Similarities and differences between two Hungarian particles for also: *szintén* and *is*

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Abstract

The paper provides a comparative analysis of the syntax, semantics and pragmatics of two Hungarian particles with the same logical core meaning also: *is* and *szintén*. The analysis yields important theoretical implications since it demonstrates how two particles sharing the same logical-propositional/truth-functional core meaning can expand into two different markers. In discourse, *is* acts as an intensional/metacognitive *pragmatic marker* in the sense as proposed by Aijmer *et al.* (2006), while *szintén* functions as a coherence-signaling *discourse marker*. The two particles share certain syntactic-semantic properties: neither of them can be followed by a topic, they both have distributive meaning, and both of them can pertain to the noun phrase that they immediately follow, as well as to ordered n-tuples of noun phrases. However, there are also syntactic and pragmasemantic differences between them. Namely, their ordered n-tuples have different word orders; *is* can function as a pragmatic marker while *szintén* cannot; *szintén* can appear as a separate clause, while *is* cannot (this is presumably related to the fact that *szintén* can be stressed, while *is* is obligatorily unstressed); and finally, *szintén* can have a peculiar discourse-preserving function. We explain the syntactic differences between the two particles using the *partial spell-out* technique of minimalist generative syntacticians (first applied to Hungarian by Surányi 2009), and the Cinque-hierarchy-based approach to Hungarian sentence- and predicate-adverbials (Surányi 2008). We account for the pragmasemantic properties of the pragmatic-marker variant of *is* in the formal representational dynamic theory of interpretation called ℜeALIS, already presented in the LingBaW series (Alberti *et al.* 2016, Kleiber and Alberti 2017, Viszket *et al.* 2019).

Keywords: particles, distributive meaning, Hungarian, pragmatic and discourse markers

1. Introduction

The paper analyzes the similarities and differences between two Hungarian particles with the same lexical core meaning ALSO: *is* [ɪsh] and *szintén* [sɪnteɪn].

   Is as a particle has had a long history in Hungarian generative literature, with such seminal papers clarifying its basic properties as Brody (1990) and É. Kiss (1992, 2002). There is a lack,

however, of (widely known and accepted) research on *szintén*.[1] Since both particles share the meaning ALSO, it seems only reasonable to start the investigation of *szintén* in the light of *is*. Furthermore, their parallel comparative investigation can provide a useful contribution to the universal research into polysemic systems around multifunctional phonetic forms (Fischer 2006: 13–14), with special regards to the subtle distinction between discourse markers and pragmatic markers as proposed by Aijmer *et al.* (2006). In this terminology, a pragmatic marker is a word or expression that does not contribute to the propositional, truth-functional content of an utterance, while a discourse marker signals coherence relations. In this respect, the major theoretical implication of the parallel analysis of the two Hungarian particles is that it demonstrates a case where two particles sharing the same logical-propositional/truth-functional core meaning (ALSO) expand into two different markers: *is* into an intensional/metacognitive *pragmatic marker*, and *szintén* into a coherence-signaling *discourse marker*.

Section 2 provides an overview of the (primarily truth-functional) similarities between the two particles in question. Section 3 presents the (dominantly syntactic) differences between them. Section 4 offers their syntactic representations, including those that capture the coherence-signaling discourse-marker character of *szintén*. Section 5 is devoted to the demonstration of the pragmatic-marker function of *is*, through presenting a few types of its pragmatic use. The paper concludes with a summary of the main findings (Section 6).

2. Similarities between *is* and *szintén*

This section provides an overview of the properties of *is* that also hold true for *szintén*, to varying degrees.

2.1. The distributive nature of is and szintén

Is is a quantifier: it can neither be followed by a topic (1b), nor can it follow a narrow focus (1c), at least not within the preverbal sentence zone. [2,3]

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[1] Two separate papers have been published in Hungarian on *is* and *szintén*: Huszics (2020) and Futó (2020). The present paper integrates the results of these two studies as a basis, and it has the distinguished aim to disseminate their findings in broader international circles.

[2] The grammaticality judgments (on a six-degree scale) referred to throughout the paper are based on the – sufficiently uniform – mother-tongue intuition of the six authors. Nevertheless, there might be speaker-dependent and/or dialectal differences; these require future research using statistical methods. The following abbreviations are used in the glosses:
>   (i)   case suffixes: ACC(USATIVE), DAT(IVE), INS(TRUMENTALIS), SUP(ERESSIVE);
>   (ii)   agreement suffixes: 1SG ... 3PL; 2OBJ (the object is in the second person);
>   (iii) other suffixes on nouns: PL(URAL), ADJ(ECTIVALIZER);
>   (iv)   affixes on verbs: PREV (preverb), COND(ITIONAL), INF(INITIVALIZER).

