1) Lateral Shifts in Greek Nonactive Voice Endings

- a. (AGrk) 2SG/3SG present nonactive endings *-sai* / *-tai* from earlier **-soi* / *-toi*, based on vocalism of 1SG present nonactive *-mai* (note: *-o-* seems original based on 2SG/3SG Past *-so* / *-to* (and note dialectal 3SG *-toi*))
- b. (MGrk) 3PL past nonactive ending: *-ondan* from earlier *-onto*, based on 3PL past active *-an* (with *-nt-* > *-nd-* by regular sound change)
- c. (MGrk) 1PL/2PL past nonactive endings: 1PL *-mastan* / 2PL *-sastan* from earlier *-aste* / *-saste* (reflecting AGrk *-me(s)tha* / *-esthe* mostly by regular sound change), based on the end part of 3PL *-ondan* (as in (b)), thus indirectly reflecting 3PL past active *-an*
- d. (MGrk) dialectal 3PL past nonactive ending *-ondusan* from earlier *-onto* based on 3PL past active *-san* (variant in sigmatic aoristic past of *-an* as in (b))
- e. (MGrk) further innovative dialectal 3PL past nonactive ending *-ondustan* from earlier *-ondusan* (as in (d)) based on 1PL *-mastan* and 2PL *-sastan* (as in (c), cf. Joseph 2004b; 2006)
- f. (MGrk) 1SG nonactive past ending: *-muna* from *-mun*, with *-a* added from 1SG past active

- g. (MGrk) 2SG nonactive past ending: *-sun* from earlier *-so* (cf. (a)), based on 1SG past nonactive *-mun* (cf. (f))
- h. (MGrk) further innovative 2SG past nonactive ending: *-suna* from *-sun* (as in (g)), with *-a* added from 1SG past nonactive (cf. (f) above), thus reflecting 1SG active form too indirectly
- i. (MGrk) 3PL past active ending *-ane* from earlier *-an*, based (at least in part) on 1PL past active *-a-me* and 2PL past active *-a-te*
- j. (MGrk) 3SG past nonactive ending: *-tan(e)* from *-ton*, with *-a-* vocalism and *-e* (taken over from 3PL past nonactive *-ondan* (as in (b)) with some influence likely too from past active, especially 3SG *-e* and 3PL *-ane* (as in (i)))

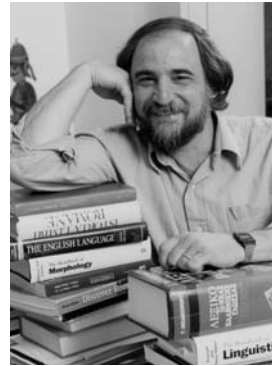
In terms of how to characterize these changes, it should be noted first that they show some effects of regular sound changes, as indicated, but only insofar as certain aspects of the consonantism is concerned (especially *-nt-* > *-nd-* and *-sth-* > *-st-*); everything else involves analogical influence and extension, also as indicated. The important observation here is that the endings before the change are no more grammatical nor any less grammatical than the endings after the change; in all these cases, the starting point and the end result are verbal endings realized as bound affixes on the verb that fulfill the same role in the verbal system and within paradigms, marking person, number, and tense, and associated with a particular verbal voice. It is true, of course, that some of these endings can be analyzed as being built up out of freer pronominal elements. This is especially the case with the plural set of *-mastan/-sastan/-ondustan* (in (1c/e), where the weak object/possessive pronouns *mas* ‘us/our’, *sas* ‘you/your’, *tus* ‘them/their’ can be identified in the middle of these endings and in fact probably played a role in shaping the ultimate form of the endings (cf. Ruge 1984). Thus for that set at least, the forms seem to have moved somewhat in the direction of being less grammatical, in the sense of being less tightly bound and more agglutinative (as opposed to previously more synthetic state). But for the most part, there is no change in grammatical status occasioned by these changes in form.

Moreover, these shifts are not *exaptation*, in the sense of Lass (1990), as the material involved is neither “junk” nor “marginal” material (to use Lass’s characterization) but rather pieces of existing endings with some value of their own (e.g. *-a* associated with 1SG, *-e* with 3SG, *-(s)t-* with 1/2PL, etc.). Nor are they just “phonogenesis” (in the sense of Hopper 1994), the mere adding of “bulk” to the endings, as new possibilities for internal segmentation arise with these re-formations; for instance, the 2SG *-suna* of (1h) can be segmented as *-s + un + a*, inasmuch as the 1SG *-muna* of (1f) and 1SG active *-a* endings provide a basis for such a segmentation. Furthermore, these shifts are not *regrammaticalization*, in the sense of Greenberg (1991), as there is no *desemanticization* of the sort that Greenberg discusses. In fact, one could argue that in some of these changes, greater meaning is invested in the pieces. For instance, in (1e), with the reformation of the 3PL ending to *-ondustan*, the *-(s)t-* has become more meaningful rather than less so (or at least differently meaningful), coming to be associated with plurality (*-mastan/-sastan/-ondustan*) rather than just non-3rd person.

