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Metre and clitics in Old English and Old Saxon

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This article attempts to extract prosodic information from Germanic (here, Old English and Old Saxon) alliterative poetry by integrating multiple theoretical frameworks. The metrical theories of Sievers (1893), particularly in the revised version of Russom (2022), provide an initial assessment of low-stress elements in verse. The quadripartite clitic analysis of Anderson (2005) is used to provide a phonological interpretation of these distinctions. It is argued that prepositions are typically PWord enclitics, prefixes are Affixal proclitics, and demonstratives show a shift from PWord clitics to Free clitics, corresponding to their development into definite articles.

1 Introduction

One of the most common pieces of prescriptive grammar that I grew up with was "don't end a sentence with a preposition". At least some of the poets composing early Germanic alliterative poetry seem to have had almost the reverse rule: don't begin a sentence (or rather, a clause) with a preposition. A good illustration of this is provided by the opening line of *Beowulf*:¹

(1) Hwæt wē Gār-Dena in geār-dagum indeed we Spear-Danes.GEN in yore-days
 "We indeed (have heard about the power) of the Spear-Danes in days of yore"²

As transmitted, every detail of stress, metre, and syntax conforms to the normal expectations of Old English poetry – but if the second half-line were to be placed first, so that the sentence began simply with the fronted prepositional phrase *In geār-dagum, the result would be a strikingly anomalous configuration.

This restriction, along with a related suite of issues concerning the behaviour of "particles" in Germanic verse forms, has long been noticed, and approached from various angles, with some mixture of phonological, syntactic, metrical, and stylistic constraints generally being used to explain why certain unstressed elements seem to have limitations on where they can occur. The potentially relevant factors are complex, and matters are not made easier by philological problems in the texts, and frequent ambiguities as to how many passages should be parsed syntactically. In this contribution to the problem, I do not intend to settle the matter once and for all, but merely to attempt an integration of metrical, philological, and linguistic approaches that might, despite some outstanding difficulties, be mutually illuminating. Metrically, I turn to the so-called word-foot theory of Russom (1987; 2022), which adopts a more fine-grained approach to "weak" elements in alliterative verse than most models. On the philological side, I will first attempt to reframe the basic data, highlighting the improvements made by, e.g., Whitman (1993: ch. 3) and Momma (1997: ch. 5), to the still-influential discussion of Kuhn (1933). And linguistically,

¹ Citations from *Beowulf* are adapted from Fulk & Bjork & Niles (2008). Other Old English poems are cited in the first instance from Krapp & Dobbie (1953). For *Genesis A*, I refer further to Holthausen (1914) and Doane (2013). For *The Battle of Maldon* I use Griffith (2024). Old Saxon poetry is cited primarily from *Heliand* MS C, as edited by Sievers (1878), with reference to Behaghel & Taeger (1996). The shorter *Heliand* fragments can be found in Sievers & Schröder (1935), Bischoff (1979), and Schmid (2006). *Genesis* is edited by Doane (1991) and Schwab & Schuba & Kugler (1991). In general, citations retain or are provided with editorial length marks, hyphenation of compound elements, and interpuncts to set off unstressed prefixes, but not with palatalization marks. Syllables written by scribes but which should be ignored for scansion are written superscript. I discuss any non-trivial editorial issues in footnotes. The linguistic notation used is standard for historical phonology. An asterisk implies a reconstructed form (an invalid or non-occurring one being marked with * instead). Philological readers should note in particular the use of = to mark the boundary between a clitic and its host.

 $^{^{2}}$ The analysis of *hwæt* as an adverb, rather than the interjection assumed by many standard editions, follows Walkden (2013).

I draw on the more nuanced approaches to clitic attachment that are now available, particularly concerning the possibility of mismatches (even very routine ones) between phonological and syntactic constituency.

In the following sections, I first introduce the workings of Old English metre, including important considerations raised by the word-foot theory of metre (though I attempt, as much as possible, to present my arguments in ways that will also be compatible with other metrical approaches). I then review the phonological frameworks for understanding clitics, emphasizing the possibilities for mismatches between syntactic and phonological constituency that are, though well known to linguists, not yet much discussed with regards to the particles of Germanic poetry. I then outline Kuhn's second law, the traditional framework for understanding the placement of low-stress elements in Germanic verse. After considering some of the problems involved with the "law" (some of the most salient of which were already noted by Kuhn himself), I turn to Whitman (1993) for a different angle of attack on these problems, examining where different monosyllabic weak elements occur as extrametrical elements (including their place in both verse and clause), when they must be scanned, and where they are usually supported by other material. With these different analytical frameworks in mind, I suggest a synthesis, considering primarily the classes of prepositions, unstressed prefixes, and demonstratives/articles (with some attention also given to the temporal particle $b\bar{a}$). I suggest an analysis of prepositions as prosodic-word enclitics and prefixes as affixal proclitics. Demonstratives show an interesting variation, already noted by Kuhn, between at least "classical" Old English verse and Old Saxon, and probably also late Old English. I propose that demonstratives in earlier Old English were prosodic-word clitics, but shifted in the other two corpora to free clitics (a shift probably related to their change of function to articles).

2 Weak elements in alliterative metre

Most Old English poems are composed in one of two (related) metrical modes: a "standard" type and a "hypermetric" type. I will only deal with the standard mode here; on hypermetric verses, see Sievers (1887: 458–475), Simms (2003), and Hartman (2020). The workings of this metre have had to be reconstructed by modern scholarship, and there are a few different approaches and perspectives on just how things work. Mainstream metrical research takes the system of Eduard Sievers (1885a; b; 1887; 1893) as its starting point, though different theorists have since taken his observations in different directions. For my purposes, there are two points of Sieversian metrics that are really important: anacrusis and expanded dips.

Both phenomena can be illustrated by comparing the following two verses from *Beowulf*:³

³ A *verse* or *half-line* is the metrical building block of Old English metre. Two verses together form a (long) line, linked by alliteration: in example (1), the extra space marks the caesura between the two verses of the line. Aside from alliteration, metrical rules normally operate at the level of the verse. The first verse in a line is called the *on-verse*, and labelled with an a in line citation; the second is the *off-verse*, and indicated with a b.

- (2) folces hyrde
 of.people shepherd
 "shepherd of the people" (*Beowulf* 610a)
- (3) on gunnen on geogobe
 begun in youth
 "(I have) begun in (my) youth" (Beowulf 409a)

Example (2) shows a minimal verse type, in this case a trochaic pattern (though other patterns are possible as well), in which the removal of any syllable would render the verse unmetrical.⁴ The two stressed syllables, *fol-* and *hyr-*, fill metrical lifts or strong positions, while *-ces* and *-de* fill dips (weak positions). Example (3) shows extra syllables. The one at the beginning, *on-*, stands in *anacrusis* to the verse: it is an additional weak syllable placed immediately before a lift (strong syllable) that would more normally be verse-initial. The second extra syllable is the preposition *on*, which occurs next to a weak syllable that was already part of the core metrical structure of the verse. In most analyses of Old English verse, *-nen* and *on* are regarded as equal constituents in an *expanded dip*: any dip filled by more than one weak syllable.⁵ The major division in classic Sieversian metrics is therefore between anacrustic syllables, on the one hand, which are truly extrametrical, and on the other, weak syllables of dips, which all have more or less the same status.⁶ This distinction will be very important when it comes to assessing the phonological status of the "little words" of Germanic verse.

In what follows, I make use of a specific theoretical elaboration of Sieversian metrics: the *word-foot* theory, first proposed by Russom (1987), refined in a number of further articles and two books (Russom 1998; 2017), and presented in a revised form by Russom (2022).⁷ Russom accepts much of Sievers' descriptive apparatus in terms of what constitutes a metrically minimal verse, and what patterns of variation are tolerated, but differs in how these are explained. For Russom, a verse consists of a core skeleton of metrical syllables (the members of the "word-feet" that give the theory its name; these are based ultimately on normal word-patterns in the language), some

⁴ For a discussion of minimal verses, metricality, and other features of Old English metre, see Goering (2023a: 24–39, and further appendix E). A useful basic introduction to the metre in general is Terasawa (2011).

