

# Clause Structure and Utterance Meaning: Word Order, Particles, Emphasis

*Josef Bayer & Andreas Trotzke*

## 1. Introduction

Our research project aims at the development of an explicit syntactic account of illocutionary meaning, i.e. the meaning of utterances. Discourse particles as they are found in German, but also in weakly related languages such as Bangla, play a central role in the formation of utterance meaning. They turn basic sentence types such as questions into more fine-grained types such as rhetorical questions, surprise questions, disapproval questions etc.

Certain options of word order, sometimes in combination with discourse particles, yield an emphatic character (also called ‘mirativity’) that is typical for the expressive side of utterances and often endows them with an exclamative flavor. Cross-linguistic evidence offers good reasons to assume that (at least certain forms of) emphatic marking is ‘hard-wired’ in grammar, and that it must be distinguished from information structure.

In this talk, we will first turn to word order variation that involves the clausal left periphery. We will identify a root clause phenomenon (‘Emphatic Topicalization’, ET) that, according to our claim, underlies diverse cross-linguistic data that have so far not been integrated into a unified account of the syntax-pragmatics interface. Having introduced word order variation as one option to trigger emphatic interpretations of utterances, we will then turn to the distribution of German discourse particles in the left periphery of the clause. We will propose a derivational approach to left peripheral particles that analyzes ‘Small Particle Phrases’ as internally complex ‘emphatic markers’ that turn the utterance into an exclamative version of the respective speech act.

## 2. Word order and emphasis

### 2.1 Standard German

As noted early in the literature (e.g. Jacobs 1991: 8), the category that undergoes movement to the left periphery of the German clause may be smaller than the focus (1) or larger than the focus without a grammatical need for pied-piping (2a), and sometimes it coincides with the focus (2b).

- (1) *Was hat er gemacht?*  
‘What has he done?’  
*Ein BUCH hat er gelesen.*  
a book has he read
- (2) a. *Was hat er gelesen?*  
What did he read?  
*Ein BUCH gelesen hat er.*  
a book read has he  
b. *Ein BUCH hat er gelesen.*

Concerning cases like (1), where only a subpart of the focus is fronted, it is noted in the literature that

“Native speakers sometimes characterize SFF [subpart-of-focus-]constructions **as being more ‘emphatic’** than their narrow focus counterparts, but this emphasis affects the predicate as a whole and never the fronted part of the predicate alone.” (Fanselow and Lenertová 2011: 179, n. 15)

At the level of information structure, fronting only a subpart of the focus is equivalent to fronting the whole focal constituent, as in (3):

- (3) *Was hat er gemacht?*  
 ‘What has he done?’  
*Ein BUCH gelesen hat er.*  
 a book read has he

However, as mentioned above, fronting only a part of the focus adds another interpretive dimension (‘being more emphatic’) that is built on information structure but does not relate to information structure in any obvious sense. Additional evidence comes from cases where we are even forced to assume that the movement in SFF-constructions is triggered by pragmatic factors other than information structure. Given certain pragmatic conditions, verb particles can be moved to the left periphery.

- (4) a. *auf-machen* (‘open,’ lit. ‘open-make’) (Fanselow 2003: 32)  
 [AUF]<sub>i</sub> hat er die Tür t<sub>i</sub> gemacht (und nicht zu)  
 open has he the door made (and not shut)  
 ‘He has opened the door.’  
 b. *vor-haben* (‘intend,’ lit. ‘before-make’)  
 [VOR]<sub>i</sub> haben wir das schon t<sub>i</sub> gehabt  
 before have we that well had  
 ‘We had intended that.’

While *aufmachen* has a compositional interpretation, *vorhaben* is non-compositional, since *vor* makes no identifiable semantic contribution to the particle-verb combination. It is difficult to accept that a ‘meaningless’ element can be interpreted as focus or topic. In a similar vein, we observe that parts of idiomatic phrases can be moved to the left periphery, too (for discussion, cf. Trotzke 2010).

- (5) *den Löffel abgeben*  
 (‘to die,’ lit. ‘the spoon pass’)  
 [Den Löffel]<sub>i</sub> hat er t<sub>i</sub> abgegeben.  
 the spoon has he passed  
 ‘He died.’