Finally, it seems that such lateral shifts are likely to be quite numerous. There are twelve examples of ending-change in (1), and ten of those come from the relatively recent history of Greek alone, i.e., just a single language and just one piece of the verbal system for the most part (the past nonactive), so that not even all verbal paradigms are taken into consideration. If that many examples could come from that one rather small slice of language data, one has to wonder how many more there would be if we extrapolate from that one language to all languages, cover greater time periods, consider other parts of the verbal system, and add in noun inflection as well. On that basis, it seems safe to say that lateral shifts are probably not some marginal sort of development but a robust class of changes that is well instantiated.

3. Some consideration of unidirectionality in grammaticalization

Before turning to the relevance of lateral shifts for various views held within the study of grammaticalization, some consideration of unidirectionality is in order. This notion, as noted above, is gener-



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ally held to be a bedrock principle in grammaticalization (see, e.g., Hopper and Traugott 2003 [1993], Chapter 5, Haspelmath 1999; 2004, Traugott 2001; 2002, Ziegeler 2003; 2004, among others). At the same time, though, it has been the focus of some critical studies, such as Newmeyer (1998), Lass (2000), and especially Janda (2001). Janda suggests that the question of whether grammaticalization is unidirectional is not an empirical question at all but rather merely a definitional or terminological issue, noting that an activity such as “walking north” is a “unidirectional process” and any deviation from that direction is not walking north; thus if one says that grammaticalization is always in the direction of greater grammatical status for the elements involved, then a change that decreases the grammatical status by definition cannot be grammaticalization. He argues that if this is all that is involved in “unidirectionality” vis-à-vis grammaticalization, then there is no empirical content behind the claim: if unidirectionality is built into the definition of grammaticalization as movement in one direction along a

“cline”, then any movement in that direction (and bear in mind that for any given change, it can only move in one direction at a time) is grammaticalization and is trivially unidirectional; consequently, unidirectionality is trivially valid. In such a view, no counterexamples are possible, inasmuch as any “counter-directionality” would by definition not be grammaticalization and would thus fall outside the purview of grammaticalization. Thus the numerous examples that Janda amassed of an element moving from being more grammatical in nature at one stage to being less grammatical in a later stage of a language are, under such a view, irrelevant for grammaticalization since they would not qualify as grammaticalization according to a definition that incorporates unidirectional movement towards greater grammatical status into it.

To my way of thinking, Janda’s is a devastating critique that renders the relationship between grammaticalization and unidirectionality void of any real interest. Recognizing the potential problems posed by his critique, some scholars, in an apparent attempt to give some empirical content to the notion of unidirectionality, have redefined “grammaticalization” in such a way as to remove from the definition the element of movement in a particular direction along a cline of grammatical status. Haspelmath (2004, 26) has taken such an approach, redefining grammaticalization as follows: “A grammaticalization is a diachronic change by which the parts of a constructional schema come to have stronger internal dependencies”.

Another solution to Janda’s critique would be to simply “bite the bullet” and accept that there can be movement involving grammatical elements both “up and down the cline”, so that unidirectionality – or, better, movement in the direction of greater grammatical status – becomes a recognizable tendency in, but not an inviolable constraint on, grammatical change. To some extent, this sort of approach is taken by almost all grammaticalizationists, since one often sees statements about directionality in grammatical change that are essentially statistical in nature. Haspelmath (2004, 22) for instance says that “grammaticalization is overwhelmingly irreversible”, a position which entails that it is indeed reversible even if only rarely so. Similarly, Heine (2003, 582) discounts the import of “counter-directional” gram-

matical changes by saying that “such cases are few compared to the large number of examples that confirm the hypothesis [of unidirectionality]”, essentially a statistically based counter-argument. Still, I would argue that the issue of statistical preponderance of grammaticalization as opposed to “counter-/de-/anti-grammaticalization”, often claimed as a reason for being able to ignore any examples of counterdirectional developments, is a nonissue in the absence of any meaningful way of counting tokens of the former or the latter; that is, it simply is not clear what ought to count as a token of change to greater or lesser grammatical status: each acquisition by a given element of some feature indicating greater grammatical status or only a particular accumulation of such features, developments with a single element or with a set of related elements, or just what?