[3] Hungarian is a discourse-configurational language with a [Top … Top Q … Q Foc] preverbal operator zone on the left periphery of sentences. The order of these topics, quantifiers and (narrow) foci in this zone corresponds to their scope hierarchy. In Hungarian, a verb is often accompanied by a preverb, immediately preceding the

(1)   a.   *Péter **is** felemelte   a   zongorát.*
            Péter   also   preV.lifted.3SG   the   piano.ACC
            'Péter also lifted the piano.'
       b.   **Péter **is**   a   zongorát   felemelte.*
            Péter   also   the   piano.ACC   preV.lifted.3SG
       c.   **Csak   a   zongorát Péter **is**   fel-emelte   / [emelte   fel].*
            only   the   piano.ACC Péter also   preV-lifted.3SG / lifted.3SG preV

Is is known to inherently have distributive meaning (É. Kiss 2002: 110). That is, (1a) means that there has to be at least one other person, apart from Péter, who lifted the piano, and also, that the sentence cannot be assigned the interpretation that 'Péter belongs to a group the members of which lifted the piano together'.[4]

As shown in (2), *szintén* is also associated with distributive meaning; that is, (2a) also means that there has to be another person besides Péter to have lifted the piano. It also holds true that, similarly to *is*, in the preverbal sentence zone a *szintén*-expression can neither be followed by a topic (2b) nor can it follow a narrow focus (2c).

(2)   a.   *Péter **szintén** felemelte   a   zongorát.*
            Péter   also   preV.lifted.3SG   the   piano.ACC
            'Péter also lifted the piano.'
       b.   **Péter **szintén** a   zongorát   felemelte.*
            Péter   also   the   piano.ACC   preV.lifted.3SG
       c.   **Csak   a   zongorát Péter **szintén** fel-emelte   / [emelte   fel].*
            only   the   piano.ACC Péter also   preV-lifted.3SG / lifted.3SG preV

2.2. More than one **is** and/or szintén *within one clause*

The second syntactic property that the two particles share is that there cannot be two (or more) *is-* or *szintén*-occurrences in the preverbal zone (3a-a'); this was pointed out by Brody (1990) in connection with *is*.

(3)   a.   **Péter **is**   a   zongorát   **is**   felemelte.*
            Péter   also   the   piano.ACC   also   preV.lifted.3SG
            Intended meaning: 'Péter also lifted the piano, too.'
       a'.   **Péter **szintén** a   zongorát   **szintén** felemelte.*
            Péter   also   the   piano.ACC   also   preV.lifted.3SG

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verb stem *by default*. Narrow focus, however, triggers a special order where the verb stem precedes the preverb. For a detailed analysis on Hungarian word order, see É. Kiss (2002).

4   *Is* might also have a collective reading but only in extremely peripheral/forced contexts such as the following progressive construction:
   (i)   *Péter is   emelte   (?)('felfelé /?*fel)   a   zongorát.*
          Péter   also   lifted.3SG   (upwards / preV_up)   the   piano.ACC
          'Péter was also taking part in lifting the piano.'
However, due to the incomplete event-structures of these constructions, it is problematic to interpret the collective/distributive difference. Potential collective readings of *is* do not form the topic of this paper.

b.   *Péter **is** felemelte   a   zongorát   **is**.*
   Péter also preV.lifted.3SG the piano.ACC also
   'Péter also lifted the piano, too.'

b'.   *Péter **szintén** felemelte   a   zongorát   *__szintén__/ˇ**is**.*
   Péter also   preV.lifted.3SG the piano.ACC also/also

c.   (?)*Péter **szintén** a   zongorát   **is**   felemelte.*[5]
   Péter also   the piano.ACC also preV.lifted.3SG
   'Péter also lifted the piano, too.'

c'.   *?*Péter **is**   a   zongorát   **szintén** felemelte.*
   Péter also the piano.ACC also   preV.lifted.3SG
   Intended meaning: 'Péter also lifted the piano, too.'

c".   *Jóska **minden** cikket   elolvasott,   és   **minden** kötelező   cikket*
   Jóska every   paper.ACC preV.read.3SG and every   obligatory paper.ACC
   *Péter   (?)**is** / *?__szintén__ elolvasott.*
   Péter also / also   preV.read.3SG
   'Jóska has read each paper, and Péter, too, has read all the obligatory papers.'