⁵ There is no general theoretical maximum to the number of syllables in a dip, though 1–3 syllables is the usual range for most initial dips, more than 5 is highly exceptional, and 7 seems to be the most attested in non-translated verse (Hutcheson 1995: 201, 210–211, 215, 220, 223, 227, 230, 234). Old Saxon tolerates longer dips, and the longest dips in the Old English corpus (8 syllables) are found in *Genesis B*, translated from Old Saxon.

⁶ The third extra syllable, in trisyllabic *geogobe*, is of a different order entirely. The root syllable *geo*- is light (this is orthographic for [jo] or the like; but even if *eo* here represented a diphthong, short diphthongs count the same as short vowels in Old English), and there is a requirement for a lift to be filled by a heavy syllable, with only licensed exceptions (Goering 2023a: ch. 5, with references). The two syllables *geo-go*- resolve together to fill the lift, the metrical equivalent of the single heavy syllable *hyr*-.

⁷ I here ignore an alternate version of this theory developed by Bredehoft (2005), since it introduces certain complications into the system without sufficiently accounting for their theoretical consequences.

of which may be weak, plus additional extrametrical syllables.⁸ In word-foot notation, examples (2)–(3) could be represented as follows:

- (4) folces hyrde of.people shepherd Sw/Sw
- (5) on gunnen on geogope begun in youth (x)Sw/(x)Sw

In this discussion, I use S to represent a metrically fully stressed syllable (or resolved equivalent), lower-case s a secondary stress, w a metrically weak syllable, and (x) an extrametrical weak syllable (this is somewhat different from Russom's notation). Word-feet can be divided into classes depending on their phonological weight: those headed by an S are standard, or heavy if they also contain s, while low-stress word-feet headed by a w syllable are light. It is important to note that in Russom's system, unstressed prefixes do not belong to the following word foot: on-gunnen is not a foot of the shape wSw (or xSw), and could only be analysed as a beginning with a distinct extrametrical element, (x)Sw, or potentially as two distinct word-feet, w/Sw.

As can be seen in (4) and (5), there is no fundamental distinction between conventional anacrusis (at the start of a verse before a strong position) and further syllables in an expanded dip: both are simply extrametrical. Still, the traditional "anacrusis" context is much more constrained by word-foot principles (Russom 2022: 57–59). Within a verse, light word-feet are prohibited by general principles of Russom's system, meaning that a medial preposition like *on* in (5) cannot be mapped onto a metrical *w*. ¹¹ This metrical rigidity allows for a certain degree of linguistic latitude in terms of what kinds of elements can occur in expanded dips, and the kinds of distinctions I will be examining below do not manifest as strongly in medial position.

This notion is not strictly dependent on the word-foot theory, and something fairly similar is found in the adaption of Sievers' positional theory by Kaluza (1894a; b; c). He scans 409a as ongúnnèn on geógopè (Kaluza 1894b: 11), drawing a distinction between four "stressed" elements that form the metrical skeleton of the verse, and the extra fully unstressed ones that do not. This approach, informed by traditional scansions of Old and Middle High German metres, never gained much traction in Old English studies, but if Kaluza's secondary stresses are reinterpreted as marks of metricality, then his analysis aligns in some striking ways with Russom's. That said, there are differences: Kaluza (1894b: 11) does entertain an alternative scansion of 409a as ongúnnen òn geógopè, with on rather than -nen as the metrical constituent – an analysis that would be impossible under the word-foot approach. Since the word-foot approach is more constrained, it provides a more useful approach for assessing the metricality of low-stress elements, at least as a starting point for analysis.

 $^{^9}$ In particular, Russom uses x for all weak syllables, metrical or otherwise.

¹⁰ Note that much as no word can begin with a secondary stress, no word-foot may begin with an s.

¹¹ The system relies heavily on the principle of *reversal avoidance* to keep from overgenerating possible verse patterns. One effect of this is that light feet are strictly limited to verse-initial position (Russom 1987: 29–31; 2022: 44; Goering 2023b).

At the start of a verse either extrametrical/anacrustic (x) or metrical, light word-foot w are possible. Contrast the anacrustic prefix on- as (x) in (5) with the metrical preposition in as w in Beowulf 1b:

in geār-dagumin yore-days"in days of yore"w/Ssw

Here the preposition *in* must be a metrical constituent, since ${}^{x}(x)Ssw = {}^{x}Ssw$ would be an unmetrically short verse. By contrast, (5) would become unmetrical if the initial prefix *on*- were taken as anything but anacrustic.

One advantage of the word-foot system is that it suggests a phonological interpretation of the difference between initial anacrusis and metrical constituent. In (6), *in* is, in word-foot terms, a light word-foot, a projection of a word-like unit forming part of the verse's metrical skeleton. Russom does not put the matter in precisely these phonological terms, but it is easiest to understand his word-feet as being based essentially on prosodic words (on which see below). In other words, just based on the few examples considered so far, it would be tempting to speculate that the preference for prepositions to map to word-feet where possible (i.e. in initial position) suggests that they are (often) prosodic words, while the preference for prefixes to be extrametrical in verse reflects their lack of prosodic-word status. Will take this as a working hypothesis, naturally not yet fully justified, but something to be tested through application: I attempt to show below that this is indeed a useful and productive approach. I would stress that qualifiers like "preferentially" and "tend" are important. As is the case in many poetic traditions, there is some flexibility in the mapping between linguistic and metrical units, and it is not usually possible to say absolutely categorically that certain types of element are always anacrustic and never light word-feet. The arguments below are based on statistical preferences, not categorical divisions.

A further complication concerning extrametrical syllables in the word-foot theory comes from runs of verse-initial weak syllables, such as *Beowulf* 1a:

¹² The compound *geār-dagum* is the other, with Ssw being a single word-foot. This provides metrical support for a view that would be fairly natural to assume regardless: that compound words contain two full prosodic words that together form a larger, recursive prosodic word.

¹³ Russom (1987: 33–34) himself originally implied that the matter is one of poetic convenience, with prefixes being "more difficult to manipulate", that is, rigidly fixed in relation to the following word. The implication is that poets got around the syntactic and compositional inconvenience of this rigidity by treating prefixes more often as extrametrical. In his more recent reconsideration of the theory, Russom (2022: 57–59) arrives at a view closer to the working hypothesis adopted here, framing the matter in terms of "prominence", and stating that "prefixal usages were least prominent because they had a closer grammatical attachment to a stressed constituent and a correspondingly deeper subordination to it".

(7) Hwæt wē Gār-Dena indeed we Spear-Danes.GEN

This could be scanned any of three ways by the word-foot theory: w/(x)Ssw, (x)w/Ssw, or ww/Ssw. ¹⁴ Under the first option, the pronoun $w\bar{e}$ would be extrametrical, while under the second the adverbial $hw\bar{e}t$ would be. Russom (2022: 41, 48) also allows disyllabic light ww feet, and further principles allow a single word-foot to, at least under some circumstances, be instantiated by multiple words. That is, it is not inconceivable, under the general principles of the theory, that $hw\bar{e}t$ $w\bar{e}$ could constitute a single word-foot – compare, in different terms, Whitman (1993: 69–83) – equivalent to a single low-stress word such as under in Beowulf 710b:

(8) under mist-hleoþum under mist-slopes "under mist-slopes" ww/Ssw

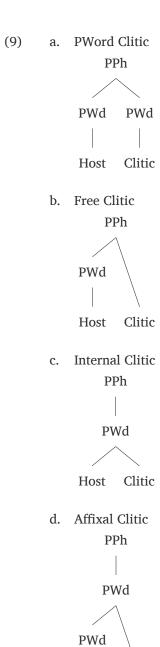
In (8), there is no doubt that the scansion begins with ww, since a single simplex word cannot under any circumstances contain within it a word-foot boundary. In $hwat w\bar{e}$, scansion as ww is only a possibility – but a possibility that interacts with the question of whether $hwat w\bar{e}$ really should be analysed as two "words", or if $hwat = w\bar{e}$, with an enclitic pronoun, might not be the right prosodic structure to posit here. The possibility of clitic structures being formed within light word-feet will be returned to below.