As an aside, but an important one, let us consider a question that is rarely addressed in the literature on grammaticalization, namely why unidirectionality is considered to be such an important principle for grammaticalization. That is, could there be the phenomenon of grammaticalization without an insistence on movement only going in one direction on a scale of grammatical status? The one answer that I am aware of in the literature is instructive: here is Haspelmath (2004, 21–22) on this topic:

It seems to me that it is undeniable that the unidirectionality in grammaticalization is by far the most important constraint on morphosyntactic change, simply because grammaticalization changes are so ubiquitous [...] unidirectionality in grammaticalization is very important in practical terms for the historical-comparative linguist. Suppose we have two related languages with no historical documentation, and one of them has a future-tense affix that looks similar to a future-tense auxiliary of the other language. If both directions of change were equally likely, we would not know what to reconstruct for the ancestor language. But because grammaticalization is overwhelmingly irreversible, the historical linguist can safely reconstruct the future auxiliary for the protolanguage in this case.

That is, for Haspelmath, the paramount importance of unidirectionality is in its value in guiding linguists in doing reconstruction. My reaction to this may seem flippant, but I believe it is a serious point: engaging in historical linguistic reconstruc-

tion is fun, to be sure, and moreover, when one can do it and feel that one has it right, there certainly is some satisfaction and we gain some indirect insights into likely paths by which attested forms arose. However, it would be possible to do historical linguistics and study language change without ever doing any reconstruction; that is, reconstruction is a nicety that arises out of the linguist's intellectual curiosity, but it is hardly an essential part of understanding language change *per se*. It is certainly helpful when one is trying to understand language relationships, and as noted it can provide indirect evidence of change, to the extent that we believe in the validity of the reconstructions. But, reconstruction is really more for the linguist than for the speaker: a language changes whether or not anyone has any idea about how to reconstruct its ancestors. Thus I would argue that we must not confuse what is interesting or desirable for a linguist to be able to do with what actually happens to languages and what speakers do with their language through time. In this regard, the statement of Klammer (2004, 320) is particularly apt:

Synchronically, speakers may have two, three or more interpretations of the same form available [...]. It does not imply however that speakers are necessarily aware of the (historical) relation between the competing interpretations, since a historical scenario is a linguist's construct and does not necessarily reflect a speaker's perspective.

Nonetheless, if the premise is accepted that unidirectionality is indeed a principle, a constraint as it were, that governs grammatical change, and moreover that it is even an important one, then it seems fair to accept the following additional premises. First, it should be a constraint on all types of grammatical change, that is on any change involving a grammatical element; in this way there is no concern about devising an increasingly restrictive and very precise definition of "grammaticalization", nor is there any quibbling about whether a given development is grammaticalization or lexicalization or something else. This stipulation would seem to be an essential one in order to avoid the definitional trivialization of unidirectionality noted above. Second, it should not matter how a reversal might take place, that is whether the reversal occurs via a pathway that exactly mirrors the steps by which an element

might move from less grammatical to more grammatical or via some other pathway, as that added parameter introduces another variable into the formulation of unidirectionality.

With these additional considerations in mind, two possibilities exist for what unidirectionality might mean, as discussed in Joseph (2004a):

- (2) Two versions of unidirectionality
 - a. There is *no* movement from more grammatical to less grammatical
 - b. There is *only* movement from less grammatical to more grammatical

The consequences of lateral shifts for these two formulations of unidirectionality are taken up in the following section.

4. Unidirectionality and grammaticalization versus lateral shifts

A comparison of what each of the versions of unidirectionality in (2) entails with regard to lateral shifts reveals that (2a) is the weaker of the two, in that it allows lateral shifts. In a lateral shift, it is not the case that an element is moving from more to less grammatical, rather it is equally grammatical before the change and after the change, so that (2a) is not violated. By contrast, (2b) is a stronger constraint in that it rules out lateral shifts, since by (2b) the only type of change is from less to more grammatical and a lateral shift is not such a change; rather in a lateral shift there is no movement up or down a cline of grammatical status.

It can be noted in passing that lateral shifts produce some forms that run contrary to Haspelmath's revised definition of grammaticalization, given above. In particular, the apparent agglutativity in the *-mastan/-sastan/-ondustan* set (cf. (1c/e)) as a result of the recognition of object pronouns within the endings (as noted above, based on Ruge's analysis), derives from an earlier more synthetic character, inasmuch as the endings were unanalyzable in prior stages of Greek; thus there is in such modern endings a weaker rather than "stronger [set of] internal dependencies". But it may be then that one would say that the development with the *-mastan/-sastan/-ondustan* set is not grammaticalization since it does not adhere to Haspelmath's definition.

