Radically Truncated Clauses in Hungarian and Beyond:

Evidence for the Fine Structure of the Minimal VP*

It has proved difficult to determine the shape and headedness of the minimal VP, owing to the fact that much or even all of the material originating in it routinely moves out of it in the course of the derivation of a clause. In this paper, novel data from Hungarian will be offered to present a clause type radically pared down to the minimal VP, making it possible to observe the VP by itself. The syntax of such radically truncated clauses (RTCs) will show that the Hungarian VP is, in fact, head-final. I will also claim that RTCs in Hungarian provide prima facie evidence against the universality of head-complement branching order (Kayne 1994), and strong support to the conception of OV as a basic, non-derived word order (Haider 2000). Finally, I will show that RTC data lend further support to the adjunction analysis of both topicalization (Lasnik and Saito 1992) and quantification (Fox 1995, Reinhart 1995, Chomsky 1995).

Keywords: headedness, word order, minimal VP, Hungarian, syntax

1. Radically truncated clauses: the main facts

Radically truncated clauses (RTCs) are used in informal spoken registers (everyday speech) and informal written registers (such as blogs or discussion forums). RTCs typically describe a succession of sub-events (or a single subevent) within a well-defined containing event or

*[Acknowledgements.

]

situation.

(1) *[Namármost amikor én alud-t-am ott, úgy kezd-t-em, hogy]*
well when I slept-PST-1SG there so start-PST-1SG that
'So when I was sleeping there, the way I started was
szemét le-visz, szoba rendbe-rak, fürdőszoba el-pakol...[1]
rubbish PRT[2]-carry room PRT-put bathroom PRT-pack
I took out the rubbish, I cleared the room, I cleared the bathroom.'

Importantly, this succession of RTCs is not a syntax-free to-do-list: in fact, RTCs have a much stricter syntax than real to-do-lists. To-do-lists in Hungarian typically involve an infinitival construction with relatively free word order, with objects obligatorily carrying accusative case and with the objects optionally having the definite article:

(2) a. *(a) szemet-et le-vin-ni*
the rubbish-ACC PRT-carry-INF
b. *le-vin-ni a szemet-et*
PRT-carry-INF the rubbish-ACC
'to take out the rubbish'

As opposed to this, the radically truncated clauses are subject to a number of constraints. First of all, RTCs lack all phi-feature agreement (subject agreement as well as object agreement) and they also lack all tense, aspect and mood features. RTCs also lack infinitival suffixation. Because in Hungarian, the present tense suffix and (in the case of an indefinite object) the 3SG subject

1 Note that all the grammatical examples in the paper are actually attested utterances (web examples).

2 Verb modifiers express the result state or location of the theme argument. There are two kinds of verb modifiers: verbal particles (such as *le* 'down' above), and bare adjectival phrases or noun phrases (such as *rendbe* 'into order' above.). For convenience, I will use the term verbal particles and the gloss PRT, but all the claims and statements in the paper are valid for the broader family of verb modifiers as well.

agreement suffix are phonologically null, the verb form in RTCs often coincides with a present 3SG verb form, however, there are two compelling pieces of evidence that in RTCs, no subject agreement is present. In many cases, it is clear from the context that the subject is 1SG or 1PL (see (1) above), or 2SG or 2PL. Also, there is a set of verbs in Hungarian where the 3SG.INDEF subject agreement suffix is overt (so-called *-ik* verbs) and here, it is always the *-ik*-less form that emerges in RTCs:

(3) a. *sör* *meg-isz*
beer PRT-drink

b. **sör* *meg-isz-ik*
beer PRT-drink-3SG.INDEF
'I/you/she/he/we/you-pl/they drink/drank a beer.'

b. **sör* *meg-isz-sza*
beer PRT-drink-3SG.DEF
'I/you/she/he/we/you-pl/they drink/drank the beer.'

In RTCs, the object is obligatorily in the morphologically unmarked case form (a form otherwise reserved for nominative subjects and possessors), which is highly unusual since objects in Hungarian obligatorily carry accusative case:

(4) a. **sör-t* *meg-isz*
beer-ACC PRT-drink

b. *sör* *meg-isz*
beer PRT-drink
'I/you/she/etc. drink/drank the/a beer.

The word order in neutral full sentences in Hungarian is V-initial:

(5) *Be-kapcsol-t-a* *János* *a* *tévé-t.*
PRT-switch-PAST-3SG.DEF John the television-ACC

'John switched on the television.'

As opposed to this, in RTCs, the word order is strictly O PRT V:

(6) a. **be-kapcsol tévé, *ki-nyit sör*

PRT-switch television PRT-open beer

b. *tévé be-kapcsol, sör ki-nyit*

television PRT-switch beer PRT-open

'I/you/she/etc. switch(ed) on the/a TV and open(ed) the/a beer.'

In RTCs, unlike in to-do-lists (see (2) above), the object cannot have a definite article (even when it denotes a contextually salient, unique entity) or an indefinite article:

(7) a. *(*a) kád ki-mos, (*a) padló fel-mos*

the bathtub PRT-wash the floor PRT-wash

'(I/you/she/he/we/you-pl/they) clean(ed) the tub and mop(ped) the floor.'

*b. (*egy) sör be-dob, (*egy) pizza meg-esz*

a beer PRT-throw a pizza PRT-eat

Importantly, the object is a nominal phrase (not a mere N), it can be a NumP, a PossP, a QP or even a CP (see (38) below):

(8) *az üvegajtón lévő és eddig nem használt sötétítőfüggöny be-húz*

the glassdoor.on being and so.far not used shading.curtainPRT-draw

'I/you/etc. open(ed) the shading curtain which is on the glass door and has not been used so far.'

(9) *két sör meg-isz*

two beer[3] PRT-drink

'(I/you/she/he/we/you-pl/they) drink/drank two biers.'

(10) *hajam meg-szárít*

3 In Hungarian, nouns premodified by a numeral appear in the singular.

hair-POSS.1SG PRT-dry

'(I/you/she/he/we/you-pl/they) dry/dried my hair.'

(11) *minden maradék rá-hajint*

every leftover PRT-throw

'I/you/she/etc. throw/threw all the leftovers on it.'

The object can be in the plural:

(12) *ablak-ok be-csuk*

window-PL PRT-close

'I/you/she/etc. closed/closed the windows.'

In RTCs, no subject is allowed in transitive or unergative sentences (12), however, the subject is allowed in unaccusatives (13):

(13) a. *(*én) tévé be-kapcsol*

I television PRT-switch

'I switch(ed) on the television.'

b. *(*én) fut*

I run

'I start/started.'

(14) *én át-öltöz*[4]

I PRT-dress

'I change(d). (meaning: I change(d) my clothes).'

