

## REANALYSIS AS A RESPONSE TO GRAMMATICALIZATION

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Reanalysis and grammaticalization are sometimes seen as two conflicting theories of language change, sometimes as complementary theories. Reanalysis (cf. Lightfoot 1979) is considered essential in theories that focus on acquisition, for instance, in Government-Binding (Chomsky 1981) and Minimalist (Chomsky 1992) frameworks. Within these theories, language acquisition is seen as the construction of a *grammar* by the child with the help of (a) *universals* and of (b) the *language* the child hears spoken. Grammaticalization is a gradual process through which words lose lexical meaning, morphological independence and obtain more grammatical function (e.g. Lehmann 1985; Heine et al. 1991; Traugott & Heine 1991, and earlier research indicated in these). There is a debate as to whether this process is reversible, i.e. whether words can lose grammatical function and obtain lexical meaning. I will assume they do and give an example of this.

In this paper, I examine three changes that can be seen as responses (reanalyses) by the language learner of grammaticalization. The first two changes involve the infinitival markers to and for. To is initially a preposition, changes to Case marker and to tense marker. This seems an instance of grammaticalization to which the language learner responds by reanalysing the category from P to Auxiliary. A problem with this change is that to, even though it loses semantic content (meaning of direction is lost), does not become more morphologically dependent. On the contrary, it changes from what could be called a prefix to an independent auxiliary.

The third change I examine involves the progressive construction with on. There is, already in Old English, a 'progressive' form, namely be followed by a Verb in -ing. In Middle English, another way to express the progressive is introduced: be on/an followed by a verb ending in -ing which disappears by (standard) modern English. I will argue that on/an is becoming a prefix and is losing its meaning of 'being located

in a particular way' at the same time this progressive construction is introduced. Thus, the introduction of on in progressive constructions can be tied to the grammaticalization of on (e.g. on live becomes alive). The problem here is why on is seen as an Aspect marker in Middle English, Dutch (aan het with infinitive) and Egyptian (hr with infinitive<sup>2</sup>, to name a few.

A general problem with grammaticalization is what causes it (if it is caused by 'word-fatigue', why does it reverse itself in degrammaticalization). Is a 'push-chain/drag-chain' explanation likely? I will indicate a number of problems with grammaticalization and indicate ways of solving these (e.g. tense features are separate from the actual positions).

The outline is as follows. In section 1., I discuss the changes concerning to and in 2., the changes concerning for. Section 3 deals with on. These two changes cannot straightforwardly be explained as an interplay between grammaticalization and reanalysis and section 4 is an attempt to outline some of the problems raised and possible answers.

1. From Preposition to Auxiliary: to

In this section, I show that in Middle English to is a preposition of location, then a Case marker, then a tense marker. This indicates grammaticalization. I also show that the position in which to is situated changes from P to I and from prefix to independent element.

In Old English, as is still the Case in Modern English, to is a Preposition used to indicate location as in (1). In the course of Old English, to gets to be used as an indicator of dative Case as in (2)<sup>3</sup> and the first instance of to in (3) and as a marker of nonfiniteness, i.e. non-tense, in (3):

- (1) Dream of the Rood, 2  
hwæt me gemætte to midre nihte,  
'what I dreamt at mid night'.
- (2) O.E.Chronicle, an. 1123  
se biscop ... side to þam kyng,  
'the bishop ... said to the king'.  
(Visser 624)
- (3) Laws 42, Ælf., Intr. c. 49a

God self sprecende was to Moyses  
 7 him bebed to healdanne,  
 'God himself was talking to Moses  
 and ordered him to be loyal'.  
 (Callaway 45).

Mustanoja (1960: 95) says that it is only in late Old English that the preposition to is used as a replacement of the dative Case. Visser (624) similarly claims that it occurs at the beginning of Middle English.

