The meaning(s) of MUST in Middle English

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Overview of paper

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1 Background

- English modals: a popular research topic (e.g. Plank 1984; Traugott 1989; Warner 1993; Bybee, Perkins & Pagliuca 1994; Traugott & Dasher 2002).
- MUST textbook example of "root" > epistemic modality (e.g. Heine & Kuteva 2002; Ziegeler 2016). Recent study: stepwise shift from dynamic modality in 17th c. (Furmaniak 2011).
- Old English MUST also much discussed usually translated as PDE 'may', but exact semantics contested.
- Middle English: semantic shift from 'may' to 'must'. Shift from permission to obligation under negation? (Standop 1957; Goossens 1987; OED, s.v. mote v.¹) or because of "invited inferences of obligation" in contexts of permission? (Traugott & Dasher 2002: 123–127)
- O This paper: Detailed study of semantics of MUST in a corpus of Early and Late Middle English.

2 Corpus and analytical categories

2.1 Corpus

- Middle English material: texts from six electronic corpora (listed in references).
- o 200 examples from Early Middle English (c. 1150–1350 AD) and 200 examples from Late Middle English (c. 1350–1500 AD).
- Both prose and verse, but MUST never in alliterating or rhyming position. Attempt to include no more than c. 10 hits from each text.

2.2 Analytical categories

- Classification of modal meanings based on recent work on Dutch (Nuyts et al. 2010; Nuyts & Byloo 2015).
- Fine-grained and open-ended classification, similar in spirit to van der Auwera & Plungian (1998). Semantic distinctions comparable to the ones made in the Danish functional tradition (Bech 1949; Hansen & Heltoft 2011; Obe 2011, 2013).
- Three categories important here: dynamic, directive, and volitive meanings.
- O Dynamic meanings: event can or has to occur because of how the discourse world is constituted. Subtypes: participant-inherent (1), participant-imposed (2), and situational (3).
- (1) Why some people can whistle easily while others struggle to make even the slightest toot is somewhat of a mystery.¹
- (2) When the renovation began, the contractors had no blueprints to work with, so they had to improvise [...]²

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 $^{^{\}scriptscriptstyle 1}$ https://www.healthline.com/health/how-to-whistle (22/08 2018)

 $^{^{2}}$ https://www.nytimes.com/2007/02/01/garden/01treasury.html (22/08 2018)

- (3) With a team named Fireflies, it had to happen at some point—the perfect partner for a park promotion had to be an insect company.³
- O Directive meanings: permission (4) or obligation (5) to realise a state of affairs. The "issuer" can be the speaker, some other person or institution, a deity, etc. Jespersen (1924: 320): an "element of will" is involved.
- (4) You can even smoke cigarettes in hospitals in Pakistan [...]⁴
- (5) In New Zealand you have to wear a safety belt if your vehicle was fitted with one.⁵
- O **Volitive** (or optative) meanings: event is wished or hoped for, e.g. in performatives. Present-Day English *may* can be used in this way, cf. (6).
- (6) *May* you all enjoy your golf for the rest of the summer.⁶
- "Deontic" modality usually synonymous with "directive" category (e.g. Warner 1993; van der Auwera & Plungian 1998; Palmer 2001). Nuyts et al. (2010) only use "deontic" for moral/ethical evaluations, which are very marginal in my data.
- Epistemic modality not attested in my data.

3 Old English MUST

- OE MUST usually translated as 'may' in PDE editions/translations, but much discussion about its semantics.
- "Ambiguity theory" (Bosworth & Toller 1898; Goossens 1987; OED;
 Ono 1958; Standop 1957; Van Herreweghe 2000): MUST generally expressed possibility, but necessity uses are attested occasionally.
- o "Possibility theory" (Solo 1977): MUST always expressed possibility; attestations with apparent necessity meaning can be explained as textual errors or stylistic choices (litotes, irony).
- "Variable-force theory" (Yanovich 2016): MUST was a "variable-force" modal, expressing possibility with the "presupposition of inevitable actualization" (at least in "Alfredian" OE, c. 900 AD). Sometimes best rendered by PDE 'may', sometimes by 'must'.
- In any event: polysemy in terms of modal meaning categories dynamic (7), directive (8), and volitive (9) uses.
- (7) {Æfter þeosan gewinne gewearð þætte Perse gebudan frið eallum Creca folce, næs na for þæm þe hie him ænigra goda uþen, ac for þæm þe hie wunnon on Egypti,}

pæt hie most-en for him þy bet þæm
COMP they MUST.PST-PL.SBJV for them the better DEM.DAT

gewinn-e fullgong-an war-DAT accomplish-INF

'{After this war the Persians offered peace to all the Greeks, not because they wished to do them any good, but because they were at war with the Egyptians}, so that they would better be able to attend to that war instead of them [i.e. the Greeks]'. (Old English Orosius; Or 3, 1.55.15)