Importantly, RTCs are not cases of incorporation (true or pseudo) (Mithun 1984, Massam 2001,

4 The unaccusative status of *átöltöz* 'lit. over-dress, meaning: change clothes' is evidenced by the following: 1) the presence of a verb modifier, 2) the fact that *átöltöz* can appear in an adjectival participle expressing anteriority (*az át-öltöz-ött fiú* the PRT-dress-PART boy 'the boy who changed clothes' and 3) the fact that it can appear in predicative adverbial participle phrases (*a fiú át van öltöz-ve* the boy PRT be.3SG dress-PART 'the boy has changed clothes (lit. the boy is in a state of having changed clothes)'. (Cf. É. Kiss 2002, 223-229)

Farkas and De Swart 2003, Borik and Gehrke 2015). The objects of RTCs can be arbitrarily complex: heavily modified NPs (8), QPs (10), NumPs (9,12), DPs (39) or even CPs (38). Verb-adjacency is not required: the object can be topicalized, heavy-right-shift is possible, and indirect objects typically intervene between the object and the verb (see Section 5 and 7). The objects are not number-neutral (9,12). There is no requirement of name-worthiness or conceptual unity:

(15) *borotvahab* *elő-vesz*
shaving.foam PRT-take
'I/you/she/etc. take/took out the shaving foam.'

Note also that the known cases of incorporation in Hungarian (Farkas and De Swart 2003) are very different from RTCs. First, incorporated objects are obligatorily accusative-marked:

(16) a. *Újságot* *olvas-t-ak* *a* *lány-ok.*
newspaper-ACC read-PAST-3PL the girl-PL
b. **Újság* *olvas-t-ak* *a* *lány-ok.*
newspaper read-PAST-3PL the girl-PL
'The girls read a/some newspapers. (The girls were engaged in newspaper-reading.)

Also, incorporated objects and PRTs are in complementary distribution.

(17) a. *Újságot* *olvas-t-ak* *a* *lány-ok.*
newspaper-ACC read-PAST-3PL the girl-PL
b. **Újságot* *el-olvas-t-ak* *a* *lány-ok.*
newspaper-ACC PRT-read-PAST-3PL the girl-PL
'The girls read a/some newspapers. (The girls were engaged in newspaper-reading.)

This is in stark contrast with RTCs, where the objects cannot have accusative case marking and PRTs are typical.

2. A note on pragmatics

While the construction is productive, it is restricted pragmatically to describing a subevent (or succession of subevents) within a well-defined containing event/situation. This containing situation can either be contextually given or spelled out explicitly (such as in (1) above). Since an RTC is underspecified in terms of tense, mood, phi-features etc., these are inferred from the hearer from contextual knowledge: in (1), the hearer infers based on the first half of the sentence that the event denoted by the RTC refers to an event in the past and involves a 1SG actor (the speaker) as the external argument. Without a containing situation, out of the blue, RTCs are infelicitous since there is now way to infer the missing person/number/tense etc. information from the context:

(19) a. *#Képzeld, szemét le-visz, szoba el-pakol.*
imagine:IMP:2SG rubbish-NOM PRT-carry room-NOM PRT-pack
'Imagine, I/you/she/etc. take/took out the rubbish, clear(ed) the room.'

b. *Képzeld, a szemet-et le-vit-té-k,*
imagine:IMP:2SG the rubbish-ACC PRT-carry-PAST-2PL
a szobá-t el-pakol-tá-k.
the room-ACC PRT-pack-PAST-2PL
'Imagine, they took out the rubbish, they cleared the room.'

Furthermore, RTCs are overwhelmingly telic (in my web-based sample, 1.844 RTCs out of 1.920 are telic, ~96%): since RTCs typically describe a quick succession of non-overlapping subevents, it is natural that atelic predicates are generally infelicitious, since by their unboundedness, they would violate the condition on non-overlapping. This means that, with the exception of inherently telic verbs (which are all derived via the denominal/deadjectival verbalizer *-ít*), the presence of a telicizing PRT is quasi-obligatory in RTCs:

(20) a. *könyv el-olvas*

book-NOM PRT-read

'I/you/etc. read the book. (the entire book, telic)'

b. #*könyv olvas*

book-NOM read

*'I/you/etc. read the book (not necessarily the entire book, atelic)'

c. *lazackocka pirít*

salmon.cube-NOM fry

'I/you/etc. fry/fried the salmon cubes.'

RTCs are unspecified for illocutionary force: they can be interpreted as declarative (see above) or imperative[5]:

(21) *Pofa be-fog!*

jaw PRT-keep

'Shut up! (lit. Keep your jaw closed!)'

3. Background: the VP in Hungarian

In my analysis, I will adhere to some fairly uncontroversial assumptions regarding Hungarian sentence structure. As far as vP and the inflectional domain is concerned, I assume the following structure (cf. Bartos 1999, den Dikken 1999, É. Kiss 2002 etc.):

(22) [$_{AgrSP}$ [$_{AgrOP}$ [$_{MoodP}$ [$_{TenseP}$ [$_{ModP}$ [$_{vP}$ external arg. [$_{VP}$ internal arg. [$_{V'}$ V PRT]]]]]]]

Following Bartos, I assume that the heads are joined to V via an operation called morphosyntactic merge, and the surface order of the suffixes is the mirror image of the morphosyntactic order (Baker 1985). Following É. Kiss (2006), I assume that PRTs are phrasal

5 Since in Hungarian, interrogatives generally only differ in intonation from declaratives, the fact that RDCs can be used in interrogatives as well is trivial.

and are base-generated as complements of V (but nothing hinges on this particular choice, see Section 7).

For the higher functional projections, I follow É. Kiss (2006) (see also Marácz 1989, Brody 1995, Olsvay 2006, Puskás 2000, Surányi 2003,2006b for different proposals):

(23) $[_{CP}\ [_{TP}\ [_{NegP}\ [_{FocP}\ [_{NegP}\ [_{PredP}\ [_{vP}\ [_{VP}\ ..]]]]]]]]$

I further assume that even in neutral sentences, the verb obligatorily moves to $Pred^0$ and the verbal particle moves to Spec,PredP (É. Kiss 2006, see also Koopman and Szabolcsi 2000, Olsvay 2002, Csirmaz 2006, Surányi 2009a). The word order of the postverbal elements is free.

(24) $[_{PredP}$ meg $[_{Pred'}$ ette $[_{vP}$ Péter $[_{v'}$ ~~ette~~ $[_{VP}$ a levest $[_{V'}$ ~~ette~~ ~~meg~~]]]]]]

Meg-ette *Péter* *a* *leves-t.*

PRT-eat:PAST:3SG Peter the soup-ACC

Meg-ette *a* *leves-t* *Péter.*

PRT-eat:PAST:3SG the soup-ACC Peter

'Peter ate the soup.'

The internal structure of the Hungarian VP (vP) has been long debated (Marácz 1989, Brody 1995, É. Kiss 2002, Bene 2005, Surányi 2006). While the different behaviour of unergative and unaccusative verbs and anaphora facts seem to support a hierarchical VP, other observations concerning binding principle C violations, weak crossover and the free post-verbal word order point to a flat VP. É. Kiss (2008) proposed a unified account, which assumes that as the verb moves to $Pred^0$, the vP is flattened: that is, at one stage of the derivation, the vP is hierarchical, but in later stages, it is flat.

Intriguingly, however, in full sentences, we can never directly observe the word order associated with the hierarchical vP, since it never emerges to the surface (the vP always flattens). We can only indirectly infer the structure based on certain tests and phenomena such as the unergative/unaccusative dichotomy and anaphora. Crucially, these tests only tell us about c-

command relations but not the head-final or head-inital status (unless taken in conjunction with a strict interpretation of antisymmetry, Kayne 1994).