With respect to the position of to, I now show that the to which has grammaticalized into a tense marker is a prefix in early Middle English texts such as Katherine and Wohunge of Ure Louerd, which are from the first part of the thirteenth century. Thus, grammaticalization results predictably in a loss of morphological independence. In (4) and (7), the object precedes (for)to and in (5) and (6), adverbs do. Since there is no evidence for a functional category between C and the VP (cf. van Gelderen 1989), to must be on V:

- (4) K 284  
 't i þis world iset us for to frouin',  
 'and placed in this world to comfort us',
- (5) Idem, 312  
 't fend on þus to speokene,  
 'and started to speak thus'.
- (6) Woh 45-6  
 leuere ham were eauer mare in wa for to welle  
 7 o þ welefulle wite eauer mar to loken.  
 þen in alle blisse beon 7 forgan þi sihðe.  
 'preferable to them is ever more in woe to well/boil  
 and on that pleasant face ever more to look  
 than to be in all bliss and to forego  
 the sight of you'.
- (7) Idem, 37-8  
 al engles lif is ti neb to bihalden.  
 'all angels' life is thy face to behold'.

In Hali Meidenhad, a text of the same period and area, the situation is unclear. Sentence (8) is typical in that objects do not precede. The only case where an object precedes to is (9) but this can be shown to be a 'double object' where a Verb is complemented by an NP and infinitival complement. This non-occurrence of objects before to might be a coincidence. On the



- 'until he came to a wood'.  
 (18) Idem, Cal. 10093  
 þat he com in ane wude.

Yet, when to occurs by itself in Otho (as in Caligula but that is expected), objects precede it still. Thus, in (19), his lond precedes to:

- (19) Layamon, Otho 2432  
 healp his lond to winne,  
 'help his land to get'.

What I have shown so far is that the to used to indicate non-finiteness changes its position from prefix to C, i.e. it becomes more independent around 1275. I will now show it gets to be situated in I (or T). This change solidifies the independence of to.

To becomes an independent auxiliary<sup>s</sup> around 1380 when pro-infinitives as in (20), do in its modern English use as in (21) and split infinitives as in (22) start to occur. Handlyng Synne is a text from 1300 and the others (Chaucer and Wyclif) are from around 1380:

- (20) Handl S 8023-4  
 But wyle þe alle foure do  
 A þyng þat y preye þow to,  
 'but will all four of you do  
 a thing that I ask you to'.  
 (21) Chaucer, The Monk's Tale 442  
 fader, why do ye wepe?  
 (Visser 1552)  
 (22) Wyclif, Matthew 5,34  
 Y say to þou, to nat swere on al manere,  
 'I say to you, to not swear completely'  
 (Visser, p. 1040)

In (22), to can be separated from the infinitive; in (20), it can be left when the VP deletes. The 'introduction' of modals, not shown here, and the appearance of do as in (21), in complementary distribution with modals and to, also indicate there is now a special position, i.e. T. ACIs also start to occur around 1380 as (23), from a text from that period, shows. If one analyses

these as in Massam (1985), they involve IPs and would therefore be expected to occur once I becomes available. Thus, this analysis involves treating to as occupying I:

- (23) Wyclif, Luke 8, 46,  
I have knowe **vertu to haue gon out of me**,  
'I have known virtue to have gone out of me'.
- (24) Idem Acts 27, 27,  
the schippe men supposiden  
**summe cuntre to apere to hem**,  
'the sailors supposed some country to appear to them'.
- (25) Pecock, The Donet, 104, 7,  
I beleue **euerlasting liif to be or to come**,  
'I believe everlasting life to exist or to come into  
existence'.  
(Visser, 2313; 2315; 2309)

In this section, I have shown that (a) to grammaticalizes, and (b) the position in which to is generated is reanalysed. These changes are not dependent on each other. To is already 'grammaticalized' when it changes position. That a grammaticalized element changes from a prefix to an independent auxiliary is a problem for a strict grammaticalization analysis (as in e.g. Lehmann 1985), but not for reanalysis and a theory of tense which separates tense features from a particular position (van Gelderen to appear): the child infers that to is the marker of [-tense] features and to is situated somewhere. In early Middle English, it is situated as a prefix on V, whereas in modern English, it is a separate element in I (or T). Thus, tense should be seen as a set of features which occupy a position.

## 2. From Preposition to Complementizer: for

For also changes from a preposition to a Case marker and to a complementizer (and [+fut] tense marker). In Old English, for is used as a preposition indicating location. This use continues till e.g. Shakespeare as in (26):

- (26) All's Well IV, iv, 3  
**For** whose throne 'tis needful to kneele.