Given these observations, we claim that these constructions display a pragmatic interpretation that must be distinguished from information structure, and we refer to the notion of emphasis to account for their interpretation. We assume that the notion of ‘emphasis’ is related to ‘mirativity,’ a kind of evidentiality marking by which an utterance is marked as conveying information that is new or unexpected to the speaker (Aikhenvald 2004; DeLancey 1997).

This is corroborated by the fact that these configurations seem to be constrained at the level of illocutionary force, since they can only occur in main (‘root’) clauses, as shown by (6).

- (6) a. \**Maria ist sicher, [ein BUCH]<sub>i</sub> hat er t<sub>i</sub> gelesen.*  
         Maria is sure a book has he read  
     b. *Maria ist sicher, er hat ein BUCH gelesen.*

Note that structures where only focal interpretation is expressed are fine (6b). Accordingly, the observed restrictions we claim for (6a) cannot be explained by referring to information structure. Given this restriction to the Force domain of the matrix clause, a phenomenon that may fruitfully fall in this line of reasoning is the fact that topicalization inside the DP domain as shown in (7) is infelicitous when the DP is not located in the Force domain of the clause.

- (7) a. *Ich habe [den Zug nach Duisburg] genommen.*  
         I have the train to Duisburg taken  
         ‘I took the train to Duisburg.’  
     b. ?*Ich habe [nach DUISBURG den Zug] genommen.*  
     c. *[Nach DUISBURG den Zug] habe ich genommen.*

We conclude that there are certain word order variations in the left periphery of the German clause that must be distinguished from information structure and are only licit as root constructions. This finds a reasonable explanation when we analyze them as instances of a syntactic operation that has first been proposed to account for certain patterns in Bavarian syntax: *Emphatic Topicalization (ET)*.

## 2.2 Cross-linguistic evidence

### Bavarian

In Bavarian, a fronted XP in an embedded clause can be interpreted either as a topic (8a) or as a focus (8b).

Bayer (1984; 2001: 20)

- (8) a. A: *Wo's hom-s g'sagt, wia-s an Xaver wieder g'seng hom?*  
         ‘What did they say when they saw Xaver again?’  
         B: *[[ An Xaver]<sub>i</sub>, wia-s t<sub>i</sub> g'seng hom]<sub>i</sub> hom-sa-se recht g'freit t<sub>i</sub>*  
             the Xaver as-they seen have have-they-REFL really rejoiced  
         ‘As for Xaver, when they saw him they were really happy.’  
     b. A: *Wos fir-a Notn host gmoant dass-st kriegst?*  
         ‘Which grade did you think you would get?’  
         B: *[[ An Oanser]<sub>i</sub>, dass-e t<sub>i</sub> krieg]<sub>i</sub> how-e g'moant t<sub>i</sub>*  
             a one that-I get have-I thought  
         ‘Grade one I thought I would get.’

It is reasonable to assume that both topicality and focality are already checked in the middle field of the Bavarian clause, cf. (8b'). This parallels what we saw in (6) above.

- (8b') A: *Wos fir-a Notn host gmoant dass-st kriegst?*  
         B: *I hob g'moant, dass-e an OANSER krieg.*

We therefore conclude that movement to SpecCP of the matrix clause as in (8a,b) is not triggered by information structure but serves to make emphatic statements. Since this movement type, which we call ‘*Emphatic Topicalization*’ (ET, cf. Bayer 2001), is only licensed in root contexts (9), we claim that it is actually movement to SpecForceP (10).

Bayer (2001: 16-17)

- (9) a. *Da Xavier dass an Mantl kafft hot hot neamad glaubt.*  
 the Xavier that a coat bought has has nobody believed  
 'As for Xavier, nobody believed that he bought a coat.'  
 b. *An Mantl dass da Xavier kafft hot hot neamad glaubt.*  
 c. \**Neamad hot glaubt, da Xavier dass an Mantl kafft hot.*  
 d. \**Neamad hot glaubt, an Mantl dass da Xavier kafft hot.*
- (10) [<sub>FocP</sub> [<sub>CP</sub> An Mantl [<sub>C</sub> dass [<sub>TP</sub> da Xavier t<sub>i</sub> kafft hot]]], [<sub>FocP</sub> hot [... [<sub>IP</sub> neamad glaubt t]]]]

## Bangla

In Bangla, we observe a comparable phenomenon. Movement to the left of the complementizer *je* leads to an emphatic construction that is only licit in root contexts (11).