3 Clitics

The term *clitic* is sometimes used in rather different ways depending on linguistic tradition and area of focus. I am here interested strictly in phonological clitics, which might be provisionally defined, following Anderson (2005: 13), as "*prosodically deficient* forms" (emphasis original), and which must be adjoined to a neighbouring phonological entity (the *host*) so that it can stand as part of some larger prosodic unit, namely part of a syllable, foot, prosodic word (PWord, PWd), or prosodic phrase (PPh). Since there are different kinds of prosodic deficiency, the exact relationship between a clitic and its host can be of several types. One influential model posits four types of clitic, reproduced here from Anderson (2005: 46):¹⁵

¹⁴ In the theory as it currently stands, these are the only options. Permutations with different foot divisions, like w(x)/Ssw, are not possible, since the system only allows extrametrical elements to be added *before* a word-foot. Even if this constraint were rejected as part of the theory, the difference between w/(x)Ssw and w(x)/Ssw would have no bearing on any point currently under consideration.

¹⁵ For an overview of the prosodic hierarchy, which provides the terms used here, see Nespor & Vogel (2007). I do not take the prosodic hierarchy as a linguistic universal, but rather as a convenient abstraction of the usual kinds of results of the phonologically widespread (universal?) impulse to create nested hierarchies of prosodic material;



Clitic

Host

This typology was proposed by Selkirk (1996), though she did not present adjoined prosodic words, as in (9a), as a type of clitic. Anderson (2005: 46) does consider PWord clitics to be a type

cf. Schiering & Bickel & Hildebrandt 2010; Hildebrandt 2015. I here disregard issues that, in my view, only arise from a commitment to the universality of the prosodic hierarchy – issues such as the validity of the strict-layer hypothesis.

of clitic, with the prosodic word status of the clitic not being inherent to the element (as it would be for a normal word), but assigned in a process of phonological repair. Without being overly committed to this set of options as either exhaustive or universal, this typology does capture some important dimensions along which clitics can vary.

Space precludes an extensive discussion of all of Anderson's types, but the category of PWord clitic (9a) needs to be considered further, since it plays an important role in the analysis developed below. The really essential point in the present context is that a PWord clitic is in some real sense a clitic (and has a host), but is nonetheless also a prosodic word. This may seem somewhat counter-intuitive, but such entities do seem to exist. An illustration of a probable PWord clitic in early Germanic comes from Gothic verbal "prefix" uz-, found in forms such as usiddja "went out" and urrais "arose". The underlying form uz- surfaces when a further clitic intervenes between "prefix" and root, as does uh "and" in $uz = uh \cdot iddja$ "and (he) went out". 17 The variant us- is produced by the active process of word-final devoicing in Gothic, which usually applies to "words" (in a phonological sense, therefore, prosodic words), and consequently implies that us- is its own PWord in us-iddja. At the same time, the prefix cannot simply be taken as a fully independent word, since it shows assimilation to the root-initial r- in urrais, a process that does not happen between adjacent words within a phrase.¹⁸ In other words, it would seem that us-, as a verbal "prefix", has a status both as a prosodic word, and as a proclitic bound to its host in a relationship closer than that of two adjacent words in a prosodic phrase. In this light, it might be better to model usiddja and urrais, and perhaps PWord clitics in general, not as forming a prosodic phrase (as in Anderson's representation), but as constituting a larger prosodic word:19

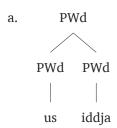
¹⁶ This analysis is not without complications, and I am not strongly attached to idea that PWord clitics are underlyingly not prosodic words. For my purposes, they are simply elements that have hosts (and so are prosodically deficient in the sense that they cannot, or often do not, occur except in combination with another PWord, on which they are in some way phonologically dependent), while also belonging to the class of prosodic word, as determined within the language in question.

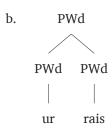
¹⁷ When it occurs after content words, the element *uh* has the same effect of effacing the word-boundary and allowing final voiced fricatives to surface without devoicing: e.g. *maiz* = *uh* "and more" (*Skeireins* 8.3), or *Filippauz* = *uh* "and Philip" (Luke 3.1). This suggests it forms a single prosodic word with its host, with no PWord boundary falling between host and clitic, and in the quadripartite typology used here would therefore be an Internal clitic (9c).

¹⁸ Contrast the *explicit* to *Galatians*: *us Rumai* "from Rome", with a preposition; if assimilation applied within the prosodic phrase, we would find **ur Rumai*.

¹⁹ The examples from Bilua given by Anderson (2011: example 2) may also fit this model, though it is not clear that they still have a host (much less what kind of constituent they form with their host). If they lack a host, then there is an important distinction to be made between them and the Gothic examples just given. Either the Bilua "clitics" are really not clitics at all, but just elements that have been promoted out of clitichood, or there are two kinds of PWord clitic, with and without a host (if an element without a host can still be considered a clitic at all). On the other hand, perhaps the Bilua clitics are hosted after all – I am not familiar enough with Bilua to pass judgement myself, but that is what Anderson's own trees would seem to imply.

(10) Gothic us as a PWord Clitic





I would stress again that a "clitic type" of this sort is meant only as an abstract generalization of convergent cross-linguistic tendencies rather than a universal linguistic truth. The key point is that there can be clitics that themselves show phonological properties that are associated with "words" (in this example, susceptibility to final devoicing), but which can still be prosodically dependent on an adjacent host element (allowing the assimilation to *ur*-).