4. The core analysis

My claim is that in RTCs, what we see is this elusive creature: the Hungarian VP before V-movement, emerging to the surface intact. That is, RTCs are simple VPs, lacking every functional projection above VP with the possible exception of NegP. This analysis naturally explains the lack of phi-feature agreement, tense (or infinitive marking), mood, modality and higher functional projections (such as focus).

The lack of accusative case marking on the object and the fact that external arguments (the subjects of transitives and unergatives) cannot be realized is due to the lack of a vP layer: in the absence of v, accusative case cannot be assigned, and the lack of the Spec,vP position means that no external arguments can be base-generated (Bowers 1993, Chomsky 1995, Kratzer 1996). Because of the lack of accusative case assignment, the object emerges in the nominative (with no overt case marking). This dovetails with cross-linguistic proposals on the nominative as 'caseless' (Bittner and Hale 1996), the 'default case' (Schütze 2001) or 'no case at all' (Kornfilt and Preminger 2015) and also with Matushansky's (2012) observation that in small clauses in Hungarian, Finnish and Estonian, the case of a predicate nominal depends on the complexity of the clause, with nominative in the least complex clauses, and dative, translative or sublative on more complex clauses.

The strict word order of these deficient clauses is further evidence that the VP (prior to V moving out) is indeed hierarchical underlyingly. However, in contrast to earlier proposals, the word order of this minimal VP is strictly head-final: O PRT V. The most straightforward way to derive this is to assume the following structure:

(25) *sör* *meg* *isz*

[$_{VP}$ internal arg. [$_{V'}$ PRT V]]

beer PRT drink

'I/you/etc. drink/drank the beer.'

The internal argument is generated in SpecVP (as standardly assumed for themes: note that RTCs are typically telic, as discussed above in (20), i.e., they have a theme internal argument); and the PRT is a complement to the left of V. The alternative would be to assume a [$_{VP}$ O [$_{V'}$ V PRT]] structure and derive the O PRT V surface order of RTCs by stipulating a set of movements (either the movement of the elements of VP out of VP or the remnant movement of VP itsef).[6] Note, however, that in RTCs, the lack of structure above VP means that there are no structural positions that these hypothetical movements could target. Also, we will see below that while the object may be topicalized, there is evidence that PRT and V never leave the VP. Thus, RTCs in Hungarian seem to provide prima facie evidence against the assumption that all complements are to the right of the respective head (Kayne 1994). If one subscribes to the Universal Base Hypothesis (Bach 1968), then the facts from Hungarian RTCs (where the O PRT V order is clearly not derived by movement) suggest that the underlying universal word order is, in fact, OV. (For a detailed argument for the universality of OV, cf. Haider 1992,2000.)

5. Operations targeting RTCs

In a database compiled through extensive web search (containing 1.920 tokens of RTCs), in more than 70% of RTCs, we find the pure O PRT V sequence. Nevertheless, certain (X) O (X) PRT V sequences are attested and are judged as grammatical by speakers. Importantly, the O > PRT > V order is never violated. In this section, we consider the possibility of topicalization

6 Cf. e.g. Zwart (1993, 1997) and Koster (1994) for the former and Hinterhölzl (1997) and Haegeman (2000) for the latter.

and the availabililty of higher functional projections, namely FocP and NegP. (We have seen earlier that PredP, vP and the lower morphosyntactic sequence of projections are not projected.)

5.1 Topicalization as adjunction: possible

Topicalization is a fairly flexible operation in Hungarian: Topics can be left-adjoined to PredP, FocP and NegP, and there is no principled reason why topics could not be adjoined to a pure VP. One standard test of the topic-predicate boundary in Hungarian involves manner adverbs (cf. É. Kiss 2002). Most manner adverbs such as *óvatosan* 'carefully' can be left-adjoined to PredP or VP but crucially not to a topic. (Other manner adverbs such as *gyorsan* 'quickly' can also be adjoined to topics under certain pragmatic conditions.) Interestingly, *óvatosan* 'carefully' is attested in two possible positions:

(26) a. [$_{VP}$ *óvatosan* [$_{VP}$ *ajtó* *ki-nyit*]]
carefully door PRT-open
'I/you/she/etc. open/opened the door carefully.'

b. [$_{VP}$ *ajtó* [$_{VP}$ *óvatosan* [$_{VP}$ ~~*ajtó*~~ *ki-nyit*]]]
door carefully door PRT-open
'The door, I/you/she/etc. open/opened carefully.'

Since *óvatosan* 'carefully' can be left-adjoined to VP but not to a topic, we can conclude that the object must be in situ in VP in (26a), and it has been topicalized in (26b). Thus, RTCs are minimally VPs, but the topicalization of the object is possible. Crucially, in Hungarian, topics are always left-adjoined and topicalization does not induce verb movement: this means that the topicalization of the object leaves the O PRT V order intact (it moves that leftmost element O further to the left, and since the V stays within VP, the VP does not flatten). The availability of topicalization accounts for O X PRT V sentences such as:

(27) [VP *telefon* [VP *ebben a pillanatban* [VP ~~*telefon*~~ *le-tesz*]]]

phone this.in the moment.in phone PRT-put

'I/you/etc. put the phone down in this very moment.'

The PP *ebben a pillanatban* 'in this moment' is adjoined to the VP, and the NP *telefon* is topicalized (for the adjunction analysis of adverbials in the Hungarian sentence, see É. Kiss 2010a). Naturally, the object can also remain in situ, which results in X O PRT V sequences:

(28) [VP *egy ablakkal arrébb* [VP *csekk befizet*]]

one window.with further bill PRT-pay

'I/you/etc. pay/paid the bill at the next window.'

5.2 Focussing: not possible

The two hallmarks of the identificational focus construction in Hungarian[7] are the inversion of the verb and the verbal particle and a special intonation contour (whereby the focused element receives heavy stress and all the elements which follow the focused element are obligatorily destressed).

(29) *JÁNOS hívta meg Marit.*

John invite-PAST.3SG PRT Mary-ACC

'It was John who invited Mary.'

Importantly, however, PRT-V inversion is only obligatory in tensed clauses, in tenseless clauses (such as infinitives or participles), it is optional (Brody 1995). Since RTCs are tenseless, the fact that the O V PRT order is unattested does not, in itself, rule out the focus construction. However, in radically defective clauses, both O and PRT V are obligatorily stressed (PRT V forms a single phonological word), which rules out focus (since after a focused O, PRT V would

7 See Horváth 1986, Szabolcsi 1981, Kenesei 1986, Brody 1995, É. Kiss 1998, Horváth 2004, É. Kiss 2010b among others.

be destressed):

(30) a. *'ajtó 'be-csuk*

door PRT-close

'I/you/etc. close/closed the door.'

b. **AJTÓ be-csuk*

door PRT-close

'Intended: It is the door that I/you/etc. close/closed.'