Bayer and Dasgupta (2013: 16)

- (11) a. \**chele-Ta Ekhono Sone-ni* [[ *or baba*]<sub>i</sub> *je t<sub>i</sub> aS-b-en*]  
 boy-CL yet hear-NEG/PAST his father JE come-FUT-3  
 b. [[*or baba*]<sub>i</sub> *je t<sub>i</sub> aS-b-en*]<sub>i</sub> *chele-Ta ta Ekhono Sone-ni* t<sub>i</sub>  
 his father JE come-FUT-3 boy-CL this yet hear-NEG/PAST  
 'That his father will come, this the boy hasn't heard yet.'

## Sicilian

Cruschina (2010, 2011) distinguishes between cases of postverbal focus ('neutral focus', <sub>N</sub>Foc) such as (12a) and cases of focal movement to the left periphery which he calls 'emphatic focus' (<sub>E</sub>Foc).

Cruschina (2011: 58)

- (12) A: *Chi scrivisti?*  
 'What did you write?'  
 B: a. *Scrissi n'articulu.* [-emp] [declarative]  
 write.PAST.1S an article  
 b. *N'articulu scrissi!* [+emp] [exclamative]  
 an article write.PAST.1S  
 'I wrote an article.'

Importantly, and in accordance with data discussed above, movement to Spec-<sub>E</sub>FocP is restricted to the left periphery of the matrix clause:

Cruschina (2011: 74-75)

- (13) *Chi dicisti ca s' accattà Maria?*  
 'What did you say that Maria bought?'  
 a. *Na machina dissi ca s' accattà*  
 a car said-1SG that REFL bought  
 'I said she bought a car.'  
 b. \**Dissi ca na machina s' accattà*

Concerning these constructions, Cruschina (2011: 119) claims that "mirativity defines a specific type of exclamatives, namely, exclamative sentences expressing surprise and unexpectedness, and not exclamatives in general, [...] Mirative Fronting is trig-

gered by a speaker-related mirative operator.” It is therefore reasonable to assume that these cases can be analyzed as operations of ET.

## Latin

Danckaert (2012) distinguishes between two types of fronting elements to the left of a subordinating conjunction (‘Left Edge Fronting’, LEF). Focusing on adverbial clauses (ACs), he claims that relative and demonstrative pronouns are exclusively found in a LEF position in clause-initial ACs (LEF1, (14)) and distinguishes these constructions from XP-fronting in both initial and final ACs (LEF2, (15)).

Danckaert (2012: 240)

- (14) a. [*Eum*<sub>i</sub> *cum* *t*<sub>i</sub> *uidero*]<sub>i</sub> *Arpinum* *pergam*.  
           him.ACC when I.will.have.seen Arpinum I.will.proceed  
           ‘When I have seen him, I’ll move on to Arpinum.’  
       b. \**Arpinum* *pergam* [*eum*<sub>i</sub> *cum* *t*<sub>i</sub> *uidero*].

Danckaert (2012: 331)

- (15) *Conloqui* *uidebamus* [[ *in Tusculano*]<sub>i</sub> *cum* *t*<sub>i</sub> *essem*].  
       talk.together.INF we.seemed.IMPF in Tusculan.ABL when I.was.SUBJ  
       ‘It seemed as if we were discussing, when I was in the Tusculan estate.’

Like Bayer (2001), Danckaert (2012) argues for an analysis in terms of clausal pied-piping to explain the left-right asymmetry in the Latin topicalization examples of the type LEF1 (for discussion of the parallels, cf. Trotzke 2012). Accordingly, the restrictions on word order observed by Danckaert are another case of ET, that is, of a syntactic operation that is not due to information structure and only licensed in root constructions.

## 3. Discourse Particles and Emphasis

### 3.1 Emphatic markers in a cross-linguistic perspective

However, word order variation is not the only option to trigger emphatic interpretation of utterances. Cross-linguistically, we observe several syntactic objects that serve as ‘emphatic markers’ merged in the course of the derivation.

