# Polysemous want: Language change from a synchronic perspective

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- In Brazilian Portuguese, Mandarin Chinese, and Dutch, *want* is ambiguous between desire and future meanings.
- We argue that the future use aligns with root modals (and not, for instance, with tenses).
- Besides these abstract similarities, we find slight semantic variation in future want.
- This shows the value of synchronic data for studying diachronic change.

Cross-linguistically, desire verbs tend to acquire non-desire future meanings.

- Classic example: English will < Old English willan "want" (1)
- Also reported for Danish, Georgian, Inuit, Malay/Indonesian, Buli (Niger-Congo), Nimboran (Papuan), Bongu (Papuan) and Dakota (Siouan) (Bybee et al. 1994; Harris & Campbell 1995).
- (1) ... þa hi to scipan woldon.
  when they to ships wanted
  '... when they wanted to go to their ships.' (OE, Traugott 1989)

We ask two questions in this project:

### 1. How are the two uses related?

- Standard approach in diachronic research: deduce semantic and syntactic properties at various stages through corpora.
- This project takes a synchronic approach (also Bybee et al. 1994): describe three languages *currently* in this process: Dutch (D), Mandarin Chinese (MC), and Brazilian Portuguese (BP).
- In these languages, both readings are available.

  A case of *ambiguity* (as opposed to, e.g., *generality*).
- (2) a. O João está querendo dormir. BP the John is wanting sleep
  b. Yuehan yao shuijiao le. MC John want sleep LE
  c. Jan wil nog wel slapen. D Jan wants still wel sleep
  'John still wants to sleep.' / 'John will probably sleep.'

#### 2. What kind of future does want become?

Important in light of recent research showing that languages encode future in diverse ways (Cinque 1999; see Bochnak 2019 for a recent review):

- Tense: English will (Kissine 2008), MC jiang (Huang 2015),
- Modal (epistemic, root, etc.): English will (Palmer 1987; Copley 2009; Giannakidou & Mari 2018; Klecha 2013); Greek tha and the

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Italian future morpheme (Giannakidou & Mari 2018); St'át'imcets kelh (Matthewson 2006); Indonesian akan (Copley 2009); MC jiang, hui, yao (Lin 2006; Wu & Kuo 2010; Santana LaBarge 2016),

• Aspect: Indonesian *mau* and English *be going to* (Copley 2009), Gitksan *dim* (Matthewson 2013), MC *yao* (Lin 2012).

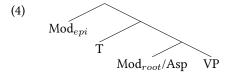
Our approach lets us probe native speaker intuitions to uncover formal properties that are otherwise hard-to-observe.

Want patterns syntactically like a root modal.

Semantically, there are some indications of a modal component, too.

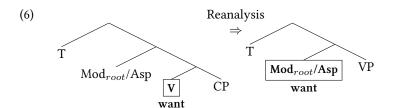
- (3) Root modal = A modal with a circumstantial modal base (Kratzer 1991), grouping together ability, deontic, circumstantial, teleological modals.
  - a. E.g. English We have to give a talk, able to, ...
  - b. Cf. epistemic modals, e.g. We might be in Ohio.

We follow Cinque 1999 (and Hacquard 2006; Grano 2015) in that root modals are in functional projections just above the VP (4), leading to particular syntactic and semantic behavior.



We argue that speakers can easily reanalyze *want* as having modal syntax because a *want* sentence is amenable to an alternative modal analysis (5) (Lightfoot 1979; Roberts & Roussou 2003) (Also see literature on restructuring, e.g. Cinque 2006; Grano 2015).

(5) Yuehan yao shuijiao. John want sleep 'John wants to sleep' / 'John will sleep.'



The resulting *want* initially aligns semantically with root modals (or aspect, but not epistemic modals) because of shared selectional and temporal properties (following Hacquard & Cournane 2016).