5.3 Negation: marginally available?

Negation is only very marginally attested in RTCs (22 cases out of altogether 1.920, ~1%). All attestations are O Neg PRT V:

(31) a. *telefon nem fel-vesz*

phone not PRT-pick

'I/you/etc. do/did not pick up the phone.'

Descriptively speaking, clausal negation in finite clauses in Hungarian involves the inversion of the PRT and V:

(32) a. *Meg-látogatja János Mari-t.*

PRT-visits John Mary-ACC

'John visits Mary.'

b. *Nem látogatja meg János Mari-t.*

not visits PRT John Mary-ACC

'John does not visit Mary.'

Neg and V are immediately adjacent and form a single phonological word. There is one exception to this: a focused element can intervene between Neg and V. (33) illustrates the possible configurations involving negation and focus:

(33) a. *JÁNOS látogatja meg Mari-t.*

John visits PRT Mary-ACC

'It is John that visits Mary.'

b. *Nem JÁNOS látogatja meg Mari-t.*

not John visits PRT Mary-ACC

'It is not John that visits Mary.'

c. *JÁNOS nem látogatja meg Mari-t.*

John not visits PRT Mary-ACC

'It is John that does not visit Mary.'

d. *Nem JÁNOS nem látogatja meg Mari-t.*

not John not visits PRT Mary-ACC

'It is not John that does not visit Mary.'

Similarly to negation, focusing also involves PRT-V inversion. Importantly, the focus and the verb (or the focus and the negated verb) also have to form a single phonological word (Kenesei 1994:330). This means that Neg and V always form a single phonological word (Neg+V or Neg+Foc+V).

Various models have been proposed to account for the facts above. Puskás (2000) and Olsvay (2000) assumed that negation involves a NegP which subsumes TP. The negation particle is base-generated in Neg^0, Spec,NegP is filled by an empty operator, and the verb is adjoined to Neg^0 to form a complex head. In the case of focusing above negation, this complex head moves further to Foc^0. Surányi (2002) pointed out problematic aspects of this account and instead, proposed that the locus of both focusing and negation is a projection dubbed ZP, which, in the case of focusing and negation both being present, has two specifiers, one of them housing the focused element and the other the negation particle. (For cases such as 33d above, Surányi (2002) argues that the higher negation is an instance of metalinguistic negation.). As an

alternative to this, several authors have proposed that there are two NegPs in Hungarian (Szendrői (1998), Olsvay (1998, 2000a,2006) and É.Kiss (2002.)). É. Kiss (2008, 2009) argues, following Olsvay (2000), that in non-neutral sentences (i.e., sentences with focus or clausal negation), PredP is subsumed by a projection (called Non-Neutral Phrase or NNP) the function of which is to type-shift the PredP so that it can serve as an input to negation or focussing (in essence, this type change turns PredP from a predicate into an argument of a predicate. V inversion happens because of the obligatory movement of V into NN^0:

(34) $[_{NegP}$ Neg $[_{NNP}$ $[_{NN'}$ V $[_{PredP}$ PRT $[_{Pred'}$ ~~V~~ ….]]]]]

All these proposals involve a movement of the verb induced by negation, either into the head of NegP or to the head of NNP, and this movement results in the verb ending up forming a single phonological verb with the negation particle (as Neg+V or Neg+Foc+V). One crucial difference is that while most proposals assume that NegP or ZP directly subsumes the extended verbal projection (TP/AspP/PredP), É. Kiss (2008,2009) claims that PredP in itself cannot be a complement of Neg^0 or Foc^0.

With these preliminaries in mind, we have three issues to account for in terms of negated RTCs: 1) the rarity of negated RTCs, 2) the lack of PRT-V inversion and 3) the strict O Neg PRT V word order.

The lack of inversion is, in fact, not that surprising: note that while negation obligatorily triggers PRT-V inversion in tensed clauses in Hungarian, it is well-known that the inversion is only optional (and in fact marked) in tenseless clauses such as infinitives or participles (Brody 1995):

(35) a. *Hiba volt nem meg-hív-ni Marit.*
mistake was not PRT-invite-INF Mary-ACC

b. *?Hiba volt nem hív-ni meg Marit.*
mistake was not invite-INF PRT Mary-ACC

'It was a mistake not to invite Mary.'

In terms of the rarity of negation, recall that our general observation with regard to RTCs is the overall lack of dedicated functional projections above VP. Specifically, the focus projection is completely unattested in RTCs: given the otherwise very close structural similarity of focus and negation in the Hungarian sentence, one might in fact expect that if one of them is unavailable, then the other is unavailable too. Note that Surányi's (2002) proposal, where focus and negation are housed in the specifiers of the same projection would actually predict this. As far as those proposals are concerned where NegP directly subsumes PredP/AspP/TP, there is in principle no reason why a NegP could not directly subsume VP (in the absence of PredP/AspP/TP). One possible explanation as to why negation is very marginally available whereas focusing is completely unattested is that while focusing always requires merge and move (since the focused material has to be fronted), negation in non-finite clauses is possible without movement.

The final riddle is the strict O Neg PRT V word order. Under our assumptions, NegP subsumes VP: [$_{NegP}$ Neg [$_{VP}$ O PRT V]]. This means that the expected word order in topicless RTCs would be Neg O PRT V. This is, however, unattested. Below, I will consider two possible explanations as to why only O Neg PRT V is attested.

If one looks at all the 22 cases of negated RTCs attested in the database, it is striking that in all of them, the object is a specific NP having an existential presupposition. Note that specific NPs in Hungarian are not allowed within the scope of negation. Because of this, an NP underspecified for definiteness might easily be interpreted as non-specific if it is within the scope of negation, as would be the case with the [$_{NegP}$ Neg [$_{VP}$ O PRT V]] configuration. This means that a specific reading can only be ensured by extraction from under the scope of negation, i.e. by topicalization: [$_{TopP}$ O [$_{NegP}$ Neg [$_{VP}$ ~~Θ~~ PRT V]], resulting in the linearization O Neg PRT V.

An alternative explanation can also be formulated based on independently attested

phonological properties of the negation particle and the verb. Note that in all configurations in non-truncated sentences, the negation particle and the verb form a single phonological word (Neg+V or Neg+Foc+V in the finite cases, and Neg+PRT+V in the non-finite cases). This phonological constraint is satisfied trivially in overt syntax by negation-induced verb movement in finite clauses. In non-finite clauses, NegP subsumes PredP/AspP/TP directly, meaning that Neg is adjacent to the PRT which directly precedes V (since PRT is in SpecPredP and V is in $Pred^0$). PRT and V are known to form a single phonological verb when PRT immediately precedes V, thus Neg+PRT+V form a single phonological word in non-finite clauses.

In RTCs, however, this linear adjacency requirement cannot be satisfied in overt syntax. First, there is no negation-induced verb movement: this is also the case for non-finite clauses; and second, there is no movement of PRT to Spec,PredP (or Spec,AspP or Spec,TP depending on one's theory) and of V to $Pred^0$ (or Asp^0 or T^0): this is unique to RTCs. As a result, the phonological requirement of linear adjacency between Neg and (PRT+)V is not satisfied in visible syntax. The only way to remedy this is by linearizing Neg at PF immediately to the left of PRT+V. (Such phonologically motivated operations at PF have been stipulated in Hungarian for various phenomena, such as the D-deletion rule proposed by Szabolcsi (1992) or the reordering of the elements in the postverbal field according to their phonological weight proposed by É. Kiss (2008). Note also that this proposed phonological requirement concerning Neg and V can be thought of as a natural extension of the well-established similar requirement concerning Foc and V originally proposed by Kenesei (1994), see above.)