Carrilho (2007: 10)

- (16) *Ele* *o* *nosso* *governo* *não* *protege* *nada* *a* *agricultura*.  
       EXPL the our government NEG protects nothing the agriculture

Carrilho argues that merging of the expletive *ele* results in an ‘emphatic expression’ because *ele* reinforces the assertive value of the utterance, as paraphrased in (17).

- (17) {*De facto, realmente, é verdade que*} *o* *nosso* *governo* *não* *protege* *nada* *a* *agricultura*.

This concurs with findings by Torrence (2013) who observes a number of ‘emphasis’ marking particles in Wolof. These particles are heads and have a fixed position in the clause structure. They scope over the whole clause and attract the clause to their specifier. As in the case of European Portuguese shown in (16), the particle *kaay* ‘emphasizes’ the assertive value of the utterance.

Torrence (2013: 85)

- (18) [Gis-na-a xaj b-i]<sub>i</sub> kaay t<sub>i</sub>  
 see-FIN-1SG dog CL-DEF.PROX KAAAY  
 'I DID see the dog.'

In what follows, we want to argue that the 'Small Particle Phrase' (SPrtP), as identified by Bayer and Obenauer (2011), can be analyzed as an internally complex emphatic marker that is derived in a separate derivational workspace to serve as an atomic element in the derivation of the clausal structure (cf. Trotzke and Zwart in press for the notion of such generalized transformations in the context of linguistic minimalism).

### 3.2 Discourse particles and emphasis: The Small PrtP

#### 3.2.1 *Small PrtPs*

It is generally observed that, unlike adverbs, discourse particles like German *denn* (lit. 'then') or *bloß* (lit. 'only') are immobile. This follows if the particles are heads that are rooted in the functional structure of the clause as suggested in (19). Notice that Prt is in the scope of Force/Fin because the choice of Prt depends on major categories of Force.

- (19) [<sub>ForceP/FinP</sub> Force°/Fin° [<sub>(TopP)</sub> ... [**Prt**° [(AdvP\*) [<sub>VP/vP</sub> ...]]]]]

An important qualification must be added to the claim that particles are syntactically immobile: various particles can appear as a co-constituent of a *wh*-element, and in this case they move along with the *wh*-element to the left periphery of the clause.

Bayer and Obenauer (2011: 471)

- (20) [Warum bloß] ist ein Rauschenberg so teuer?  
 why Prt is a Rauschenberg so expensive  
 'Why on earth is a Rauschenberg so expensive?'

Given the V2 constraint in German, the *wh*-phrase and Prt must form a single constituent (Small PrtP, 'SPrtP').

Additional evidence from constituency and sluicing:

- (21) A: Irgendeiner hat leider das Geld gestohlen.  
 Someone has unfortunately the money stolen  
 B: Aber [wer bloß]?  
 But who BLOSS  
 \*B': Aber [wer] leider?  
 But who unfortunately

Notice that focus particles convey the same story (cf. Bayer 1996).

- (22) a. [Nur einer] hat gelacht.  
 only one has laughed  
 'Only one person laughed.'  
 b. [Einer nur] hat gelacht.

(Independent arguments in favor of particles as syncategorematic heads in Cable 2010.)

Note, however, that not only discourse particles but also certain other elements can function as a co-constituent of a *wh*-phrase in the left periphery of the clause; cf., for instance, quantifying elements such as *genau* ('exactly').

(23) [*Warum genau*] *ist ein Rauschenberg so teuer?*

In contrast to *genau* in (23) and as shown in (19), particle heads must be base-generated and fixed in a pre-VP/*v*P position where they can take scope over the verbal projection. However, in the literature it is claimed that, in the context of multiple questions, discourse particles can also appear together with a *wh*-element that stays in situ.

(Reis 1992: 485)

(24) [*Wer schon*] *hätte damals [wen schon] fürchterlich ernstgenommen?*  
 who.NOM Prt had then who.ACC Prt tremendously seriously-taken

To account for the apparent mobility of the particle (i.e. it can appear (i) in situ, (ii) in a pre-VP/*v*P position, and (iii) in SpecCP), we propose an analysis in terms of successive-cyclic movement. In particular, in analogy to *wh*-movement, the left edge of VP/*v*P is targeted in exactly the same way as the left edge of CP. That is, just as standard approaches postulating a silent C-head, the feature of a silent Prt-head is valued when SPrtP moves into its specifier.