#### Outline

- History of future want
- An ambiguity in wants
- Future want as a root modal
- Open issue: Semantic variation
- · Discussion and conclusion

# 1 How old is future *want* in the three languages?

- Dutch future want: 13th century
  - 'Infrequent' in Early Middle Dutch (Pijnenburg & Schoonheim 1996); unambiguous future readings appear in Middle Dutch (Verwijs 1912).
  - *Wil* in Afrikaans, which originated from 17th century Dutch (Smith 1952), also has future uses (Conradie 2016).
- MC future *want*: 18th century, if not earlier (see also Santana LaBarge 2016)
  - Present in the classic Mandarin novel *Dream of the Red Chamber*, circulated and published in the late 18th century
  - Described in the grammar *Notitia linguæ sinicæ* (Prémare 1736/1831).
- BP future want: probably the most recent
  - Not formally documented in grammars, dictionaries, nor the only

diachronic study on BP *want* we know of, though acknowledged in several places in the synchronic literature (Ribeiro & Coelho 2007).

 Future want absent in European Portuguese and in some dialects of Brazilian Portuguese. Our informants come mainly from Curitiba, in the South of Brazil.

# 2 Ambiguity of *want* sentences in BP, MC and D

English want can be used in a non-bouletic way, although not productively.

- (7) a. %The key doesn't want to fit.
  - b. %It wants to rain.

In BP, MC, and D, however, future *want* is productive. We show below that *want*-sentences are ambiguous<sup>1</sup> between desire and future readings.

### 2.1 No sentience requirement for a subject for future *want*

If want-sentences are ambiguous, then there could be distinct relations between want and its subject.

This prediction is borne out: Desire *want*-sentences must have a sentient subject. In contrast, future *want*-sentences do not.

- (8) a. O café está querendo acabar. the coffee is wanting end "The coffee is about to run out."
  - b. Kafei yao he-wan le coffee want drink-finish LE 'The coffee is about to run out.'
  - c. De koffie wil nog wel opraken. the coffee wants still WEL run.out 'The coffee will probably run out.'

Future want can occur with clausal idioms.

- (9) a. A casa está querendo cair.
   the house is wanting fall.
   Lit. 'The house wants to fall.' (An undesirable event is about to happen.)
  - Shengmi yao zhu cheng shufan le. uncooked.rice want cook become cooked.rice LE
     Lit. 'The rice is going to be done.' (An undesirable irreversible change is about to happen.)
  - c. Het kwartje wil nog wel vallen.
     the quarter wants still WEL fall
     Lit. 'The quarter wants to fall.' (It's going to become clear.)

### 2.2 Ambiguity tests (Zwicky & Sadock 1973)

Alternative hypothesis: in these languages, *want*'s semantics is general, compatible with both desire and future readings.

- Cf. teacher, compatible with any subject of instruction.
- Cf. pen, ambiguous between 'animal enclosure' or 'writing tool.'
- (10) John and Mary are teachers.
  - a.  $\rightarrow$  John is a math teacher, Mary is also a math teacher. "uniform reading"
  - b.  $\rightarrow$  John is a math teacher, Mary is a physics teacher. "mixed reading"
- (11) a. João e Maria estão **querendo** dormir. John and Mary are wanting sleep
  - b. Yuehan he Mali yao shuijiao (le). John and Mary want sleep LE
  - Jan en Marie willen nog wel slapen.
     John and Mary want still want sleep.
     Readings:
    - i) 'John and Mary want to sleep.' uniform
    - (ii) 'John and Mary will (probably) sleep.' uniform
    - (iii) #'John wants to sleep and Mary will sleep.' #mixed
    - (iv) #'John will sleep and Mary wants to sleep.' #mixed

<sup>&</sup>lt;sup>1</sup>Open question whether the two *wants* are represented as different lexical entries, or as one lexical entry that gets restricted by the context (as in the case of a Kratzerian modal (e.g. Kratzer 1991)).

### 2.3 Interim summary

Native speaker intuitions show that:

- Want-sentences are currently ambiguous.
- Future want has different selectional requirements.