³ https://www.thestate.com/living/food-drink/article212249949.html (22/08 2018)

http://presspartners.org/fellow-blog-khalid-khattak-hookahs-and-cigarettes/ (22/08 2018)

https://www.drivingtests.co.nz/resources/seat-belt-law-in-new-zealand/ (22/08 2018)

⁶ https://www.burleygolfclub.co.uk/news.php?newsitem=132 (22/08 2018)

(8) & mon mot feoht-an orwige, gif he gemeteð and man MUST.PRS fight-INF exempt if he meets

oper-ne æt his æw-um wif-e, betyned-um other-M.ACC by his lawful-N.DAT wife(N)-DAT locked-DAT

dur-um oððe under an-re reo-n door-dat.pl or under INDF-F.DAT blanket(F)-dat

'And a man **is allowed to** fight without forfeit if he finds another man with his lawful wife behind locked doors or under a blanket' (*Laws of Alfred the Great*; LawAf 1, 42.7)

(9) ... in helleflod mote he drinklen with pe traytour Iudas'... may he drown in the rivers of Hell with the traitor Judas!'(Charter, Abbey of Bury St Edmunds; Ch 1608)

4 Middle English results

4.1 Early Middle English (c. 1150–1350 AD)

- O Dynamic uses almost exclusively necessity (10–11). Directive (12) and volitive (13) uses continue as in OE.
- (10) alswa þe gode ancre ne fleo ha neauer se hechze . ha mot lichten oðerhwiles dun to þeorðe of hire bodi . eoten . drinken . slepen . wurchen . speoken & heren of þ hire neodeð . of eorðliche þinges 'Likewise, the good anchorite, even if she never flew so high before [spiritually], she has to come down to the earth at some point on account of her body, and eat, drink, sleep, work, and speak and hear of what she needs of earthly things' (Ancrene Riwle; PPCME2 [CMANCRIW-1,II.107.1322])

- (11) Me schon I mot me self ofdrawe
 Ase y neuer get ne dede.

 {After all the servants have left:} 'My shoes I [the earl] will
 have to take off myself, / as I have never done before'
 (Beues of Hamtoun 3035–36; CMEPV)
- (12) He 3af gret trolliage to Rome
 Pre hundred pound ich 3er,
 Er þat he most be quite & sker
 {After Cassivellaunus has been taken captive by Caesar:} 'He
 paid a great tribute to Rome / three hundred pounds each
 year, / before he was allowed to go free'
 (Short Metrical Chronicle 982–84; Burnley & Wiggins 2005)
- (13) *þis weater mote iwurðe me wunsum & softe*'May this water become mild and agreeable to me'

 (Life of St Margaret; PPCME2 [CMMARGA,86.492])

Table 1: Early Middle English meanings

	dynamic	directive
POSS	3 (1.5%)	28 (14%)
NEC	80 (40%)	3 (1.5%)

volitive	other		
76 (38%)	10 (5%)		
(total: 200)			

4.2 Late Middle English (c. 1350–1500 AD)

- O Permission uses have all but disappeared MUST is now clearly a necessity modal, both in dynamic (14) and directive (15) uses.
- O Volitive uses survive into Late Middle English (16), but are used less frequently. Sporadically attested even in EModE (*OED*, s.v. *mote* v.¹, sense 3).

- (14) And theñ take hem vp oute of the pañ, and caste hem to þe wessell with the sirippe, altogidre, in a dissh; And therefore thi sirripe most be rennyng ynow, and no3t to stiff

 'And then remove them [the pancakes] from the pan and put them in the pot with the syrup, all together, [put it] in a dish; and for this reason your syrup has to be sufficiently runny, and not too stiff'

 (Cookbook, Harley MS 4016, p. 91; ICMEP)
- (15) Euery brother and suster þat hathe ther helthe, of what countre or place that so euer they be, yf they may goodly, must here masse euery day

 'Every brother and sister who is in good health, no matter which country or place they come from, if they are properly able to, have to attend mass every day'.

 (Third Order of Seynt Franceys, p. 52; ICMEP)
- (16) Grett goddys curse mut go with the'May great God's curse follow you!'(Ludus Coventriae, p. 204; Helsinki Corpus)
- Examples of possibility meaning as in (17) found in three texts, all
 of them geographically relatively peripheral (*Alphabet of Tales*, *Prose Brut, North Midland Lapidary*). The *EDD* records such uses
 even in 19th-c. Scots and northern English.
- (17) God sent hym swilk contricion þat euer when he began to shryfe hym, he sighed & wepid so sore þat he mott not speke a wurd 'God sent him such a sense of guilt that whenever he was about to confess, he would sigh and weep so bitterly that he could not speak a word' (Alphabet of Tales, p. 57; ICMEP)

Table 2: Late Middle English meanings

	dynamic	directive
POSS	4 (2%)	2 (1%)
NEC	119 (59.5%)	39 (19.5%)

volitive	other		
21 (10.5%)	15 (7.5%)		
(total: 200)			

5 Discussion and Germanic parallels

5.1 Causes of the change

- O POSS > NEC happens first in dynamic, then in directive uses.
- Reinterpretation from permission to obligation unlikely, whether for pragmatic reasons or influenced by negation.
- Obligation meaning rather develops out of dynamic necessity; similar to change from dynamic possibility to permission in *may* and later *can* (and in many other languages, cf. Heine & Kuteva 2002: 27–8, 215–16).