[+past] and those with a complement not expressing tense. To capture this distinction, I claim that in the case of the former [-fut] is situated in C, whereas in the latter [+future] is. For is only possible for Complementizers that are [+fut] and for can therefore be seen as a marker of [-tense].

Another problem in an account as Lehmann's is that after for as a preposition assigns Case in (27) above becomes a tense marker not assigning Case as in (31) to (34), it becomes a complementizer assigning Case again'. This latter usage starts for adjuncts in 1380 as in (35); for complements as in (36), it starts gradually (Verb by Verb) after 1380; for subjects it starts after 1567 (Visser 957):

- (31) Layamon, Brut, Otho 7630  
ane mochele club. for to breke stones,  
'a mighty club to break stones.'
- (32) Layamon, Brut, Otho 5523  
þat lofde for to segge riht,  
'that loved to speak right'.
- (33) Hali M Bodley 353  
forhohe forte don hit þet þu þuncheð uel of,  
'Scorn to do that which you think evil of'.
- (34) Idem, Titus 361  
forhohe for to don hit þat te þuncheð uel of.
- (35) Wyclif, Acts 23, 24  
make 3e redi a hors for poul to ride on,  
'make a horse ready for Paul to ride on'.  
(Visser 988)
- (36) Chaucer, CT I, 786  
Whan man or womman preyen for folk to auancen  
hem only for wikked fleshly affection.  
(Visser 2247)

The ability to assign Case as in (35) is not necessarily a sign of greater grammatical functionality. For instance, Verbs, generally seen as lexical, assign Case (in most accounts except Chomsky 1992) but auxiliaries, seen as less lexical, do not. Thus, for being able to assign Case might be argued to be a case of *degrammaticalization* (as in e.g. Ramat 1992).

In a reanalysis account, morphological dependence and grammatical function are not linked together. Hence, there is no problem. The directionality then would be for elements to change from dependent to independent elements and vice versa and



from Case assigning to non-Case assigning elements and vice versa.

What remains to be explained, also in a theory such as Lehmann's and Heine's, why a preposition indicating 'placed in front of' is grammaticalized as 'for the benefit of' and 'for the following reason'. This is similar to the problem of on, to be discussed in the next section: what makes that on and its equivalent in other languages is selected to express continuity?

### 3. From Preposition to Aspect marker: on

I will first provide some background on the progressive construction with and without on. Subsequently, I will focus on on.

Progressive constructions be it with a Verb ending in -ende, or -ob(e), have occurred all through the history of English (Visser 1993). Old English examples are (37) and (38):

(37) Aelfred, Boethius 18,  
mid þam þeowum ic eom ealne þone hefon ymbhweorfende,  
'with these servants, I am all the heaven  
encompassing'.

(Mossé 1938, I: 79)

(38) Lambeth Homilies 41  
þe þer were wuniende,  
'who there were living'.

(Mossé 1938, I: 81)

This form in -ende (or -ande or -inde) assigns accusative Case (ealne and þone in (37) are accusative) to its object. It is often argued that in Old English these participles are seen as as adjectives (cf. Mossé 1938, I: 3) and that the constructions involve copulas followed by adjectival forms. The form in -ing is a Middle English innovation, but whether it is a direct continuation of the -ende form is contested (see Mossé 1938: II, 36 and Jespersen, MEG V, 415)<sup>8</sup>.

However, sentences (40) and (41), have quite a different structure. Their origin can be found in Old English, as (39) show, according to Visser (p. 1993):

(39) De Eccles. Gradibus

Exorciste beoð on getacnunge Cristes gespellan,  
'E. is on teaching Christ's story'.

(Visser 1998)

(40) Layamon, Brut Caligula 6139

he was an slæting,  
'he was hunting'.

(41) Pepys' Diary 31 Dec

I am upon writing a little treatise.

These sentences must have been construed by the language learner as PPs because prepositions occur: an in (40), upon in (41) but in other cases, on, at, a and in also occur. There is, however, never a Determiner, as there is in e.g. Dutch, shown in (42):

(42) Ik ben een boek aan het lezen,

'I am a book on the reading',  
i.e. I am reading a book.

Sentences such as (43) to (45) might seem similar to the Dutch ones but they start occurring relatively late:

(43) He is on the run.

(44) He is on the make.

(45) She is on the take<sup>9</sup>.