But these tests do not tell us what kind of future it is: is it a tense, modal, aspect, etc.?

# 3 Future *want* in the synchronic grammar

This section: Distributionally, future *want* patterns like a **root modal**, and not a tense or epistemic modal.<sup>2</sup>

In other words: the three languages converge on the same outcome.

#### 3.1 Future *want* is not a tense

As with desire *want*, future *want* in BP and D are tensed. (For a similar argument showing Gitksan *dim* is not a tense, see Matthewson 2011.)

- (12) O café quis acabar, (mas a gente comprou mais). the coffee wanted end but we bought more 'The coffee was about to run out, but we bought more.'
- (13) De koffie wilde nog wel een dagje mee (maar nu het The coffee wanted yet still a day.DIM with but now the hele voetbalelftal er is niet meer).

  whole soccer.team there is not anymore 'The coffee was likely to last another day (but now that the soccer team is all here, not any longer.)'

MC has no morphological tense. But Huang (2015) argues that MC has a syntactic tense morpheme, *jiang*.

• Jiang can co-occur with future want.

(14) Feiji jiang yao qifei. plane FUT want take.off 'The plane is going to take off.'

### 3.2 Future *want* patterns with root modals, not epistemics

### 3.2.1 Subcategorization restrictions

In BP and MC, future *want* must take a VP-like complement, not a clausal complement with overt subject.<sup>3</sup>

- (15) a. O café está querendo acabar. the coffee is wanting end 'The coffee is about to run out.'
  - b. \*Está querendo [que o café acabe hoje]. is wanting that the coffee end.SUBJ today
  - c. Kafei yao he-wan le coffee want drink-finish LE
  - d. \*Yao [kafei jintian he-wan] (le).
     want coffee today drink-finish LE
     Intended: 'The coffee is about to run out (today).'

Parallel with root modals (and functional heads in general).

- (16) a. As armas **devem** ser guardadas em um lugar seguro. the firearms must be stored in a place safe
  - b. \*Deve [que as armas sejam guardadas em um lugar must that the firearms be.SUBJ stored in a place seguro].

    safe

<sup>&</sup>lt;sup>2</sup>We leave aside for now whether there are aspectual ingredients on top of the modal semantics. See section 5.

<sup>&</sup>lt;sup>3</sup>Note that desire *want* can take a clasual complement with a subject.

<sup>(</sup>i) a. O João está querendo [que o café acabe hoje]. the John is wanting that the coffee end.SUBJ today

Yuehan yao [kafei jintian he-wan].
 John want coffee today drink-finish
 'John wants the coffee to run out today.'

- c. Qiangxie dei/ bixu cunfang hao. firearms must/ must store well
- d. \*Dei/ Bixu [qiangxie cunfang hao].
   must/ must firearms store well
   Intended: 'The firearms must be stored safely.'

For some D speakers, future *want* can take clausal complements with overt subjects (17a).

- Superficially different from BP and MC counterparts.
- But actually aligns D future want with root modals in D (17b).<sup>4</sup>
- (17) a. %Het wil nog wel [dat de aarde vandaag vergaat]. it wants still WEL that the earth today collapses 'The earth will probably collapse today.'
  - b. Het kan [dat de aarde vandaag vergaat].it can that the earth today collapses'It is possible that the earth collapses today.'

In the next three sections we will discuss language-specific tests that distinguish roots from epistemics.

#### 3.2.2 Brazilian Portuguese

First, future *want* cannot take complements with a perfect or a progressive aspect (18).

- (18) a. \*O telhado quis ter caído (às três da tarde). the roof wanted have fallen at three of the afternoon 'The roof will collapse at 3 in the afternoon.'
  - b. \*O telhado está **querendo** estar **caindo** (quando a Maria the roof is wanting be falling when the Mary chegar).

arrive

'The roof will be collapsing when Mary arrives.'

This restriction is shared with root modals, but not with epistemic modals (19) or the future *vai* "will" (20).