Clitics can further vary in terms of whether they precede their hosts (as *proclitics*) or follow them (as *enclitics*). An important point is that this phonological attachment need have nothing to do with syntactic constituency. Anderson (2005: 16–17) gives examples from K^wak^wala (a Wakashan language of the Pacific Northwest) which show determiners that syntactically modify a following noun, but show phonological attachment to a preceding element:

```
(11) xwəs?id=ida bəgwanəma=q
struck=DEM man=OBJ
"The man struck him" (Anderson 2005: 16, 2.3b)
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The determiner *ida* modifies "man", but, in Anderson's assessment, attaches phonologically to the preceding verb.

In an extensive review of diachronic and experimental evidence, Lahiri & Plank (2010) make the same case for a variety of Germanic languages, suggesting that both determiners and prepositions are routinely phonological enclitics, despite their syntactic constituency with what follows. The evidence surveyed includes diachronic reductions, ²⁰ metalinguistic intuitions

These range from origin of the *s*-passive in North Germanic to the German inflected prepositions such as *in das* > *ins* (Lahiri & Plank 2010: 379–385).

from various commentators (Lahiri & Plank 2010: 372–375), synchronic clitic formation in various Germanic languages (Lahiri & Plank 2010: 385–390), and timing evidence from modern experiments (Lahiri & Plank 2010: 392–393). This last set of evidence comes from Dutch, where Wheeldon & Lahiri (1997) had found that, when prompted to respond immediately, participants took longer to begin the response *ik drink het water* "I drink the water" than either *ik drink water* "I drink water" or (crucially) *ik drink vers water* "I drink fresh water", a finding they plausibly attribute to (*ik drink = het*) (water) having a longer initial prosodic word than (*ik drink*) (vers) (water). While a single experiment of this sort is not of course decisive, the results are impressively consistent with the wide range of evidence marshalled for Germanic in the article as a whole, and with the more global survey of Himmelmann (2014). It seems to me that there are at least reasonable grounds for adopting a working hypothesis that for Old English and Old Saxon, syntactically preposed modifiers – most relevantly for my purposes, prepositions – could be phonological enclitics. This idea was already anticipated by Whitman (1993: 82–83), as discussed below.

4 Kuhn's second law

With regards to example (1), *Beowulf* line 1, I noted the strong tendency to avoid clause-initial prepositions in Old English poetry. This constraint, along with a number of other features of word order, has traditionally been seen through through the lens of the famous *satzspitzengesetz* formulated by Kuhn (1933: 43):

(12) Im satzauftakt müssen satzpartikeln stehen.

"There must be sentence particles in the clausal upbeat."²¹

This particular framing turns on the distinction made by Kuhn (1933: 4–5) between *satzpartikeln* and *satzteilpartikeln*, the former being syntactically independent (such as substantive pronouns, various adverbial particles, most finite verbs, and conjunctions), the latter being syntactically bound to an immediately following constituent (prefixes, prepositions, and many demonstrative, possessive, and genitive pronouns). Since the preposition *in* is a *satzteilpartikel*, Kuhn's rule would exclude it from the clause-initial position unless supported by a *satzpartikel*.

Both of Kuhn's laws have been much discussed,²² and the literature on them is too vast to review properly here. With regards to the second law, the essential point is that even Kuhn (1933: 43–49) find a noteworthy number of irregularities and exceptions. These are elaborated on by, especially, Momma (1997: 65–75), who observes not only that different

²¹ I use the conventional translation of "upbeat" for *auftakt* in this context. It refers to all light material in a given constituent (verse or clause) before the first (metrically salient) stress.

²² The "first" one concerns the placement of unstressed *satzpartikeln*, Kuhn (1933: 8).

Old English poems show varying numbers of breaches of the law, but that these breaches are not all of the same type. For instance, *Genesis A* – probably one of the very earliest surviving Old English poems, likely from the late seventh or early eighth centuries (Fulk 1992: 61, 348-351)²³ – shows a number of verses with clause-initial demonstrative pronouns, as in 1172:

(13) Se māga wæs that.DEM kinsman was "That kinsman was" w/Sws

This begins a new clause (punctuated by editors as the start of a new sentence), but its upbeat contains only the demonstrative *se* "the/that", which Kuhn's second law predicts should not happen (Momma (1997: 70 and note 42) finds 28 comparable examples in this poem). On the other hand, *Exodus* – another early poem, though probably somewhat younger than *Genesis A* (Fulk 1992: 348–349) – shows a number of clauses beginning with prepositional phrases, the point with which I opened this article. Momma (1997: 71) quotes the following example:

(14) On feorh-ge-beorh
in life-protection
"In preservation of life"
w/Sws

She lists four to five "other examples of this construction" in *Exodus* in a footnote, but none of these other verses involve a bare preposition. More representative is 397:

(15) Tō þām með^el-stede to that-DEM speech-place "To that forum (Abraham led Isaac)" ww/Ssw

That is, these examples all involve a preposition followed by a demonstrative. This type is certainly just as much a violation of Kuhn's second law as (14), but the difference is potentially prosodically interesting.²⁴

²³ The manuscript is from the end of the tenth century, but such a gap between composition and production of the (sole) surviving witness is not very remarkable.

²⁴ Kuhn (1933: 44–45) appeals to the fact that demonstrative pronouns can also be relative pronouns to explain why they are involved in so many exceptions to his law. This is not an adequate explanation.

If we accept conclusion that, at least in Old English, Kuhn's second law should be "disqualified" (Momma 1997: 73–75), and that Kuhn's generalizations (careful and intelligent as they were) conflate and obscure various matters, 25 then a slightly different set of questions arises. Kuhn's law has its uses as a focus for attention, but it may leave other important considerations out of focus. Kuhn's major contribution is in drawing attention to the distinction between clause-initial and clause-medial position, and in distinguishing between different kinds of particles – though as his own discussion suggests, in practice an even more fine-grained distinction is often called for, rather than simply lumping prepositions, prefixes, and demonstratives all together as *satzteilpartikeln*. Perhaps the most important element missing, however, is the question of syllabicity, since both Kuhn and some of his critics, such as Momma, tend to lump cases such as (14), beginning with *in*, and (15) with $t\bar{o}$ $p\bar{a}m$, together, or to only think about the word classes represented in these upbeats. But it is potentially just as important, or more so, that *in* is monosyllabic and $t\bar{o}$ $p\bar{a}m$ disyllabic.

5 Whitman and enclisis: The example of *Þā*

An important step in asking precisely these questions was made by Whitman (1993: 69–83), though his discussion appears to have made little impact on later investigators. Like Kuhn, Whitman is interested in clause openings, but his generalization regarding them is rather different. He notes that some types of verses which should conform well enough to Kuhn's second law are nonetheless very rare (as rare as the openings disallowed by Kuhn's law). One type is shown by *Beowulf* 706b, 967b (Whitman 1993: 71):

(16) þā metod nolde
when god wished.NEG
"when god did not wish (it)"
w/Ssw

This verse, which recurs twice as a formula in *Beowulf*, 26 is both times a single-verse subordinate clause. It adheres to Kuhn's second law, since the sentence particle $b\bar{a}$ occurs in the upbeat, meaning that there must be some other explanation for its rarity. As Whitman notes, the

²⁵ As a further point, Kuhn (1933: 5–8) influentially labelled *satzteilpartikeln* as "proclitic". As will become clear in the following sections, I reject Kuhn's categorical assessment, and argue that many of these particles are rather enclitic.

Whitman cites 402b as a further possible example, but this verse is metrically suspect and probably to be emended (Sievers 1885a: 256; Russom 1987: 37–38; Pope 1988: 111–112). Even if it is allowed to stand, a lone clause-initial $b\bar{a}$ is still strikingly rare.

²⁷ Genesis A is somewhat freer on this point. Taking lines 1001–1500 as a test sample, I find six examples of clause-initial $b\bar{a}$ immediately before a stress: 1002a, 1253a, 1294b, 1390a, 1436a, 1497a. For comparison, the same excerpt contains 10 instances of clause-initial $b\bar{a}$ followed by an unstressed element: 1090a, 1104a, 1159a, 1270a, 1327a, 1407a, 1421b, 1464a, 1474b, 1483a. Any preference against proclitic $b\bar{a}$ seems to be much less pronounced for the Genesis A poet than for the Beowulf poet.

constraint is not syntactic, since verses opening with $si\delta\delta an$ "after, since", a syntactically similar particle, does occur regularly in clause-initial position:

```
(17) sybðan niht be·cōm
after night arrived
"after night arrived" (Beowulf 115b; Whitman (1993: 71))
ww/Sws
```

Whitman (1993: 72) counts some 35 examples like (17) in that poem alone. His conclusion is as follows:

Why, one feels compelled to ask, was ' $p\bar{a}$ + stress' studiously avoided when ' $si\delta\delta an$ + stress' was the norm? No answer comes readily to mind without reference to metrical considerations. My suspicion is that by itself $p\bar{a}$, unlike $si\delta\delta an$, was deemed metrically insufficient as an initial [i.e. clause-initial] segment.

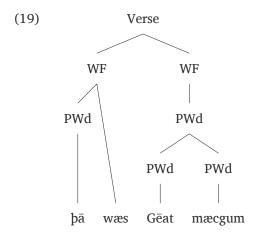
This "suspicion" must surely be more or less correct in some form. A monosyllabic particle like $b\bar{a}$ can and does frequently occur clause-initially in verses like the following:

```
(18) þā wæs Gēat-mæcgum
then was Geat-people.DAT
"then was for the Geat-people" (Beowulf 491a)
ww/Ssw
```

Whitman (1993: 70) claims that this type occurs sixty times in *Beowulf*. It may be worth noting that in (18), *wæs* is plausibly itself analysed as a clitic (Y. Suzuki 2008: 122–134, 182–186). Above, I noted that sequences like *hwæt wē* in (7) at least had the possibility of being taken as *hwæt* = $w\bar{e}$ and scanning as a single disyllabic word-foot, *ww*. I would take Whitman's assessment of $p\bar{a}$ as implying just such a process. Where $p\bar{a}$ on its own is prosodically unsuited to be a proclitic clause opener (either because it is not a PWord clitic, or because it is dispreferred as a proclitic), if it is promoted to be the host for a clitic like $p\bar{a} = p\bar{a} = p\bar{a}$

In $b\bar{a} = was$, the prosodically deficient $b\bar{a}$ would be contextually promoted to the status of PWord (arguably no longer remaining a clitic at all; cf. note 19 above), with was attached to it as

an enclitic. The resulting phonological and metrical structure might provisionally be represented, in a somewhat simplified manner, as follows (WF here stands for word-foot):²⁸

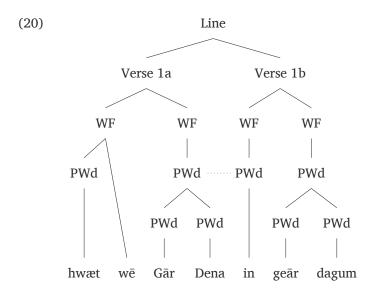


This kind of synthesis, adapting Whitman's broad approach to fit within the frameworks of clitic phonology and word-foot metrics, is what I will attempt to apply in the remainder of this discussion to three common classes of "little word" in Germanic verse.

6 Prepositions

The number of positions $b\bar{a}$ can appear in is limited by the fact that outside of clause-initial position, it is always metrically stressed. It is easier to develop the prosodic profile of light elements by turning to prepositions (Whitman 1993: 81–83). Returning to example (1), it is clear that there is at least some parallelism with $b\bar{a}$: it is extremely hard to find a clause in Old English verse whose upbeat consists only of a preposition. Exceptions like (14) can be found, but they are very rare, just as is the type with $b\bar{a}$ represented in (16). On the other hand, such verses (i.e. like *in geār-dagum*) are very common indeed in clause-medial position. Whitman (1993: 82) generalizes that "each [verse of this sort] can be read without pause in the rhythm of the preceding half-line". This can be understood as a suggestion that such prepositions are enclitic to elements in the preceding verses, though they are at the same time able to stand as light word-feet in their own verses. I suggest that prepositions are PWord clitics as defined above: prosodic words that retain their clitic status (and are not promoted out of clitichood). The following is an attempt to represent this suggestion schematically, using *Beowulf* line 1 (the dotted line shows the clitic attachment across the verse):

²⁸ This presents *wæs* as a Free clitic, though other classifications may be possible. Recall from note 12 that I analyse a compound word as a larger, recursive prosodic word containing two prosodic words within it.



If prepositions and $b\bar{a}$ are taken as prosodically more or less parallel – even if this parallelism is limited by the aforementioned inability of unstressed $b\bar{a}$ to occur clause-medially – then the following hierarchy of preferences might be suggested for both $b\bar{a}$ and prepositions:

- i. Attach enclitically to a preceding element as a PWord clitic (not possible for $b\bar{a}$ for syntactic reasons, but common for prepositions).
- ii. Promote to a PWord host for a following clitic (much more common clause-initially for $b\bar{a}$ than for prepositions, but cf. (15) and similar verses).
- iii. Attach as a (PWord) proclitic to a following host (attested, but dispreferred for both categories).²⁹

When verse-initial, both $p\bar{a}$ and prepositions normally map to light word-feet in the metrical system, which I take to be an indicator that these are specifically PWord clitics.³⁰ As has long been noted in the metrical literature, there are only a handful of examples where these elements occur in anacrusis, a context which is (by my working hypothesis) prototypically not associated with prosodic words (Cable 1971). Two of these occur in *Beowulf*,³¹ six or so in *Genesis A*:³²

²⁹ As discussed in note 27 above, the strength of this preference seems to vary between *Beowulf* (where it is strong) and *Genesis A* (where $b\bar{a}$, though not prepositions, can occur as clause-initial proclitics more frequently.) The extent to which this variation should be understood as a matter of poetic style versus a dimension of linguistic variation is very hard to determine on the available evidence.

³⁰ As mentioned in §2, prepositions must often be taken as extrametrical in verse-medial position, which is why the verse-initial context is more informative.

 $^{^{31}}$ 1248a, 1549a; on 402b, the sole possible example with an acrustic $\ensuremath{b\bar{a}}$, see note 26 above.

³² 1482a, 1907b, 1918a, 2034a, 2555a, 2660a. A likely seventh is 1172a, cited in (13), though this verse is corrupt. Bethel (1984: 18) includes several further apparent examples, but these are spurious: 892a and 1470a have short

```
(21) a. on þell-fæstenne
on plank-fortress
"on the plank-fortress [ark]" (Genesis A 1482a)
b. tō axan and tō yslan
to ashes and to ashes
```

"to ashes and to cinders" (Genesis A 2555a)

All of these examples are clause-medial. A clause-initial example with an adverb derivationally related to a preposition is found in *Beowulf* 2093a:

```
(22) tō lang ys tō reccan<sup>ne</sup>too long is to recount"it is too long to recount" (Beowulf 2093a)
```

The overall picture is that prepositions, like $b\bar{a}$, strongly prefer to map onto light word-feet when this is possible, i.e. in verse-initial position. These few exceptions are just that: instances where PWord enclitics have, exceptionally, been treated as extrametrical rather than as word-feet. It may be worth noting that the repetitions found in (21b) and (22) are typical for the examples in *Beowulf*, and in *Genesis A* 2660a, all of which show echoing prepositions before the second lift of the verse.³³

7 Prefixes

If $b\bar{a}$ and prepositions can be taken as PWord enclitics because they normally map to light word-feet (where this is possible), rarely stand in anacrusis, and rarely occur in contexts where they must be proclitic, then the prosodic status of unstressed "prefixes" must be analysed differently. Unstressed prefixes are common in Old English: typical examples include \bar{a} -gifan "give, grant" and ge-wyrc(e)an "make". There are good reasons to regard such prefixes as standing outside the prosodic word of the root they are attached to. Minkova (2008: 28–29) cites four features that are suggestive of a significant prosodic boundary between prefix and root:

vowels in *treowes*, which accordingly resolves (Fulk 1992: 146–151); 1374a should be read with *ge·hwæm* for scribal *ge·hwære* (Sievers 1885b: 485), and 1759a probably should be scanned with *eorð-būend* rather than *eorð-būende* (Fulk 1992: 106).

³³ Repetition is lacking in *Genesis A* 1482a, 1907b, 1918a, and 2034a. Whether all of these actually are authorial seems doubtful – the slightly greater irregularity on this point in *Genesis A* may be an artefact of that poem's poorer transmission – but none are solved simply by the normal, mechanical substitution of earlier forms that so often accounts for irregularities in transmitted verse, and it would be too much of a tangent to delve into the textual criticism of each of these four verses. For the moment, I will let them stand as exceptions to the normal trend.

- i. The lack of resyllabification: *ætȳwde* "appeared" alliterates vocalically, not as **æ.tȳwde* (e.g. *Andreas* 1296a)
- ii. The retention of hiatus: forms like $\bar{a}\cdot\bar{c}\partial an$ "to destroy" (*Genesis A* 1280a) and forms of *ge-endian* "to end" do not undergo the contractions normally found word-medially (e.g. **ga-an* > $g\bar{a}n$ "to go")
- iii. The retention of post-consonantal geminates: forms like $ymb\cdot bearh$ do not show the productive simplification of geminates that applies within words (e.g. f ast- "make firm" + weak preterite -de = f aste)
- iv. Failure of intervocalic voicing: *be·sōhte* "beseeched" has [s] in later English, in contrast to *bysig* "troubled"

Not all of these points are equally strong – we have no direct evidence for the lack of voicing in the Old Enlgish period itself, and the later voiceless outcomes could, conceivably but perhaps not plausibly, all be analogical³⁴ – but they all point the same way, and may receive some support from scribal habits.³⁵

Metrically, too, the word-foot theory requires unstressed prefixes to be outside the prosodic word. Words like *folc* "people", *hyrde* "shepherd", *byrnende* "burning", and *ende-lāf* "final remnant" all project word-foot contours used to form verse-shapes (*S*, *Sw*, *Ssw*, and *Sws*, respectively). By contrast, as noted above, there are no word-feet of the shapes *wS or *wSw that might be expected if *ge·trum* "troop, company" or *ge·wyrcean* were normal prosodic words. This decision to treat prefixes as prosodically distinct "words" is an essential component part of the theory, which will not generate the correct outputs of verse types if "rising" word-feet are allowed, ³⁶ an analytical necessity which aligns well with the phonological considerations raised by Minkova.

If prefixes are not simply a part of the same prosodic word as their host, what is their status? They are presumably clitics, but they would seem to be a different type of clitic than prepositions. This can be seen clearly by contrasting *on* as a preposition and a prefix in a sample of *Genesis A* (lines 1001–1500); the preposition occurs in this passage a total of 77 times, and the prefix 20

³⁴ Russom (1987: 9) further points out that intervocalic h fails to be deleted after a prefix, contrasting unchanged be-healdan "observe" with lenited (and contracted) * $h\bar{e}ahan > h\bar{e}an$ "high". This is both a further piece of evidence for a boundary between prefix and root (and one that disappeared in forms like * $b\bar{t}$ - $h\bar{a}t > b\bar{e}ot$ "vow, promise", with initial nominal stress; contrast be- $h\bar{a}tan$ "to promise"), and may suggest that voicing, which is analogous to the deletion of *h, indeed never took place in this context.

³⁵ Compare, for example, the habit of the scribe of the Exeter Book (a late tenth-century compilation of poetry) in separating prefixes such as *ge* from the following word (Burns 2022: 210). A systematic and prosodically informed study of the word-spacing of particles in different Old English manuscripts is a desideratum.

 $^{^{36}}$ If such feet were allowed, then various unmetrical verse-patterns, most prominently $^xwS/Ss$, should be commonly found.

times. In this section, the majority of both varieties of *on* appear in medial dips, which are, as noted in §2, metrically uninformative.

Only in verse-initial position will the metre potentially treat different kinds of light syllable differently.³⁷ For prepositions, the passage in question contains 29 examples serving as a light word-foot, as in:

```
(23) on lides bōsme
on sea.GEN bosom
"on the bosom of the sea" (Genesis A 1332a)
w/Ssw
```

By contrast, of the 20 instances of *on* as a prefix in this same sample, just one serves as a light word-foot: 38

```
(24) on·wōd gromein.came fiercely"came in fiercely" (Genesis A 1260b w/Ssw
```

That is, about 38% (29 out of 77) of prepositional *ons* clearly serve as light word feet, while only 5% (1 out of 20) of prefixes do. Under the terms used here for attempting to integrate metre and phonology, the implication is that while prepositions are PWord enclitics (as argued above), prefixes lack any status as prosodic words. Examples like (24) are probably best regarded as exceptional mismatches of linguistic and metrical structure, allowed here and there, but not particularly optimal.³⁹

This suggestion is reinforced by the relative readiness of prefixes, unlike prepositions, to stand in anacrusis (Cable 1971). In *Beowulf*, there are perhaps 52 examples of prefixal anacrusis, ⁴⁰ compared to the three examples of prepositional anacrusis given in note 31. The difference is

³⁷ I also leave aside expanded initial dips, where the metrical status of any given element is less obvious.

 $^{^{38}}$ This example is, unsurprisingly, clause-medial.

³⁹ This special behaviour of prefixes has been noted frequently, and is now sometimes known as the *prefix licence* after Yakovlev (2008: 59–60); compare Kaluza (1894a: 38–40); Cable (1974: 35); Duncan (1993).

⁴⁰ 94a*, 141a*, 399a*, 409a, 501a*, 505a, 723a*, 772a*, 827a, 1027a*, 1108a, 1150a*, 1151a, 1169a*, 1274a*, 1304a, 1390a*, 1451a, 1453a*, 1460a, 1485a, 1504b, 1543a*, 1554a*, 1610a*, 1616a*, 1622a*, 1667a*, 1724a*, 1751a*, 1767a*, 1773b, 1837a*, 1877b, 2044a*, 2284a, 2367a*, 2455a*, 2525a, 2529a*, 2591a, 2629a*, 2659a, 2681a*, 2703a*, 2717a*, 2756a*, 2769a, 2878a, 2930a*, 2936a*, 3062a, 3121a*. This list takes no notice of verse type. Asterisks mark prefixes to finite verbs, which are sometimes taken as being part of expanded dips. In word-foot terms, the finite verb is still probably to be taken as the first word-foot, whether light or heavy, so this will make no difference to the status of the prefix. This is indeed probably an undercount, since I have only include prefixes before alliterating elements; for a more generous list, see Cable (1971), to be supplemented (for types D and D*) by Duncan (1993: 498, note 8).

not so stark in *Genesis A*, but clear nonetheless, with some 22 examples of prefixal anacrusis in the entire poem against the six or so prepositions given in note 32 above.⁴¹ It would seem most natural to consider prefixes as Affixal clitics.

Whether prefixes are pro- or enclitic is not entirely clear, though on the whole I would lean towards proclisis. A weak argument for enclisis might come from verses such as *Beowulf* 1753b:

```
(25) eft ge·limpeð
again happened
"again comes to pass"
Sw/Sw
```

Since *eft ge*- forms a word-foot, an analysis as eft = ge could perhaps be entertained. That said, this point can be turned on its head, since verses like the following are considerably more common than ones like (25):

```
(26) læne ge·drēoseð
transitory declines
"the fleeting (body) declines" (Beowulf 1754b)
Sw/(x)Sw
```

This preference might suggest that cases like (25) are considered less optimal in terms of languagemetre mapping, supporting a proclitic analysis. This may be reinforced by the simple observation that prefixes are inseperable from their roots in Old English: $ge = dr\bar{e}ose\delta$, blocking any further insertion after the prefix.⁴² Verbal prefixes are also much more common in clause-initial position than prepositions,⁴³ which is easier to understand if prefixes are already proclitic. At the least, it seems clear that proclisis is not as disfavoured as it is for prepositions.

Overall, it is clear that prefixes differ in their prosodic status from prepositions, and are treated quite differently in metrical terms. To reconcile the observed facts with the theoretical frameworks adopted here, the simplest suggestion is that, where prepositions are PWord clitics, prefixes are Affixal clitics. Furthermore, where prepositions seem to be rather strongly preferentially enclitic, I would tentatively suggest that prefixes were (as an innovation relative to older Germanic),⁴⁴

⁴¹ The examples of prefixal anacrusis are: 55a*, 961a*, 1032a*, 1275a, 1281a, 1323a, 1460a, 1520a, 1655a*, 2007a*, 2038a*, 2079a*, 2325a, 2405a*, 2473a*, 2493b, 2503a*, 2606b, 2659a, 2737a*, 2853a, 2932a*. This list is ultimately based on Bethel (1984: 18, note 11), though a number of her examples must be set aside (some are textually corrupt, some are scanned incorrectly).

⁴² This is unlike the Gothic "prefixes" discussed in §3, which did allow further clitics such as *uh* to fall between prefix and root.

⁴³ Momma (1997: 69, and note 39) counts 10 examples of clause-initial prefixes that scan as word-feet in *Beowulf*, and 21 in anacrusis. This forms a striking contrast to prepositions, as discussed above.

⁴⁴ Hill et al. (2019: 175–179) suggest, I think very plausibly, that the phonology of the prefix *ge-*, Germanic **ga-*, is explained by its frequent occurrence as an enclitic. They, like many others, connect it etymologically to Indo-European

preferentially proclitic. The relatively uncommon use of prefixes as light word-feet is – as has often been suggested by people working in various metrical frameworks – best regarded as a point of latitude in language-metre mapping.

8 Demonstratives and Old Saxon

I now, and finally, consider the demonstratives. These are interesting not only for their exceptional behaviour in Old English poetry, as noted already by Kuhn (1933: 44–45), but also for the way their metrical status contrasts in Old Saxon alliterative verse. In Old English, demonstratives account for a large chunk of the violations of Kuhn's second law, as discussed above in relation to (13):

(27) Se māga wæs that.DEM kinsman was "That kinsman was" w/Sws

This certainly begins a new clause, with the demonstrative alone filling the light word-foot of the verse, which scans w/Sws. The relative frequency with which demonstratives can stand in comparable positions suggests two things. First, that in contrast to prepositions, demonstratives are more freely accepted as proclitics, since enclisis is not possible in verses like (13). I would not claim that demonstratives are preferred as proclitics, but it seems that they at least lack the bias against proclisis observed for the prepositions. Why demonstratives and prepositions should vary on this point is not obvious – naturally so, since it is currently not clear why prepositions should be so apparently strongly enclitic, or why $b\bar{a}$ should be more frequently tolerated as a proclitic in *Genesis A* than in *Beowulf*.

The second thing suggested by verses like (13) is that demonstratives are, like prepositions, prosodic words in their own right (whatever else they may also be), and preferentially map to (light) word-feet in the metre – by the working assumptions adopted here, I would understand them to be PWord clitics, mapping to w rather than (x) or S. The resulting expectation that they

should be avoided in anacrusis, where they would have to be extrametrical, holds true in practice. *Genesis A* shows a single example of a demonstrative in anacrusis:⁴⁵