Where these two alternative analyses make different predictions is whether the Neg O PRT V word order is available with non-specific objects such as *néhány szoba* 'some rooms':

(36) *?nem néhány szoba ki-takarít*
not some room PRT-clean
'I/you/etc. do/did not clean some rooms.'

However, since negation as such is only very marginally available (~1%), this particular prediction is difficult to test straightforwardly.

5.4 O PRT V X

Some vanishingly rare instances of material to the right of V are attested (42 cases out of 1.920, ~2%), however, these are principled exceptions and they do not violate the head-finality of VP. They are either due to right-adjunction of free adjuncts and adverbials (something which Hungarian generally allows, see É. Kiss 2010), or to heavy CP shift:

(37) [VP [VP *gyógyszer* *ki-vált*] [PP *teljes* *ár-on*]]
medicine PRT-redeem complete price-on
'I/you/etc. buy/bought the medicine at full price.'

(38) [VP *kávézóban* [VP [CP ~~*merre vannak a koalák*~~] *meg-kérdez*] [CP *merre* *vannak* *a* *koalák*]
café.in where are the coalas PRT-ask where
are the coalas
'I/you/etc. ask/asked in the café where the coalas are.'

6 Lack of definite article

As we have seen above in (6), the objects of RTCs cannot have a definite article, even in cases where a contextually salient, unique entity is being referred to. However, proper names (standardly analyzed as DPs) are admitted:

(39) *anya* *fel-öltöz,* *Malacka* *le-vetkőz*
mother PRT-dress Piglet PRT-undress
'Mother gets/got dressed, Piglet undresses/undressed.'

PossPs, which are obligatorily definite in Hungarian (e.g. they obligatorily trigger definite

agreement within the DOM system of Hungarian) are also admitted in RTCs (10). The fact that the objects of RTCs are often topicalized (6.1) also suggests that they can be interpreted as definites even if they lack a definite article. Note that the lack of AgrOP (the projection responsible for object agreement on the verb) does not explain the unavailability of the definite article, as infinitives also lack AgrOP but can readily have an object with a definite article:

(40) *a gázszerelő-t fel-hív-ni*
the gas.fitter-ACC PRT-call-INF
'call the gas fitter (as an element on a to-do-list, literally: 'to call the gas fitter')

This constraint may be of a pragmatic nature: it could be the case that the defective clause lacks any frame of reference of its own, so definiteness is not specified within the defective clause itself but it is inferred later on from the context (much as tense, phi-features etc. are inferred from the context). But the very low availability of definite articles in RTCs (8 out of 1.920, <1%) suggests that the constraint may be syntactic. Note also that definite articles appear to be allowed within adverbial adjunct PPs (27) and also within an object CP (38). One possibility is that this constraint is connected to the lack of case assignment. Another possibility is that this phenomenon is related to the proposal that V selects NPs (not DPs), and D is merged later on in the derivation, outside VP (Sportiche 2005).

7. RTCs and the theories of verbal modification in Hungarian

The syntactic status, base-generated position, and movement options of PRTs in Hungarian have been the subject of considerable discussion in the literature (for recent overviews, see Hegedűs 2013 and Hegedűs to appear). For ease of exposition, so far I have assumed the analysis of É. Kiss (2006): PRTs are taken to be base-generated as phrasal complements of V^0 (they are AdvPs which consist of a single head in the case of verbal particles), and are moved in neutral sentences to Spec,PredP (and the verb is moved to $Pred^0$). But nothing really hinges on

this choice.

É. Kiss (2006) is, in fact, a representative of a more broader family models, each of which share the following assumptions: the PRT is base-generated as a phrasal complement of V^0, and it is moved in neutral sentences to the specifier of a functional projection (PredP/AspP/TP depending on the proposal) which subsumes VP (followed by a movement of V into the head position of said projection). Despite their otherwise considerable differences, the proposals of Piñón (1995), É. Kiss (2002), Alberti (2004), Den Dikken (2004), Csirmaz (2004), Csirmaz (2006) and Surányi (2009a) all share these assumptions, and as consequence, the analysis proposed in this paper carries over to them seamlessly.

In addition to the PRT-as-phrasal-complement-of-V^0 analysis, there is another school of thought which assumes a tighter connection between PRT and V^0. The most radical execution of this idea is to assume that the verbal particle and the verb constitute a complex lexical entry (Ackerman 1984, Ackerman 1987, Ackerman and Webelhuth 1998). Other authors proposed that PRT and V constitute a complex head base-generated in syntax: Horváth (1986) and Brody (1990) assumed that PRTs are phrases adjoined to V^0, creating a complex V head, while É. Kiss (1999b) and Szendrői (2003) assume that PRTs are heads adjoined to (in effect, incorporated into) a V head. Olsvay (2004) assumes that PRTs have a dual nature of sorts: they can either be phrasal complements to V^0 or heads incorporated to V^0. Crucially for our purposes, however, many of these proposals (Brody 1990, É. Kiss 1999, Olsvay 2004) also assume that in neutral sentences, PRT is moved to a higher position outside of vP. This means that our proposal (that PRT and V are trapped inside VP in the case of RTCs because of a lack of higher functional projections to move to; and that, as a result of this, RTCs reflect the original, pre-movement structure of the minimal VP) can be straightforwardly implemented in these frameworks as well.

In the lexicalist approach (Ackerman 1984, Ackerman 1987, Ackerman and Webelhuth 1998), no movement of PRT is assumed in neutral sentences, and, crucially, it is assumed that

[PRT+V] is inserted into syntax as complex lexical unit. As consequence, the strict PRT V word order observed in RTCs would fall out trivially from these models. (Note, however, that the lexicalist approach as a whole has been cogently argued to be inadequate for various reasons by many authors, see e.g. Hegedűs 2003, 18-21 for a discussion.)

Uniquely among the non-lexicalist models, Horváth (1986) and Szendrői (2003) assume no PRT or V movement in neutral sentences. Also, both authors assume that PRT is base generated to the left of V. Adding the trivial assumption that direct objects are in a specifier position, these models would also predict the O PRT V word order observed in RTCs. Note, however, that the assumption of a non-phrasal PRT has been convincingly argued to be problematic for independent reasons by various authors (see e.g. É. Kiss (2006, 44-47), Surányi (2009a, 209-212), and also that the near-consensus in the literature is that the PRT and the V *are* moved even in neutral sentences (see discussion above).