- (19) a. #O João deve/ pode ter tocado piano. the John must might have played piano Intended: 'John {needs to/is able to} have played the piano.'
  - b. #O João deve/ pode estar tocando piano.
     the John must might be playing piano
     Intended: 'John {needs to/is able to} be playing the piano.'
- (20) a. O telhado vai ter caído.

  The roof will have fallen.'
  - b. O telhad vai estar caindo.The roof will be falling.'The roof will be falling.'

Second, root modals and future want cannot embed stative predicates.

(21) a. \*Está querendo ser 3 horas da tarde.

is wanting be 3 hours of afternoon.

'It will be 3 p.m. (soon).' Ser is stative

b. ?Está querendo dar 3 horas da tarde.

is wanting give 3 hours of afternoon.

'It is about to turn 3pm.'

Dar is eventive

c. Eu estou querendo {\*estar/ ficar} doente.

I am wanting be become sick

Intended: 'I am about to be sick.' *Estar* is stative, but not *ficar*.

Compare with epistemic modals like *poder* 'might' (22a) or the future *vai* "will" (22b), which can embed stative predicates:

(22) a. Eu posso estar doente.

I might be sick

'I might be sick.'

b. Eu ainda vou estar doente, quando a Maria chegar.

I still will be sick when the Mary arrives 'I will still be sick when Mary arrives.'

<sup>&</sup>lt;sup>4</sup>We set aside the question of whether complement clause in (17b) is the complement of *want* or a covert underlying verb, i.e. "it may happen that the earth will collapse today," van Dooren 2017.

#### 3.2.3 Mandarin Chinese

Similar restrictions on aspect and stativity apply to Mandarin want.

Another parallel: negation. Epistemic modals and future hui can be negated by bu (23a)-(23b).

- (23) a. Lisi bu keneng aishang Zhangsan.
  Lisi not might fall.in.love.with Zhangsan

  'It is not possible that Lisi fell in love with Zhangsan.'
  - Lisi bu hui aishang Zhangsan
     Lisi not will fall.in.love.with Zhangsan
     'Lisi will not fall in love with Zhangsan.'

But want cannot (24a) (Li & Thompson 1981).

- A subset of root necessity modals also cannot be negated by *bu* (24b).
- (24) a. \*Lisi bu yao aishang Zhangsan.
  Lisi not want fall.in.love.with Zhangsan
  Intended: 'Lisi will not fall in love with Zhangsan.'
  - b. \*Lisi bu {bixu/ dei} aishang Zhangsan. Lisi not must must fall.in.love.with Zhangsan Intended: 'Lisi is {not obliged to / obliged to not} fall in love with Zhangsan.'

#### 3.2.4 Dutch

Future *want*, like root modals, can take a complement with no overt verb (25).

- D modals could still be auxiliaries if they are supplemented by a covert verb (Van Riemsdijk 2002, van Dooren 2017; see McCawley 1974, Grano 2015 for *want NP*).
- (25) a. Die koffie wil nog wel op vandaag. that coffee wants still WEL out today 'The coffee will probably run out today.'
  - b. Deze bank wil nog wel een rondje mee. this couch wants still WEL a round with 'This couch will probably last for a while longer.'5

Epistemic modals cannot (Barbiers 1995).

(26) Mijn grootouders moeten een hek.
my grandparents must-PL a fence
'My grandparents are obliged to have/need a fence.' Deontic,
teleological modal
#'It is necessarily the case that my grandparents have a fence.'
Epistemic modal

To sum up: BP, MC, and D future wants pattern with root modals.

Next section: Previous proposals about grammaticalization — this pattern is expected.

# 4 The change in *want*

Three strands of research:

- 1. Meaning-based approaches, claiming a path from Volition > Intention > Future (Bybee et al. 1994, see also Sweetser 1987, 1990; Traugott 1989).
- 2. Morphosyntactic approaches, discussing the path from lexical verbs to functional items (Lightfoot 1979; Roberts & Roussou 2003).
- 3. Hacquard & Cournane (2016): Structural reasons for lexical verbs changing into root instead of epistemic modals.