Moreover, Haspelmath (2004, 25) states that “at least since Meillet (1912) it has generally been recognized that analogy is another important source of grammatical items, besides grammaticalization”. Thus, inasmuch as in the presentation of the facts in (1) the form taken by the endings in each case was based on an existing model of some sort within the Greek verbal system, analogy (understood in the broad sense of the influence of one form over the shape of another) can be recognized as operative in the reshaping of the endings. On those grounds, therefore, one could say that these lateral shifts are not “grammaticalization” and thus (even if interesting in their own right) they would be of no concern to the grammaticalizationist. In other words, they are (simply) analogy.

This may well be the case, and indeed, it is hard to see how these reshaping are anything but analogical in nature. However, can they be ignored by the grammaticalizationist? I would argue that they are undoubtedly a type of grammatical change and thus a priori would seem necessarily to be relevant to any consideration of grammaticalization. Moreover, based on the broad view of unidirectionality advocated here that leads to the characterizations in (2), they cannot simply be treated as outside the purview of grammaticalization (as some have done with regard to changes called “lexicalization”, as with the now-famous case of *ism* and the many other such “upgradings”). Moreover, although this is not a prerequisite for consideration as grammaticalization, lateral shifts do seem to be numerically robust and (apparently) quite common. Thus it is harder to ignore them. As a result, one cannot simply declare such instances to be statistically insignificant or in a distinct minority – as Heine (2003) and Traugott (2002) do with particular reference to the developments Lass (1990) calls “exaptation” and Greenberg (1991) labels “regrammaticalization”.

Moreover, if grammaticalization is increasingly (re-)defined so as to refer just to movements in one direction on a cline, then, despite what Haspelmath says, the characterization of the (epi)phenomenon becomes more and more restricted and thus less and less interesting. One has to wonder why one particular type of grammatical development should be the object of such intense interest but not other types. Also, is it not possible to have effects that look like grammaticalization (in the

classical sense of movement towards greater grammatical character) via analogy? I have argued elsewhere (Joseph 2001) that such is precisely the case with the emergence of a weak subject pronoun (e.g. masculine singular *tos*) in early Modern Greek. One has to wonder therefore if the dichotomy Haspelmath sets up between grammaticalization and analogy is really a valid one.

To conclude this section, the moral seems to be that lateral shifts cannot be ignored and cannot be swept aside into some other category of grammatical change. Rather, they appear to be relevant to any consideration at all of grammaticalization and unidirectionality. They therefore tell us that the strong form of unidirectionality, (2b), is too strong and must be rejected.

5. A related issue – On the origin of grammatical morphology

The principle of unidirectionality has been taken by some to mean that there is a lexical source for all grammatical morphology. Hopper and Traugott (2003 [1993], 132), for instance, have claimed that grammatical items are not “innovated without a prior lexical history”, though the necessity of this interpretation is disputed, e.g. by Haspelmath (2004). Indeed, if elements do not move up the cline towards lesser grammatical status, so to speak, and the only movement is down the cline towards greater grammatical status, then lexical items are the ultimate source of grammatical morphemes. And, to be sure, some very strong views have been expressed on this matter, extending this view not just to “grammatical items” but to “grammatical morphology” more generally. Ziegeler (2003, 225), for instance, has said that “there is virtually no empirical evidence demonstrating that grammatical morphology may arise without undergoing development through earlier stages in which it had lexical functions”.

Although “prior lexical history” and “lexical functions” are somewhat vague notions, making it hard to know just how to apply new data to test these claims, it is clear that lateral shifts of the sort described and exemplified here introduce “grammatical morphology”. In particular, the segmentable *-t-* (with a new value of plural, not non-3rd person) in Greek *-mastan/-sastan/-ondustan*, and the segmentable *-un-* (associated with 1/2SG now)

in *-muna/-suna*, are both newly emerging grammatical morphology, yet they do not show any evidence of earlier stages with “lexical functions”. Thus, as has actually been known for a long time, grammatical endings can develop out of other grammatical endings, in a variety of ways (e.g. reanalysis, as with German inflectional plural suffix *-er* out of an earlier derivational morpheme (**-es-* stem-forming suffix), accretion onto suffixes as with Latin *-nus* → *-a:nus* via resegmentation of suffix attached to *-a:-stems*, etc.).

6. Conclusion

Lateral shifts are nothing new; as noted, they have been recognized (though perhaps not labeled as such) by numerous scholars over the years as essentially a recurring aspect of morphological change in languages. Moreover, they are ubiquitous. Thus whether or not lateral shifts constitute “grammaticalization” in some sense of the term, it would seem that it is at one’s own historical linguistic peril to ignore them, and to think that we have nothing to learn from them seems shortsighted.

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