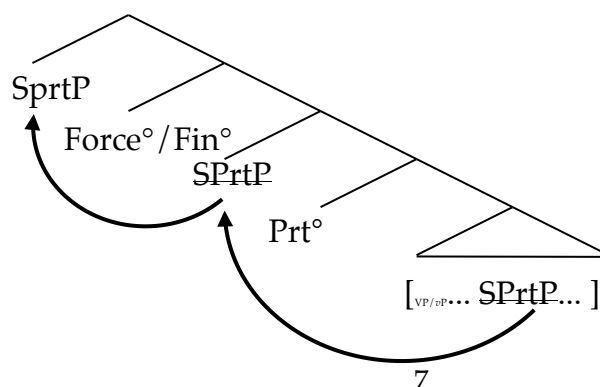
### 3.2.2 Successive-cyclic 'SPrtP-movement'

We therefore claim that the complex *wh*-phrase enriched by merger of particles is derived in a separate workspace and then merged into the unfolding V-projection, after which successive-cyclic movement of SPrtP, analogous to *wh*-movement, applies.

That derivations can be layered need not be stipulated. It seems to be a feature of each grammatical component. In other words, "[t]he process of insertion is [...] not sensitive to the nature of the representation it connects, nor to whether the host node is a terminal or not" (Ackema and Neeleman 2004: 130). Hence there is no reason to believe that this cyclic organization of the derivation should stop at the arbitrary boundary of 'words.'

Both the particle and the *wh*-element are operators that must be licensed in a scope position. Accordingly, in addition to serving as an argument, SPrtP must raise to a position where Prt can take scope and 'freeze,' and, as a final step, SPrtP must raise to a position where the *wh*-element can be licensed.

(25)



Various reconstruction effects show that SPrtP must move through pre-VP/*v*P PrtP before it moves on to the checking destination of the *wh*-element. Therefore, particles have taken scope long before they make a physical appearance in Spec-CP. It occurs in Spec-CP only as a consequence of *wh* pied-piping. The left edge of VP/*v*P is targeted in the same way as the left edge of CP. In analogy with a silent C-head, the feature of a silent Prt-head is valued when SPrtP moves into its specifier.

### 3.2.3 SPrtPs and emphasis

We claim that leftward movement of the *wh*-phrase around the particle is triggered by a feature of emphasis. This explains why SPrtP is incompatible with ‘Surprise-Disapproval Questions’ as the *wh*-item in these cases lacks semantic alternatives and ergo focus.

- (26) a. *Wie siehst du denn aus?!*  
           how look you DENN out  
           ‘You look strange/weird/...’  
       b. \* [Wie denn] siehst du aus?!
- (27) a. *Was lachst du denn so dumm?!*  
           what laugh you DENN so stupidly  
           ‘Why do you laugh so stupidly?’  
       b. \* [Was denn] lachst du so dumm?!

#### Derivation Small PrtP

- (28) a.  $\text{Prt}^\circ_{u\text{Emp} [\ ]} \text{ wh}_{i\text{Emp} [\ ]} \Rightarrow \text{Move } wh$   
       b.  $[\text{wh}_{i\text{Emp} [7]} [\text{Prt}^\circ_{u\text{Emp} [7]} \text{ wh}_{i\text{Emp} [7]}]]$

This shows, again, that emphasis operates on the level of Force. In other words, emphasis modifies utterances on the level of illocutionary force by turning them into an exclamative version of the respective speech act. Crucially, as in the case of simplex emphatic markers (cf. section 3.2.1 above), as soon as the SPrtP is merged in an exclamative utterance that receives an ‘emphatic’ interpretation anyway, the utterance becomes infelicitous.