### Our question:

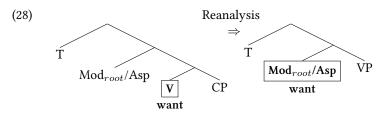
- Why does future *want* pattern like a root modal?
- Initial alignment between desire *want* and root modals (or aspect).

<sup>&</sup>lt;sup>5</sup>From https://www.contactzuid.nl/marktplein/758/deze-bank-wil-nog-een-rondje-mee

### 4.1 A reanalysis in want

Starting point: Syntactic ambiguity (Roberts & Roussou 2003).

(27) Lisi yao shuijiao. Lisi want sleep 'Lisi wants to sleep' / 'Lisi is going to sleep.'



Semantically, this means that a predicate of events (29) loses its event argument (30) (Hacquard & Cournane 2016).

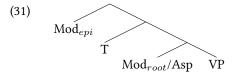
• Our proposal does not depend on any further specific semantic ingredients of desire *want*.

(29) 
$$\llbracket want_{\text{verb}} \rrbracket = \lambda p.\lambda e. \text{ want(e) } \& \forall w' \in \text{want(e): } p(w')$$

(30) 
$$\| want_{modal} \| = \lambda p. \forall w' \in want(e): p(w')$$

Following Hacquard & Cournane (2016): Why would there be an initial alignment between desire *want* and root modals?

I Because desire want is syntactically and semantically similar to root modals (or aspect), as opposed to epistemic modals.
(WARNING: semantic variation - see section 5)



### 4.2 Alignment with root modality

Three arguments for going from desire want to a root modal.

- 1. Alignment in subcategorization (Hacquard & Cournane 2016):
  - Desire *want* has complements that resemble the complements of verbs with root modality (e.g. *try*, and *allow*)
  - Verbs with epistemic semantics, like think and believe, have complements that morphosyntactically resemble main clauses (e.g. Gillette et al. 1999; Hacquard & Lidz 2019; Huang et al. 2018).

### 2. Alignment in scope

- Root modals scope under tense, but epistemic modals scope over tense (Groenendijk & Stokhof 1975; Iatridou 1990 a.o., but see Rullmann & Matthewson 2018).
- (32) John had to be in Ohio last night.
  - a. Epistemic: Given what we know *now*, it is necessary that John *was* in Ohio.
  - b. Root: Given the obligations *in some past time*, it was necessary that John be in Ohio.
- 3. Alignment in temporal orientation
  - Desire *want* generally has a future temporal orientation: the time of the prejacent (complement) event must follow the time at which *want* is evaluated (Giorgi & Pianesi 1997; Remberger 2010 a.o., see Wurmbrand 2014 for a syntax-centered approach).
- (33) Mary wants to leave.  $\rightarrow$ 
  - a. Mary has a desire at time t.
  - b. Mary's leaving occurs after t.

In MC and BP, desire *want* cannot take a complement with a past or present orientation (34).

• Variation in judgments for D (34c).

(34) a. \*Eu quero ser presidente agora.

I want be president now

Intended: 'I want to be president now.' #Present TO

b. \*Wo yao (xianzai) shi zongtong.

I want now be president

Intended: 'I want to be president (now).' #Present TO

c. %Ik wil nu president zijn.

I want now president be

'I want to be president now.' %Present TO

Root modals: generally a future TO (Condoravdi 2002; Rullmann & Matthewson 2018):

- (35) a. She needs to eat vegetables.

  'She is obliged (now) to eat vegetables (in the future).' Future
  - b. Ela **precisa** comer vegetais. she must eat vegetables
  - c. Ta dei chi shucai. 3s must eat vegetable
  - d. Ze **moet** groenten eten. she must vegetables eat

Epistemics: can have a non-future TO (36).

- (36) a. Mary might/must be the murderer.