Checking the OED, sentences such as (i) turn out to be rather recent innovations. Partridge's Slang Dictionary lists on the run as introduced in the latter part of the nineteenth century and on the make as introduced in the 1890s from US slang. This is accounted for if the P initially<sup>10</sup> selects a VP. I will, in this paper, however, not dwell on the exact analysis of the entire construction. The emphasis is on on.

The grammaticalization of on is a process that starts early on in a variety of constructions. For instance, between the two versions of Layamon's Brut, many sentences such as (46) and (48) change to sentences such as (47) and (49), i.e. ones where on becomes a prefix (and as a result the PP becomes an Adverb Phrase):

(46) Cal. 161

- Wa wes him on liue,  
 'Woe was him in life'.  
 (47) Otho, Idem  
 Wo was him a-liue.  
 (48) Cal. 1494  
 mare þan is on liue,  
 'more than is in life'.  
 (49) Otho, Idem  
 more þan alle þat his a-liue.

In both Caligula and Otho, the progressive with preposition occurs. Both the verbal endings and the prepositional forms vary widely. In both manuscripts, an, a, at as well as -yng(e), ing(e), enge occur. It seems that the situation is very unstable around 1250.

What is happening with on: changes from an independent word to a prefix on the Noun to a disappearance (the latter in progressives. This is predicted in grammaticalization. The entire unit becomes an adjective. If going in 'he is going' is an adjective expressing a continued state, the on is reanalysed as an indicator of adjectivehood, i.e. of a certain quality over time.

As mentioned before, the problem is why on is used in such a variety of languages and not over, for or to.

#### 4. Grammaticalization and Reanalysis

Whether grammaticalization proceeds in a push or drag chain manner is hard to figure out. For instance, the interrelation between loss of Case and the rise of prepositions is well-attested. However, which change occurs first and which is the reaction is unclear.

Lehmann (1985) argues that what explains grammaticalization (if not its direction) is creativity by the speakers. Speakers like to be creative. So they would start using a preposition as a marker of e.g. cause. This is what I have called 'word-fatigue'. It may be the case that speakers wish to be creative, but there is, in this account, no explanation for why the creativity goes in the direction of losing lexical meaning and not the other way round. For Lehmann, the *unidirectionality* is essential: if words acquired lexical meaning and independence,

this "would presuppose a constant desire for understatement, a predilection for litotes. Human speakers apparently are not like this" (1985: 315). I see no reason why creativity goes in this direction and not the other way round.

## 5. Conclusion

In van Gelderen (1992; to appear) I have argued that features such as tense are not automatically connected with a particular node: in English, they are in I (or T), in Dutch and Old English, they are on V or C. If one, in this way, splits up 'tense' into tense features and positions where those features are located, grammaticalization and reanalysis are different from the traditional view. To is seen as a tense marker but can be placed in C, I or V. If the analysis presented in section 1 of to is correct, grammaticalization involves to being seen as a holder of features such as tense. Whether it is a prefix or independent is irrelevant. This accounts for the fact that even though to acquires more grammatical function, it can become more independent. Reanalysis, in this model, means that a child learning a language assumes the tense features are in I; a child learning another language may assume they are in C.

As to the question of what causes these changes, neither grammaticalization nor reanalysis have real answers as to why change occurs. Reanalysis responds to changes happening in a language, as a result of e.g. contact with another language or of innovations by individual speakers. Grammaticalization is by some seen to be the latter (cf. Lehmann 1985): linguistic creativity but why this takes the direction it takes is not clear.

## Texts used

- Brook, G. L. & R. F. Leslie (eds), Layamon: Brut, Oxford: Oxford University Press, 1963 edition of EETS 250.
- Einenkel, E. (ed), The Life of Saint Katherine, EETS 80, 1884.
- Colborn, A. F. (ed), Hali Meiohad, Copenhagen: Munksgaard, 1940.
- Klaeber, F. (ed.) Beowulf, Boston: Heath and Company, 1950 edition of 1922.

- Krapp, G.P. (ed.) Vercelli Book, London: Routledge, 1932.  
Oxford Text Archive, Layamon's Brut, computer readable version,  
Oxford.
- Sullens, I. (ed), Robert Mannyng's Handlyng Synne, Binghampton,  
1983.
- Thompson, W. M. (ed), De Wohunge of Ure Lauerd, EETS, vol 241,  
Oxford University Press, 1958.