5.2 Germanic parallels

- Possibility > necessity change has West Germanic parallels: cf.
 Dutch moeten, High German müssen, West Frisian moatte.
- O Diewald (1999: 340–343) on *müssen*: necessity meaning appears already in OHG. Perhaps reinterpretation in contexts with only one possibility.
- O In EME frequent collocation with necessity adverbs, as in (18) (survives as PDE *must needs* and *needs must*). Perhaps originally to disambiguate from possibility uses?
- (18) & nede most hit polien. pt te per-in itimeð.

 {Warning to women against having children:} 'And you necessarily have to suffer it, whatever happens to you in this [i.e. childbirth]' (Hali Meiðhad; PPCME2 [CMHALI,155.399])

Table 3: EME MUST + necessity adverb

Adverb	Att.
nede	12
nedes	2
neodeliche	1
nedunge	1
for fine nede	1
nedes costes	1
Total	18

- Another parallel: Danish MÅ (cognate of English MAY and German MÖGEN) from dynamic possibility to dynamic necessity.
- Middle Danish meanings dynamic possibility, directive possibility, and volitive. Dynamic possibility meanings as in (19) are now obsolete (replaced by KAN).
- (19) {Och wel hun sydhæ neth foræ dywreth tha gangher thet til oc faller paa synæ knæ och leggher sith howith i hennæ skøth oc wordher saa fast at sowæ}

'{And if she [a virgin] sits down before the beast [a unicorn], then it will approach her, fall to its knees and lay its head in her lap, and fall into a sleep so deep} that she **can** kill the beast.' (*Lucidarius*, MS. c. 1450; cited from Obe 2011: 258)

O Directive possibility (i.e. permission) still found in Modern Danish, cf. (20).

- (20) Det eneste, han måtte skriv-e i fængsl-et, var et
 DEF.N only he MÅ.PST write-INF in prison-DEF was INDF.N

 ugentlig-t brev til sin kone [...]
 weekly-N letter(N) to REFL.POSS.C wife(C)
 - "The only thing he **was allowed to** write in prison was a weekly letter to his wife [...].'
 (KorpusDK, newspaper article, 1991)
- O Dynamic uses of MÅ now have necessity meaning (21).
- (21) Montør-en fik sved-et hår-et, mens lejlighed-en-s fitter-DEF get.PST singe-PTCP hair-DEF while flat-DEF-POSS
 - 22-årig-e mandlig-e beboer måtte behandl-es for chok. 22-y.o.-DEF male-DEF occupant Må.PST treat-PASS for shock
 - 'The gas fitter had his hair singed, while the 22-year-old man living in the flat had to be treated for shock.'
 (KorpusDK, newspaper article, 1991)
- In other words: Middle Danish Må similar to Old English MUST;
 Modern Danish Må similar to Early Middle English MUST.
- Obe (2011, 2013): dynamic POSS > NEC in late Middle Danish, possibly in the late 15th c.
- Critical contexts hard to identify, but the language of the period is relatively well-documented. However, no ready-made corpora.

6 Conclusions

- Necessity meaning of MUST develops first in dynamic uses (OE > EME), and then spreads to directive ones (EME > LME)
- O End of ME: MUST necessity modal, except in idiomatic expressions and in a few texts from more peripheral dialect areas.
- Polyfunctionality at all stages; semantic rather than in terms of grammaticalization.
- O Germanic parallels: West Germanic cognates of MUST, but also Danish cognate of MAY (2–3 centuries later). Middle Danish pattern similar to OE, Modern Danish pattern similar to EME.

Old English and Middle Danish

	0	
dynamic POSS	permission	volitive
dynamic NEC	obligation	

Early Middle English and Modern Danish

dynamic POSS	permission	volitive
dynamic NEC	obligation	

Late Middle English

dynamic POSS	permission	volitive
dynamic NEC	obligation	

- Future work from cross-linguistic and comparative Germanic perspective: How common is POSS > NEC? Older meanings preserved in more peripheral Germanic vernaculars?
- o Historical corpus of Danish needed.

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PPCME2 = Kroch, Anthony, and Ann Taylor (eds.). 2000. *Penn-Helsinki Parsed Corpus of Middle English*, 2nd edn. University of Pennsylvania. CD-ROM.

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