Before concluding this section, I will review two proposals in more detail. Surányi (2009a) argues that in neutral sentences, a phrasal PRT moves to Spec,TP through an intermediate landing position. Based on arguments from the taxonomy of PRTs, Surányi (2009a) claims that this intermediate position, identified as the specifier of a PredP projection[8], is below vP and above VP. Note that above, I have argued that RTCs lack the functional projections above VP (including vP, FocP, AspP etc.). While I wish to remain agnostic as to whether the intermediate landing position for PRTs as proposed by Surányi (2009a) exists in general, I would like to point out that if it indeed exists, it apparently is not projected in RTCs. Note that if this projection were available in RTCs, then the obligatory movement of PRT to Spec,PredP and of V to $Pred^0$ would produce a PRT V O surface word order, which is completely unattested with RTCs.

Hegedűs (2013) argues that, in line with their predicative nature, PRTs are in fact

8 Note that this is different from É. Kiss's (2006) proposal, where PredP is situated above vP and where Spec,PredP is the final landing slot for VM in neutral sentences.

subsumed under a small clause complement of V, together with the internal argument: [$_{VP}$ [$_{V'}$ V [$_{SC}$ … int.arg… PRT …] (see also Hegedűs and Dékány 2017). In Hegedűs (to appear), the SC is instantiated as pP with where the internal argument is base-generated in Spec,pP and PRT is merged under p: [$_{VP}$ [$_{V'}$ V [$_{pP}$ internal arg. [$_{p'}$ p PathP]]]]. PathP is taken to house regular directional PPs, which may cooccur with a PRT (in what has been dubbed 'locative doubling', cf. Surányi 2009b) but may also occur on their own. Note that the word order of RTCs falls out from this structure as well, as long as one assumes that the pP complement is to the left of V:

(41) *sör* *meg* *isz*

[$_{VP}$ [$_{V'}$ [$_{pP}$ internal arg. [$_{p'}$ p PathP]] V]]

beer PRT drink

'I/you/etc. drink/drank the beer.'

RTCs where a PRT and a directional or locative adverbial cooccur (in a locative doubling configuration) have an O PP PRT V word order, which indicates that the pP itself is head-final (in line with FOFC, Biberauer, Holmberg and Roberts 2014):

(42) *kulcs* *zár-ba* *be* *tesz*

[$_{VP}$ [$_{V'}$ [$_{pP}$ internal arg. [$_{p'}$ PathP p]] V]]

key lock-into PRT put

'I/you/etc. put/put the key into the lock.'

RTCs containing a dative-marked recipient can receive a similar analysis:

(43) *fél kiflivég* *gyerek-nek* *oda* *ad*

[$_{VP}$ [$_{V'}$ [$_{pP}$ internal arg. [$_{p'}$ PathP p]] V]]

half croissant.tip child-DAT PRT give

'I/you/etc. give/gave a bit of croissant to the/a child.'

8. Similar constructions in other languages

The non-finite construction in German known in the literature as the 'Inflektiv' (Teuber 1998, Schlobinski 2001, Bücking and Rau 2013, Gärtner 2017) is in some ways similar to the RTC in Hungarian: it exhibits a lack of inflection, strict O VM V order (which is not surprising for German) and a lack of overt subject.

(44) *meinen satz direkt wieder streich* (Bücking and Rau 2013, 72)
my-ACC sentence directly again cancel
'I am cancelling my sentence again on purpose.'

However, there are significant differences too. The use of the Inflektiv is more limited: it is used only in web-based electronic written communication and comics. In the Inflektiv, the silent subject can only be interpreted as 1SG/1PL, the tense as the immediate present, and the illocutionary force is taken to be performative. The object can have a definite article and it carries accusative case. Subject drop happens across the board: subjects of unaccusatives are compulsorily dropped too (unlike what we saw in Hungarian in (13) versus (14)). Tentatively, obligatory accusative case assignment suggests that the Inflektiv has a vP layer. (Note that the lack of overt subject cannot be attributed to a lack of vP as unaccusative subjects are also silent, but rather, it appears to be the result of a more general subject-drop rule.) Note that Bücking and Rau (2013) analyse the Inflektiv as a VP without a vP layer: however, such an analysis predicts that objects in the Inflektiv do not receive accusative case (contrary to fact).

Truncated clauses that are not bare VPs are well-known from the theoretical and acquisition literature. Haegeman (2003, 2010) analyzes adverbial clauses as lacking ForceP, FocP and TopP: crucially, however, these clauses are considerably less truncated than RTCs since they retain TP (IP) and vP. Cechetto (to appear) discusses so-called 'internal argument drop' sentences in Romance: root clauses that are specified for force yet appear to lack a vP layer.

In child language studies, truncated matrix clauses which lack either agreement or tense

(or indeed both) and where the verb emerges in either infinitival or bare form have been widely reported and discussed under the name of root infinitives (or optional infinitives) (Rizzi 1993, Wexler 1998, Guasti and Rizzi 2002). Note that RTCs are more radically truncated than root infinitives: the verb obligatorily emerges in the bare form, and tense, agreement and also vP are obligatorily missing.

9. Conclusion: Implications for Hungarian and cross-linguistically

The examination of RTCs allowed us to directly observe the Hungarian VP, which is otherwise obscured even in the simplest of non-defective clauses due to the obligatory movement of V out of VP. RTCs provide solid evidence that the VP in Hungarian is, in fact, head-final. Note that there are several known surface phenomena in Hungarian which are typical of SOV languages: the lexical layer of the NP is head-final, the PP is head-final, the possessor precedes the possessum, participial relatives precede the nominal that they modify, manner adverbs precede the verb, predicative nominals precede the copula, VMs precede the verb (cf. É. Kiss 2013 for a detailed discussion). However, the broad consensus in the literature has been that the Hungarian VP is head-initial and these phenomena are either fossils from an earlier head-final stage in the history of Hungarian or they can be derived without assuming a head-final VP. The fact that the Hungarian VP is a head-final may make some of these phenomena worth revisiting.[9]

From a more general perspective, as discussed above, RTCs in Hungarian provide prima facie evidence against the universality of head-complement branching order (Kayne 1994), and strong support to the conception of OV as a basic, non-derived word order (Haider 2000).

9 The languages most closely related to Hungarian, Khanty and Mansi, are SOV. É. Kiss (2003) has argued that Proto-Hungarian was also SOV. I claim that Modern Hungarian, too, is in essence SOV, even if this quality is masked in non-truncated clauses due to the obligatory movement of V out of vP.

We have seen above that whereas the focus position is absolutely unavailable in RTCs, topicalization can happen freely. This is in line with the analysis of topicalization as adjunction (Lasnik and Saito 1992, see also the studies in É. Kiss 1995): while in RTCs, the functional projections above VP such as TenseP, FocP etc. are missing (with the possible exception of NegP), topicalization via adjunction is possible. Similarly, the fact that QPs are attested in RTCs (see (10) above) favours the analysis of Quantifier Raising as adjunction (Fox 1995, Reinhart 1995, Chomsky 1995, É. Kiss 2010a): the alternative analysis of QR in terms of movement to the specifiers of designated functional projections (Beghelli and Stowell 1997, Szabolcsi 1997) would require that such functional projections (DistP, RefP) be available in RTCs. However, as we have seen, RTCs typically lack functional projections above VP.

Cross-linguistically, a further implication is that RTCs may prove to be worthy of attention in the exploration of the fine structure of VP in other languages as well. RTCs are most easily identifiable in languages which have all or some of the following characteristics: rich inflectional morphology, an articulated left periphery, overt accusative case marking (and overt definite articles).