  'It is possible / necessary that Mary committed the murder.'

  Past TO
  - b. A Maria {pode/ deve} ser a assassina. the Mary can must be the murderer
  - Mali {keneng/ yiding} shi xiongshou.
     Mary might must be murderer
  - d. Marie {kan/ moet} de moordenaar zijn.
     Mary can must the murderer be
     '[Given the facts,] Mary might/must be the murderer.'

If The close alignment between root modals and desire want might explain why future want ends up behaving like a root modal (and not an epistemic).

# 5 Probing the semantics of future *want*

What we have seen so far:

- Future *want* patterns syntactically like a root modal in BP, MC & D...
- ... which fits in with current ideas on grammaticalization.

Does the semantics align?

MC, BP and D future *wants* show indications of a modal component; BP future *want* might moreover have an aspectual component.

- Note that limited variation is possible within Hacquard & Cournane 2016.
- Previous observation: Desire want has changed into deontic modals in MC (Santana LaBarge 2016), Georgian (Harris & Campbell 1995), and Tucano (Bybee et al. 1994).

### 5.1 Indications for modal semantics

Klecha (2013): Diagnostics for modality.

• MC, BP and D future wants pass at least one of the diagnostics.

### 5.1.1 Counterfactual readings

Klecha: A lexical item has modal semantics if some morphological variant is associated with a non-veridical reading.

- Example: English be going to / gonna.
- (37) Julia was gonna finish her paper (but she got distracted/if she hadn't gotten distracted). (Klecha 2013:450, ex. 15a)

BP and D future wants' past tense form is non-veridical.

- A purely temporal analysis cannot account for the counterfactual inference.
- (38) O café quis acabar, (mas a gente comprou mais). the coffee wanted end but we bought more 'The coffee was about to run out, but we bought more.'

(39) De koffie wilde nog wel een dagje mee (maar nu het The coffee wanted yet still a day.DIM with but now the hele voetbalelftal er is niet meer).

whole soccer.team there is not anymore
The coffee was likely to last another day (but now that the soccer team is all here, not any longer.)'

MC *yao*: impoverished verbal morphology, but syntactic environments (e.g. with appropriate adverbs) where it has a counterfactual reading (40).

(40) Kafei benlai shi yao he-wan de (keshi zuihou coffee originally be want drink-finish PART but in.the.end que mei he-wan).
but NEG drink-finish
'The coffee was about to run out (but in the end it did not).'

#### 5.1.2 Modal subordination

Modal subordination (Roberts 1989): a modal can implicitly introduce a salient conditional that restricts the modal's domain.

Klecha's diagnostic: If a morpheme is associated with domain restriction, it can be reasonably analyzed as a modal.

Example: the English modal *might*, but not simple past.

- (41) If Mary went to New York, she took the train. ...
  - a. ... She might have visited Times Square. (roughly, "If she went to New York, she might have visited Times Square.")
  - b. ... \*She visited Times Square. (intended reading: "If she went to New York, she visited Times Square")

Example (42a): modal subordination effects for MC *hui* "will" and (42b) for future *want*.

• Note that the judgment for (42b) is delicate.

- (42) Ruguo Lisi dique shi jin-zao qu Niuyue, ta yiding shi if Lisi indeed be this-morning go New.York 3s must be zuo zhe-tang huoche qu de. ... sit this-CL train go PART 'If it is the case that Lisi left for New York this morning, she must have left by taking this train.'
  - a. ... Ta hui wu fenzhong hou dao Niuyue.
     3s will five minute after arrive New.York
     'She will arrive in New York in five minutes.'
  - b. ... Ta ?(yinggai) xianzai jiu kuai yao dao Niuyue le. 3s should now PRT soon want arrive New.York LE 'She is going to arrive in New York soon. / She should be arriving in New York soon.'

#### BP and D lack this effect.

- Klecha: the absence of modal subordination is not evidence that the item is not modal; an example is English *must*.
- (43) Tim: There might be blood in there.