```
(28) se eorl wæs æðele
the.DEM hero was noble
"the hero was noble" (Genesis A 1182a)
(x)Sw/Sw
```

The most distinctive feature of demonstratives comes not from their behaviour within Old English, but in comparison to Old Saxon. The sizeable corpus of alliterative metre represented by the *Heliand* and the *Vatican Genesis*, both dating from the ninth century, is clearly closely related to the Old English poetic corpus, and arguably should be treated as a part of it as a matter of course (though this is not the current habit of Old English scholars). ⁴⁶ By and large, the light elements of Old Saxon behave much the same as in Old English: *thuo* ($p\bar{a}$) is almost never a lone light word-foot at the start of a verse (cf. (16)), ⁴⁷ and prepositions strongly prefer to occur verse-medially. ⁴⁸ The following are typical for Old Saxon; compare (18) and (1) for Old English:

- (29) a. thuo uuarth thar thegan manag then became there retainer many
 "then many a retainer there became (aware)" (Heliand 2066b)
 ww/(x)Ssw
 b. Mutspelli cumid | an thiustria naht
 Apocalypse come.NEST | in dark night
 - Apocalypse come.NPST | in dark night

 'the Apocalypse will come in a dark night' (*Heliand* 4358b–4359a)

 Ssw/S | w/Sws

⁴⁵ Donka Minkova (personal communication) has wondered whether *se* here might be contracted before the vowel-initial *eorl*. This possibility might be worth exploring (though it should be noted that the alliteration is certainly on the vowel, not *s*), but if this example is to be dismissed, it seems more likely that the *se* should be taken as a scribal addition. For my current purposes, I accept the *se* here as an example of a genuine, but highly disfavoured, demonstrative anacrusis.

⁴⁶ For metrical overviews of Old Saxon, see Hofmann (1991a; b), Russom (1998: ch. 10), and S. Suzuki (2004). Old Saxon does show some distinctive features when compared to Old English. Those concerning anacrusis are discussed shortly, and more generally, dips in Old Saxon can exceed the normal upper limits found in Old English. The current investigation focuses on shorter upbeats, a point where the two traditions can be compared with some precision (see further note 53 below). In general, it is my strong impression that the greater length of dips in Old Saxon has much less of an effect on the prosody of light elements than the received wisdom of Germanic metrical scholarship might lead one to expect.

⁴⁷ A search of the HeliPad corpus developed by George Walkden turns up 682 instances of *thuo* in the *Heliand*, of which only four serve as the lone light word-foot at the start of a verse (3671a, 5481a, 5554b, 5633b). Some ten more instances occur as the only word before an alliterating syllable, but these are always extrametrical (in anacrusis): 2413a, 2546b, 2773a, 3241b, 3416b, 3687a, 4106b, 5201a, 5339a, 5430a. I would like to thank Hannah Booth for her help in learning to use this tool.

⁴⁸ Of the approximately 1518 prepositions that occur in matrix clauses in the *Heliand*, only 20 are clause-initial, and none of these is followed immediately by a stressed element.

Prefixes too behave much the same as in Old English: they rarely occur as metrical word-feet,⁴⁹ and when verse-initial are usually in anacrusis.

The mere fact that prefixes can stand in anacrusis is not particularly meaningful in Old Saxon, where such extrametrical additions are both much more common and more tolerant of a wide range of fillers (in terms of element class and number of elements) than in Old English (Hofmann 1991a: 66–68; S. Suzuki 2004: 160–175). Prepositions and even verbs can stand in anacrusis (in the following example, the alliteration is on the vowels):⁵⁰