References:

Ackerman, Farrel 1984. *Verb modifiers as argument taking predicates: complex verbs as predicate complexes in Hungarian*. Groninger Arbeiten zur Germanistischen Linguistik 25, 23-71.

Ackerman, Farrell. 1987. Pronominal Incorporation: The Case of Prefixal Adverbs. In István Kenesei (ed.) *Approaches to Hungarian 2*. JATE, Szeged. 213-260.

Ackerman, Farrell and Gert Webelhuth. 1998. *A Theory of Predicates.* CSLI Publications, Stanford.

Alberti, Gábor. 2004. Climbing for aspect: with no rucksack. In Katalin É. Kiss and Henk C. van Riemsdijk (eds.) *Verb Clusters: A Study of Hungarian, German, and Dutch.* John Benjamins, Amsterdam. 253-290.

Baker, Mark. 1985. The mirror principle and morphosyntactic explanation. *Linguistic Inquiry* 16: 373–415.

Bartos, Huba. 1999. *Morfoszintaxis és interpretáció: a magyar inflexiós jelenségek szintaktikai háttere* [Morphosyntax and Interpretation: on the Syntax of Inflectional Phenomena in Hungarian] PhD dissertation. Eötvös Loránd University, Budapest.

Beghelli, Filippo and Tim Stowell. 1997. Distributivity and negation: the syntax of each and every. In Anna Szabolcsi (ed.) *Ways of Scope Taking*. Dordrecht: Kluwer. 71–108.

Bene, Annamária. 2005. *Az igék bennható/tranzitív/mediális felosztásának morfoszintaktikai következményei* [Unaccusatives, transitives and middles: A morphosyntactic account]. PhD dissertation. Eötvös Loránd University, Budapest.

Biberauer, Theresa, Anders Holmberg and Ian Roberts. 2014. A syntactic universal and its consequences. *Linguistic Inquiry* 45: 169-225.

Bittner, Maria and Ken Hale. 1996. The structural determination of Case and Agreement. *Linguistic Inquiry* 27:1–68.

Bowers, John. 1993. The syntax of predication. *Linguistic Inquiry* 24: 591–656.

Borik, Olga and Berit Gehrke (eds.). 2015. *The syntax and semantics of pseudo-incorporation.* Brill.

Brody, Michael. 1990. Remarks on the order of elements in the Hungarian Focus field. In István Kenesei (ed.) *Approaches to Hungarian 3*. JATE, Szeged. 95-122.

Brody, Michael. 1995. Focus and checking theory. In Kenesei, István (ed.) *Approaches to Hungarian 5*. JATE, Szeged. 29–44.

Bücking, Sebastian and Jennifer Rau. 2013. German non-inflectional constructions as separate performatives. In Daniel Gutzmann and Hans-Martin Gärtner (eds.): *Expressives and Beyond. Explorations in Use-Conditional Meaning*. Leiden, Brill. 59-94.

Cecchetto, Carlo. to appear. *The Root Where It Should Not Be: On Internal Argument Drop Sentences in Italian.* Ms.

Chomsky, Noam. 1995. *The Minimalist Program.* Cambridge, MA: MIT Press.

Csirmaz, Anikó. 2004. Particles and Phonologically Defective Predicates. In Katalin É. Kiss and Henk C. van Riemsdijk (eds.) *Verb Clusters: A Study of Hungarian, German, and Dutch.* John Benjamins, Amsterdam. 225-252.

Csirmaz, Anikó. 2006. Aspect marking in a two-component theory of aspect. In Katalin É. Kiss (ed.) *Event Structure and the Left Periphery. Studies on Hungarian.* Dordrecht: Springer. 107-128.

Dikken, Marcel den. 1999. On the structural representation of possession and agreement: the case of (anti-)agreement in Hungarian possessed nominal phrases. *Amsterdam Studies in the Theory and History of Linguistic Science* Series 4: 137-178.

Dikken, Marcel den. 2004. Agreement and 'clause union'. In Katalin É. Kiss and Henk C. van Riemsdijk (eds.) *Verb Clusters: A Study of Hungarian, German, and Dutch.* John Benjamins, Amsterdam. 445-498.

Dékány, Éva and Veronika Hegedűs. 2015. Word order variation in Hungarian PPs. In Balázs Surányi, Katalin É. Kiss and Éva Dékány (eds.) *Approaches to Hungarian 14: papers from the 2013 Piliscsaba conference.* Amsterdam and Philadelphia: John Benjamins. 95-120.

É. Kiss, Katalin (ed.) 1995. *Discourse configurational languages.* Oxford University Press.

É. Kiss, Katalin. 1998. Identificational focus versus information focus. *Language* 74: 245–273.

É. Kiss, Katalin. 1999. Strategies of Complex Predicate Formation and the Hungarian Verbal Complex. In István Kenesei (ed.) Crossing Boundaries. John Benjamins, Amsterdam. 91-114.

É. Kiss, Katalin 2002. *The Syntax of Hungarian.* Cambridge: Cambridge University Press.

É. Kiss, Katalin. 2006. The function and the syntax of the verbal particle. In Katalin É. Kiss (ed.) *Event structure and the left periphery. Studies on Hungarian.* Dordrecht: Springer. 17-56.

É. Kiss, Katalin. 2008. Free word order, (non) configurationality and phases. *Linguistic Inquiry* 39: 441-475.

É. Kiss, Katalin. 2009. Negative quantifiers in Hungarian. In Marcel den Dikken and Robert Vago (eds.) *Approaches to Hungarian 11*. Amsterdam: John Benjamins., 65-94.

É. Kiss, Katalin. 2010a. An adjunction analysis of quantifiers and adverbials in the Hungarian sentence. *Lingua* 120: 506-526.

É. Kiss, Katalin. 2010b. Structural focus and exhaustivity. In Malte Zimmermann and Caroline Féry (eds.) *Information Structure. Theoretical, Typological and Experimental Perspectives*. Oxford-New York: Oxford University Press. 64-88.

É. Kiss, Katalin. 2013. From Proto-Hungarian SOV to Old Hungarian Top Foc V X. *Diachronica* 30: 202-231.

É. Kiss, Katalin. 2015. A negative cycle in 12th-15th-century Hungarian. In Theresa Biberauer, George Walkden (eds.) *Syntax over Time: Lexical, Morphological, and Information-Structural Interactions.* Oxford: Oxford University Press, 86-101.

Farkas, Donka and Henriëtte de Swart. 2003. *The semantics of incorporation: From argument structure to discourse transparency.* University of Chicago Press.

Fox, Danny. 1995. Economy and Scope. *Natural Language Semantic*s 3, 283-341.

Gärtner, Hans-Martin. 2017. Root infinitivals and modal particles. An interim report. In Josef Bayer and Volker Struckmeier (eds.) *Discourse Particles: formal approaches to their syntax and semantics*. De Gruyter. 115-143.

Guasti, Maria Teresa, and Luigi Rizzi. 2002. Agr and Tense as distinctive syntactic projektions: Evidence from acquisition. In Guglielmo Cinque (ed.) *The cartography of syntactic structures*. New York: Oxford University Press.