## 4. Conclusions

- (i) Starting from the notion of emphasis, we could show that it can be expressed by means of word order options or even a designated vocabulary. As such, it is undeniably part of syntax.
- (ii) Emphasis in this sense is a property of the root clause because it is obviously dependent on the illocutionary force that is restricted to the actual utterance. In the utterance, emphasis provides a particular exclamative flavor that modifies the basic sentence type.
- (iii) In German, discourse particles are sentence-type dependent and could be shown to allow syntactic options (as seen in Small Particle Phrases) which build on the expressive potential of the particles, extending it to emphatic readings.
- (iv) From a theoretical point of view, the multi-layered derivational framework integrates Small Particle Phrases in a natural way if particles enter computations in full analogy to other functional heads. The account of particles in the [wh+Prt]-construction parallels the standard account of *wh*-movement.



## References

- Ackema, Peter, and Ad Neeleman. 2004. *Beyond Morphology: Interface Conditions on Word Formation*. Oxford: Oxford University Press.
- Aikhenvald, Alexandra. 2004. *Evidentiality*. Oxford: Oxford University Press.
- Bayer, Josef. 1984. Comp in Bavarian syntax. *The Linguistic Review* 3, 209-274.
- Bayer, Josef. 1996. *Directionality and Logical Form*. Dordrecht: Kluwer.
- Bayer, Josef. 2001. Asymmetry in emphatic topicalization. In Caroline Féry and Wolfgang Sternefeld (eds.), *Audiatur Vox Sapientiae*, 15-47. Berlin: Akademie Verlag.
- Bayer, Josef, and Hans-Georg Obenauer. 2011. Discourse particles, clause structure, and question types. *The Linguistic Review* 28, 449-491.
- Bayer, Josef, and Probal Dasgupta. subm. Emphatic Topicalization and the structure of the left periphery: Evidence from German and Bangla. Ms., University of Konstanz and Indian Statistical Institute Kolkata.
- Cable, Seth. 2010. *The Grammar of Q: Q-Particles, Wh-Movement, and Pied-Piping*. Oxford: Oxford University Press.
- Carrilho, Ernestina. 2008. Beyond doubling: Overt expletives in European Portuguese dialects. In Sjef Barbiers, Olaf Koenenman, Marika Lekakou, and Margreet van der Ham (eds.), *Microvariation in Syntactic Doubling*, 301-323. Bingley: Emerald.
- Cruschina, Silvio. 2010. Fronting as focalisation in Sicilian. In Roberta D'Alessandro, Adam Ledgeway, and Ian Roberts (eds.), *Syntactic Variation: The Dialects of Italy*, 247-260. Cambridge: Cambridge University Press.
- Cruschina, Silvio. 2011. *Discourse-Related Features and Functional Projections*. Oxford: Oxford University Press.
- Danckaert, Lieven. 2012. *Latin Embedded Clauses: The Left Periphery*. Amsterdam and Philadelphia: Benjamins.
- DeLancey, Scott. 1997. Mirativity: The grammatical marking of unexpected information. *Linguistic Typology* 1, 33-52.
- Fanselow, Gisbert. 2003. Surprising specifiers and cyclic spellout. *Generative Linguistics in Poland* 5, 29-46.
- Fanselow, Gisbert, and Denisa Lenertová. 2011. Left peripheral focus: Mismatches between syntax and information structure. *Natural Language & Linguistic Theory* 29, 169-209.
- Jacobs, Joachim. 1991. Focus ambiguities. *Journal of Semantics* 8, 1-36.
- Reis, Marga. 1992. The category of invariant *alles* in *wh*-clauses: On syntactic quantifiers vs. quantifying particles in German. In Rosemarie Tracy (ed.), *Who Climbs the Grammar-tree*, 465-492. Tübingen: Niemeyer.
- Torrence, Harold. 2013. *The Clause Structure of Wolof: Insights into the Left Periphery*. Amsterdam and Philadelphia: Benjamins.
- Trotzke, Andreas. 2010. Rethinking syntactocentrism: Lessons from recent generative approaches to pragmatic properties of left-periphery-movement in German. Dissertation, University of Freiburg.
- Trotzke, Andreas. 2012. Review of Lieven Danckaert, *Latin Embedded Clauses: The Left Periphery*. Amsterdam: Benjamins. *The LINGUIST List* 23.4367.
- Trotzke, Andreas, and Jan-Wouter Zwart. in press. The complexity of narrow syntax: Minimalism, representational economy, and simplest Merge. In Frederick J. Newmeyer and Laurel B. Preston (eds.), *Measuring Linguistic Complexity*. Oxford: Oxford University Press.