  Ezra: \*He must be the killer. (intended reading: 'If there is blood in there, he must be the killer.') (Klecha, 2015:378)

### 5.1.3 Further modal meanings

MC & D: future want can have further modal meanings.

- This variety in uses is a hallmark of modals (Kratzer 1991)
- For a similar argument on a modal analysis of *will*, see Giannakidou & Mari 2018

### (i) Teleological/deontic and circumstantial uses of yao

(44) Qiangxie yao cunfang hao.
firearm want store good
'Firearms need to be stored well.' (if one wishes to avoid accidents, in line with regulations, ...)
[teleological, deontic]

(45) Dongtian guoqu, xueren zongshi yao ronghua de.
winter pass snowman always want melt PRT
'When winter ends, it is necessary that snowmen melt.'
[circumstantial]

### (ii) A habitual use of willen

- The particles wel eens 'now and then' or geregeld 'regularly' help bring out a meaning of repetitiveness.
- See also Barbiers (1995), Rooryck (2017)
- (46) Jan wil {wel eens/ geregeld} helpen. Jan wants WEL sometimes/ regularly help.INF i. 'John wants to help.' ii. 'John tends to help.'
- (47) Ziekenhuiskosten willen wel eens uit de hand lopen. hospital.costs want WEL sometimes out the hand walk 'Hospital costs tend to spin out of control.'

### 5.2 Semantic variation

So far:

- Indications for modal semantics in future want.
- In line with proposals that link modality with future semantics (see Bochnak 2019 for overview).

This section: possible aspectual component in BP

• Highlighting how tricky certain semantic distinctions are.

#### 5.2.1 An 'ongoingness requirement' in BP

- While BP *querer* is felicitous in context 1, it isn't in context 2.
- No restriction in MC (49b) and D (49c) .
- (48) a. Context 1: We see that the wall has cracks, which might be indicative of an imminent collapse.
  - b. Context 2: The workmen have started hitting the wall, which will presumably collapse in the near future but has not yet shown signs of collapsing.

- (49) a. Esse muro está querendo cair.
  this wall is wanting fall
  'This wall is about to fall.'
  OK in context 1: not OK in context 2
  - b. Qiang kuai yao dao le. wall soon want collapse LE OK in context 1 & 2
  - Deze muur wil nog wel omvallen.
     this wall wants yet WEL collapse
     'This wall will likely collapse.'
     OK in context 1 & 2.

Restriction involves the relation between the utterance time and the start time of the event.

- Is *querer* an aspect marker *instead of* a modal?
  - Modality and aspect are not mutually exclusive (Bochnak 2019; Copley 2009, among many others).
  - For some aspect markers, modality might be an inherent part of their denotation.
  - Classic example: English progressive (Dowty 1977; Portner 1998; Copley 2009, etc.).

If It's possible that BP *querer* is a combination of modality + aspect.

- Difficult to distinguish from a 'pure' modal, given the modal diagnostics they are both expected to pass them.
- · Suggestions are welcome!

### 5.3 Summary

- Indications for modal semantics in BP, MC and D.
- Aspectual analysis plausible for BP.

## 6 Discussion and conclusion

In all three languages, *want* is ambiguous between a desire and a future meaning. The newer future *want* 

- · aligns syntactically with root modals;
- shows indications of modal semantics.

These observations fit in with previous analyses on grammaticalization (Lightfoot 1979; Roberts & Roussou 2003; Hacquard & Cournane 2016).

What is less clear, is how much variation there is, and where it comes from:

- 1. The BP aspectual component that neither MC nor D has. Some possible hypotheses:
  - BP want has grammaticalized more recently.
  - Differences between what future-expressing elements already exist in BP, MC and D.
- 2. Desire *want* changing into a future-denoting expression/a deontic modal (Bybee et al. 1994).

Finally, we have shown how research on diachronic change can be informed by investigating languages in which both desire and future readings are still available.

 Especially when dealing with subtle syntactic and semantic distinctions.

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