Haegeman, Liliane. 2000. Remnant movement and OV order. In Peter Svenonius (ed.) *The derivation of VO and OV*. Amsterdam: John Benjamins. 69-96.

Haider, Hubert. 1992. Branching & discharge. In Peter Coopmans, Martin Everaert and Jane Grimshaw (eds.) *Lexical Specification and Insertion*. Amsterdam and Philadelphia: John Benjamins. 135–164.

Haider, Hubert. 2000. OV is more basic than VO. In Peter Svenonius (ed.) *The derivation of VO and OV*. Amsterdam: John Benjamins. 45-67.

Hegedűs, Veronika. 2013. *Non-verbal predicates and predicate movement in Hungarian.* PhD dissertation. LOT: University of Tilburg

Hegedűs, Veronika (to appear). *P Heads in Complex Events.*

Hinterhölzl, Roland. 1997. A VO-based approach to verb raising. In Kiyomi Kusumoto (ed.) *Proceedings of the North East Linguistic Society 27*. Amherst: GLSA. 187–202.

Horvath, Julia. 1986. *FOCUS in the Theory of Grammar and the Syntax of Hungarian.* Foris, Dordrecht.

Horvath, Julia. 2004. Is 'Focus Movement' Driven by Stress? In Christopher Piñón and Péter Siptár (eds.), *Approaches to Hungarian 9*. Budapest: Akadémiai Kiadó. 131-158.

Kayne, Richard S. 1994. *The Antisymmetry of Syntax*. Linguistic Inquiry Monographs 25. MIT Press.

Kenesei, István. 1986. On the logic of Hungarian word order. In Werner Abraham and Sjaak de Meij (eds.) *Topic, focus, and configurationality.* Amsterdam: John Benjamins. 143–159.

Koopman, Hilda and Anna Szabolcsi. 2000. *Verbal Complexes*. Cambridge, Mass.: MIT Press.

Kornfilt, Jaklin and Omer Preminger (2015). Nominative as no case at all: an argument from raising-to-accusative

in Sakha. In Andrew Joseph and Esra Predolac (eds.) *Proceedings of the 9th Workshop on Altaic Formal Linguistics (WAFL9)*. Cambridge, Mass.: MIT Press. 109-120.

Koster, Jan. 1994. Predication incorporation and the word order of Dutch. In Guglielmo Cinque, Jan Koster, Jean-Yves Pollock, Luigi Rizzi and Raffaella Zanuttini (eds.) *Paths Toward Universal Grammar: Studies in Honor of Richard S. Kayne*. Washington, D.C.: Georgetown University Press. 255–276.

Kratzer, Angelika. 1996. Severing the external argument from its verb. In Johan Rooryck and Laurie Zaring (eds.) *Phrase structure and the lexicon.* Dordrecht: Kluwer. 109–137.

Lasnik, Howard, and Mamoru Saito. 1992. *Move Alpha*. MIT Press, Cambridge, Massachusetts.

Marácz, László. 1989. *Asymmetries in Hungarian.* PhD dissertation, University of Groningen.

Massam, Diane. 2001. Pseudo noun incorporation in Niuean. *Natural Language and Linguistic Theory*, 19(1), 153-197.

Matushansky, Ora. 2012. On the internal structure of case in Finno-Ugric small clauses. *Finno-Ugric Languages and Linguistics* 1: 3-43.

Mithun, Marianne. 1984. The evolution of noun incorporation. *Language* 60:4 , 847-894.

Olsvay, Csaba. 2004. The Hungarian verbal complex: An alternative approach. In Katalin É. Kiss and Henk C. van Riemsdijk (eds.) *Verb Clusters: A Study of Hungarian, German and Dutch.* Amsterdam: John Benjamins. 391-333.

Olsvay, Csaba. 2006. Negative universal quantifiers in Hungarian. *Lingua* 116: 245-271.

Piñón, Christopher. 1995. Around the Progressive in Hungarian. In István Kenesei (ed.) *Approaches to Hungarian 5.* JATE, Szeged, 153-190.

Puskás, Genovéva. 2000. *Word Order in Hungarian: The Syntax of Á-Positions.* Amsterdam: John Benjamins.

Reinhart, Tanya, 1995. *Interface Strategies*. OTS Working Papers, Utrecht.

Schlobinski, Peter (2001): *knuddel – zurückknuddel – dich ganzdollknuddel*. Inflektive und Inflektivkonstruktionen im Deutschen. *Zeitschrift für germanistische Linguistik* 29: 192–218.

Schütze, Carson T. 2001. On the nature of default case. *Syntax*, 4(3), 205-238.

Sportiche, Dominique. 2005. *Division of labor between merge and move: Strict locality of selection and apparent reconstruction paradoxes.* Ms. UCLA.

Surányi, Balázs. 2003. *Multiple operator movements in Hungarian.* PhD dissertation, University of Utrecht.

Surányi, Balázs. 2002. Negation and the negativity of n-words in Hungarian. In István Kenesei and Péter Siptár (eds.) *Approaches to Hungarian 8*. Budapest: Akadémiai Kiadó. 107-132.

Surányi, Balázs. 2006a. Scrambling in Hungarian. *Acta Linguistica Hungarica* 53: 393-432.

Surányi, Balázs. 2006b. Quantification and focus in negative concord. *Lingua* 116: 272-313.

Surányi, Balázs. 2009a. Verbal particles inside and outside vP. *Acta Linguistica Hungarica* 56: 201-249.

Surányi, Balázs. 2009b. Locative particle and adverbial incorporation at the interfaces. In Katalin É. Kiss (ed.) Adverbs and Adverbial Adjuncts at the Interfaces. Berlin – New York, Mouton de Gruyter. 39-74.

Szabolcsi, Anna. 1981. Compositionality in focus. *Folia Linguistica* 15: 141-162.

Szabolcsi, Anna. 1997. Strategies for scope taking. In Anna Szabolcsi (ed.) *Ways of Scope Taking*. Dordrecht: Kluwer. 109–154.

Szendrői, Kriszta. 2003. *A stress-based approach to the syntax of Hungarian focus.* The Linguistic Review 20, 37-78.

Teuber, Oliver. 1998. fasel schreib erwähn – Der Inflektiv als Wortform des Deutschen. *Germanistische Linguistik* 141, 7–26.

Tóth, Ildikó. 2000. *Inflected infinitives in Hungarian*. PhD dissertation, Tilburg University.

Varga, Diána. 2014. *A magyar felszólító mondatok szerkezete.* [The structure of imperatives in Hungarian.] PhD dissertation. Pázmány Péter Catholic University.

Wexler, Ken. 1998. Very early parameter setting and the unique checking constraint: A new explanation of the optional infinitive stage. *Lingua* 106: 23-79.

Zwart, Jan Wouter. 1993. *Dutch Syntax: A minimalist approach.* PhD dissertation, University of Groningen. Groningen: Grodil.

Zwart, Jan Wouter. 1997. *Morphosyntax of Verb Movement. A minimalist approach to the syntax of Dutch.* Dordrecht: Kluwer.