## References

- Callaway, M. (1918), The Infinitive in Anglo-Saxon, Washington:  
The Carnegie Institute.
- Chomsky (1981), Lectures on Government and Binding, Dordrecht:  
Foris.
- Chomsky, N. (1992), "A minimalist program for linguistic theory",  
MIT Occasional Papers in Linguistics 1.
- Fischer, O. (1989), "The Rise of the For NP to V Construction",  
in An Historic Tongue, Nixon, G. & J. Honey (eds), London:  
Routledge: 67-88.
- Gardiner, A. (1927), Egyptian Grammar, Oxford: Griffith  
Institute, 1988 edition.
- Gelderen, E. van (1989), "The Rationale behind Split  
Infinitives", in Archiv für das Studium neueren Sprachen und  
Literaturen 141: 1-18.
- van Gelderen, E. (1992), "Features and Categories", Language and  
Cognition 2, Gilbers, D. and S. Looyenga (eds): 65-76.
- van Gelderen, E. (to appear), The Rise of Functional Categories,  
to appear with John Benjamins, Amsterdam.
- Haspelmath, M. (1989), "From purposive to infinitive", Folia  
Linguistica Historica: 287-310.
- Heine, B., U. Claudi & F. Hunnemyer (1991), Grammaticalization,  
Chicago: University of Chicago Press.
- Lehmann, C. (1985), "Grammaticalization: Synchronic Variation and  
Diachronic Change", Lingua e stile 20.3: 303-318.
- Lightfoot, D. (1979), Principles of Diachronic Syntax, Cambridge:  
CUP.
- Massam, D. (1985), Case Theory and the Projection Principle, MIT  
PhD.

- Mossé, F. (1938), Histoire de la Forme Périphrastique être + participe présent en germanique, Vol. I et II, Paris.
- Mustanoja, T. (1960), A Middle English Syntax. Helsinki, Societe Neophilologique.
- Nagucka, R. (1984), "Explorations into syntactic obsolescence: English a-X-ing and X-ing", in Historical Syntax, J. Fisiak (ed). Oxford English Dictionary (1933), Oxford: Oxford University Press.
- Partridge, E. (1979), A Dictionary of Slang and Unconventional English, London: Routledge & Kegan Paul.
- Ramat, P. (1992), "Thoughts on Degrammaticalization", Linguistics 30: 549-560.
- Traugott, E. & B. Heine (1991), "Introduction", in Approaches to Grammaticalization, Amsterdam: John Benjamins: 1-14.
- Visser, F. (1963-73), An historical syntax of the English language: 3 Volumes, Brill.

#### Notes

1. Thanks to the audience at the Deutsche Gesellschaft für Sprachwissenschaft, held in March 1993 in Jena. In particular I would like to thank Ulrike Demske-Neuman and Olga Fischer.
2. cf. Gardiner (1927, 1988 edition: 228) who claims that hr 'upon' with infinitive is action in progress.
3. This is "observed in LME prose" (Mustanoja 1960: 96).
4. In the Bodley 34 edition, forte is always used even though there is no difference in infinitival constructions and endings. This may indicate that forto is seen as one element.
5. As against e.g. Haspelmath (1989: 296) who argues that there is grammaticalization of zu in German but asserts that to in Old English is independent and "probably a proclitic" in Modern English.
6. In the Bodley 34 edition, forte is always used but there is no difference in infinitival constructions and endings.
7. Olga Fischer pointed out another scenario. She argues (1989) that the use of [for NP to VP] constructions is a continuation of the benefactive construction since it first occurs with impersonals. My data do not seem to point to that.

8. In many texts, for instance, Handlyng Synne, both forms occur:

- (i) Handl.S 1760  
where þe dragun was wonande,  
'where the dragon lived'.
- (ii) Handl.S 8500  
where þe olde man wonyng was,  
'where the old man living was'.

This points perhaps to the -ing form being a direct continuation of the -ande form.

[see also Kat, Logan, p. 190]

9. In English, at is still used for this purpose in fixed expressions: he is at lunch; she is at work.

10. There is only one Old English object that Visser lists in many pages of listings without of to indicate the form in -ing is a verb.