```
(30) mid ēnu uuordu
with one word
"with a single word" (Heliand 40b)
(x)Sw/Sw
```

The difference between prepositions and prefixes lies not in whether they ever occur in anacrusis, but rather in the near-invisibility of prefixes. Prepositions very often stand as light word-feet, and are only more occasionally anacrustic, while prefixes show the reverse behaviour: routinely occurring in anacrusis and only less commonly standing as light word-feet.⁵¹

If demonstratives were broadly comparable in Old English and Old Saxon, then they should behave much like prepositions (but perhaps with a greater freedom to occur clause-initially), but in practice they resemble prefixes much more closely. The first 300 lines of the *Heliand* contain some 16 examples of a lone demonstrative in anacrusis (cf. the 19 instances of prefixal anacrusis listed in note 51):⁵²

⁴⁹ Such verses are discussed in general by Hofmann (1991a: 138–144), as well as by S. Suzuki (2004: 80–82, 114–115). The list of type B verses (*w/Sws*) in question differs between these two. Hofmann includes only 206b and 3351a. S. Suzuki (2004: 80) plausibly adds 1602a, and less plausibly 1890a, 3097a, and 4593a, these last three ending in dative *thiod* in M, but *thioda* in C (Gallée 1993: 203–204; Holthausen 1921: 98). The forms in C are more archaic, but it is not entirely obvious which is more original to the poem, and they should be considered ambiguous. Suzuki also adds in several cases with unstressed *un*-, though since this can be readily stressed it may not be prosodically in the same class as the "standard" prefixes: 752a, 1890a, 3720a, 4082a, 5661a. For the 38 examples of type C (*w/Ssw*), see Hofmann (1991a: 140).

⁵⁰ As noted above, prepositions can occasionally occur in anacrusis in Old English as well, but the following example would be unmetrical if it occurred in early Old English. Anacrusis is not, in Old English, usually allowed before plain type A verse formed by two trochaic words, and it is very rare in the off-verse.

In the first 300 lines of the *Heliand* alone I count 18 instances of monosyllabic prepositions serving as light word-feet, almost half the number that Hofmann (1991a: 140) finds for prefixes in the entire poem (which runs to nearly 6000 lines in its surviving form): 14a, 17a, 52b, 53a, 59a, 61a, 63a, 67a, 111a, 132a, 199a, 218b, 250a, 257a, 257b, 275b, 283a, 290a. The same 300 lines contain just two examples of prepositions standing as the sole anacrusis to a verse (21a, and the already cited 40b), against 19 cases of prefixes as the sole anacrusis (17b, 25a, 36a, 42a, 62a, 146b, 147a, 148b, 165a, 171a, 185a, 190a, 192a, 193a, 206b, 218a, 239a, 298a, 300a). These counts do not include multi-word anacruses.

 $^{^{52}\ 21}a,\ 26a,\ 101b,\ 103b,\ 135a,\ 175a,\ 187b,\ 197a,\ 202b,\ 216a,\ 239b,\ 255a,\ 266a,\ 268a,\ 274b,\ 289a,\ 292a,\ 294b,\ 297a.$

(31) them helithon an iro hertan the.DEM.DAT heroes.DAT in their hearts "in those heroes' hearts" (*Heliand* 21a) (x)Sw/(xxx)Sw

At the same time, demonstratives (in contrast to prepositions) rarely serve as metrical word-feet.⁵³ The first 300 lines of the *Heliand* contain no examples at all, though Hofmann (1991a: 140) does cite one instance from much later in the poem (*biti* is resolved):

(32) thes billes biti
the.DEM.GEN sword.GEN bite
"the sword's bite" (Heliand 4903a)
w/Sws

For comparison, lines 1001–1300 of the Old English *Genesis A* contain 11 examples of word-foot demonstratives:⁵⁴

(33) se nemde god
that.DEM.REL.NOM named god
"who named God" (Genesis A 1135a)
w/Sws

That demonstratives have become more acceptable in anacrusis has often been observed (Hofmann 1991a: 66–67; Russom 1998: 156–157), but Hofmann (1991a: 140) maintains that they are still unlike prefixes in more often being metrical constituents (light word-feet, in the terms used here). This does not seem to be correct, and the standard explanation for demonstrative behaviour in Old Saxon probably needs to be somewhat emended. The greater latitude towards unstressed elements in general, and demonstratives in particular, is often attributed to their greater syntactic necessity, and the decreased possibility of deleting such elements (Russom 1998: 156–157), but this explanation can only account for the increased presence of demonstratives in anacrusis, not their decreased presence as word-feet. Instead, though I would continue to see the change as driven by the shift of demonstratives to definite articles, I would suggest that this has led not merely to a syntactic change (more weak syllables that need to be metrically accommodated), but to a specifically prosodic one. Specifically, demonstratives – or perhaps better now, articles

⁵³ It is worth noting that the difference between prepositions and demonstratives within Old Saxon single-word dips is important. Looking at demonstratives alone, their rarity as word-feet might be thought due to the generally longer dips of Old Saxon (see note 46), and the rarity of single-word light word-feet in general. If this were true, however, then there should be no divergence between demonstratives and prepositions in Old Saxon, since any pressure for longer dips ought to have an equal effect on both word types. I thank an anonymous reviewer for drawing this point to my attention.

⁵⁴ 1055a, 1063a, 1134a, 1135a, 1169a, 1172b, 1188a, 1203b, 1232b, 1235b, 1241a.

(Kuhn 1933: 45) – have stopped being PWord clitics, and have become Free (or, less plausibly, Affixal) Clitics, with no status as a prosodic word at all.

Much the same trend may be observable in late Old English verse. In *The Battle of Maldon* (hereafter just *Maldon*), a poem composed in or (probably not long) after 991 and consisting of 325 surviving lines, there are three very well-known examples of demonstrative anacrusis (Russom 2017: 95–96; Griffith 2024: 64–65, 161):⁵⁵

- (34) a. se flōd ūt ge·wāt
 the.DEM current outward departed
 "the current departed out" (Maldon 72a)
 (x)S/Sws
 - b. se eorl wæs þē blīþra the.DEM hero was by.that.much happier "the hero was the happier" (Maldon 146b)
 (x)Sw/(x)Sw
 - c. þæs folces ealdor the.DEM.GEN people.GEN lord "the people's lord" (*Maldon* 202b) (x)Sw/Sw

This is certainly a much lower rate of demonstrative anacrusis than is found in the *Heliand* (found in less than 1% of lines, whereas the first 300 lines of the *Heliand* show a rate of about 5.3%). What is more striking, however, is that, just as in Old Saxon, demonstratives almost never stand as the sole light word-feet of verses in *Maldon*. The sole example is 121a:

(35) þām būr-þēne
the.DEM.DAT chamber-servant.DAT
"to that chamber-servant"
w/Ssw

The contrast between Old Saxon and *Maldon*, on the one hand, and on the other *Genesis A*, and its 11 examples per 300 lines (note 54) is striking. I would suggest that prosodically, demonstratives (or articles) had already lost their PWord clitic status by the time of *Maldon*, but the metrical or stylistic mode of the poem had not moved as far towards embracing anacrusis as had Old Saxon poetry a century and a half earlier.

⁵⁵ *Maldon* is a particularly important representative of late Old English verse, both because it is relatively long, and because it has a firm early limit on its date. By contrast, *The Death of Edgar* and *The Death of Edward* are equally well dateable (from in or just after 975 and 1066, respectively), but are much shorter, being each under 40 lines. On the other hand, *Judgement Day II* has some length to it (306 lines), but while probably broadly "late" (Fulk 1992: 262–264), lacks a precise historical anchoring.

9 Conclusions

Reconstructing the prosody of languages now only known through textual corpora is never an entirely obvious or straightforward task. In the case of the early Germanic languages, poetry is one of the most valuable sources of information: that the metre involves the prosodic regulation of at least some aspects of the languages is obvious. Actually exploiting this source requires adopting several working hypotheses at once, looking for points of productive congruence or alignment, and seeing how useful the whole exercise is in the end at explaining the data (and even a failed exercise may have some use in drawing attention to new aspects of the data). The main working hypotheses I have adopted here are:

- i. The preference for enclitics held just as much in early Germanic as it seems to today.
- ii. Clitics vary in their behaviour, not just in the direction of attachment, but in their prosodic status. I have slightly adapted the model of Anderson (2005), itself based on Selkirk (1996), and focused on the distinction between PWord enclitics (that have status as prosodic words) and Affixal or Free clitics (that are not prosodic words).
- iii. Weak syllables in Germanic verse that are essential to the metrical structure have a different status than inessential weak syllables. In word-foot terms, the metrically essential syllables are light word-feet, and the inessential ones are extrametrical additions.
- iv. Light word-feet prefer to be realized by PWord clitics, while extrametrical syllables are preferentially not prosodic words. This distinction is most pronounced in verse-initial position.

The data in question comes from verse-initial low-stress elements in alliterative poetry, with the main dimensions being whether they are extrametrical, metrically necessary, or in "expanded dips" (in which case the metricality of any given constituent is less clear-cut).

The extent to which this attempt at theoretical integration has been successful depends on how useful it is in understanding the data. The main results are summarized in **Table 1**. This lays out the behaviour of prepositions (Prep), prefixes (Pfx), and demonstratives/articles (Dem) in classical Old English poetry of roughly the eighth century (represented here by *Genesis A* (GenA), agreeing in most respects with *Beowulf*), the Old Saxon *Heliand* (Hel) of the ninth century, and, back in English, *Maldon* (Mald) of the late tenth. Each word class in each corpus is labelled for whether it should be considered a PWord clitic (PWd) or not (as assessed by its preference for serving as light word-feet versus standing in anacrusis) and whether it is preferentially pro-

⁵⁶ A further line could perhaps be added, based on the evidence of Gothic and the arguments of Hill et al. (2019), for Proto- and pre-Proto-Germanic, in which prefixes would not yet have developed their proclitic preference. If their analysis of Old English *tō* and Gothic *du* as cognates is correct, then this also suggests that the enclitic preference for prepositions dates to the time at which Kümmel's law would have operated. I am not currently aware of any data or arguments to bring to bear regarding the status of demonstratives at these earlier stages.

or enclitic (Pro or En). Demonstratives are here labelled as Pro/En, since they seem to show no particular bias against being proclitic (unlike prepositions, they can occur in positions where there is no host for them to be enclitic to), but this does not mean they are necessarily preferentially proclitic – and in later Germanic, they are often enclitic.

	PREP		PFX		DEM	
	PWd	Pro/En	PWd	Pro/En	PWd	Pro/En
GenA	1	En	Х	Pro	1	Pro/En
Hel	1	En	Х	Pro	Х	Pro/En
Mald	1	En	Х	Pro	Х	Pro/En

Table 1: Summary of preferred status of clitic classes.

This kind of synthesis certainly has its limits. The reasons why demonstratives/articles should apparently be more flexible in their direction of attachment is not obvious (a comparison with Norse, where a different demonstrative stem developed a very strong preference for enclisis, might be instructive), and there is a further trajectory apparent in the shift of prefixes from separable, often enclitic elements in Gothic and (presumably) Proto-Germanic to closely bound proclitics (a status that is then stable across the corpora examined here). Even so, it seems to me that drawing a distinction in clitic "strength" (modelled here in PWord/non-PWord status, though this could potentially be formulated in other terms) is clearly useful in explaining not only the synchronic distinctions between, e.g., prepositions and prefixes in *Genesis A*, but also in accounting for the diachronic history of demonstratives. The well-known syntactic development of these into articles can be paralleled by a simple categorical shift in status to the weaker (non-PWord) type of clitic. The idea that prepositions are often (even strongly preferentially) enclitic in early Germanic also emerges as a strong conclusion, anticipated by Whitman (1993). These are encouraging results, and suggest that the integration of metrical theories, phonological frameworks, and philological data can, despite the inherent uncertainties and difficulties, be productive.

Abbreviations

dat - dative

dem - demonstrative

En – enclitic

gen - genitive

GenA - Genesis A

Hel - Heliand

Mald - The Battle of Maldon

neg - negation

nom - nominative

npst - non-past

obj - object

Pfx – prefix

PPh – prosodic phrase

Prep - preposition

Pro – proclitic

PWd - prosodic word

PWord – prosodic word

rel - relative

S – strong metrical position

s – half-strong metrical position

w - weak metrical position

WF - word-foot

(x) – extrametrical syllable

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Competing interests

The author has no competing interests to declare.

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