However, in contrast to fully acceptable sentences that contain a preverbal and a postverbal *is*-phrase (3b), those clauses that contain two *szintén*-expressions are unacceptable (3b'). The sentence only becomes acceptable if the second *szintén* is replaced with an *is* (3b',c). However, this does not work the other way round (3c'). A radical difference between the syntax of *szintén* and *is* is illustrated in (3c"): in contrast to *is*, *szintén* is unacceptable after a quantified expression in the pre-V zone.

2.3. The "affiliation" of **is** and **szintén**

Finally, the two particles also share the property that they can both pertain to the noun phrase that they immediately follow (4) – which they primarily do.

(4)   *Péter Julit   Marinak **is**   / **szintén** bemutatta.*
   Péter Juli.ACC Mari.DAT also / also   preV.introduced.3SG
   'Péter introduced Juli to Mari, too. [Péter introduced Juli to some people (e.g. to Ili, Kriszti and Olga), and he also introduced her to Mari.]'

3. Differences between *is* and *szintén*

In what follows, we discuss several differences between *is* and *szintén*, which will lead us to extend our scope of interest to a wide range of further areas.

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[5]   This judgment concerns the (undoubtedly less obvious) reading where the constituent *[zongorát is]* bears a special kind of stress (and interpretation) – characteristic of quantifiers in the comment/predicate zone, as described by Szeteli and Alberti (2018). That is, the same word order is unacceptable if the constituent in question is stressed as a topic-like *is*-expression. This difference suggests that the position of *szintén* is exactly after the topic zone and before the comment/predicate zone, in the sense as Szeteli and Alberti (2018) use the terms.
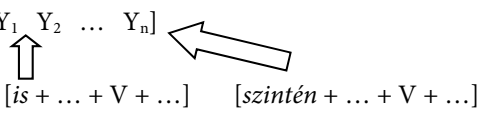
3.1. *Ordered n-tuples in the scope of 'also'*

Both *is* and *szintén* can pertain to ordered n-tuples of (nominal) constituents, but in different ways, that is, by different word order options. *Szintén* can pertain to noun phrases in a number of ways. It can pertain to the noun phrase immediately preceding it (see meaning 1 in (5)), it can pertain to two noun phrases immediately preceding it (see meaning 2 in (5)), and it can even pertain to several noun phrases in the same way (see meaning 3 in (5), for instance).

(5)   *Péter Julit   Marinak   **szintén** bemutatta.*
        Péter Juli.ACC Mari.DAT also   preV.introduced.3SG
        meaning 1:   'Péter introduced Juli to Mari, too. [Péter introduced Juli to some people (e.g. to Ili, Kriszti and Olga) and he also introduced her to Mari.]'
        meaning 2:   'Péter introduced Juli to Mari, too. [Péter introduced some people to some people (e.g. Ili to Kriszti and Lajos to Olga) and he also introduced Juli to Mari.]'
        meaning 3:   'Péter introduced Juli to Mari, too. [Some people introduced some people to some people (e.g. Dezső introduced Ili to Kriszti and Ede introduced Lajos to Olga) and Péter introduced Juli to Mari, too.]'

As for *is*, it has to appear immediately after the first element of the ordered tuple, while the other elements of the tuple are preceded by the verb, see (6a-b). (6c) presents the two sentence schemes. (6d) gives a straightforward semantic restriction on the build-up of the tuples in the scope of is: only referential – or more generally, independently interpretable – expressions can function in these tuples. Proper idiom parts (with no independent reference and/or interpretation) cannot appear in these tuples (that is why (6d) has only one idiomatic reading, in contrast to the two literal readings). This restriction also holds for tuples in the scope of *szintén*.

(6)   a.   *Péter **is** bemutatta   Julit   Marinak.*
              Péter also preV.introduced.3SG Juli.ACC Mari.DAT
              meaning 1:   'Péter introduced Juli to Mari, too. [Some people introduced Juli to Mari (e.g. Ili, Kriszti and Olga) and Péter also introduced Juli to Mari.]'
              meaning 2:   'Péter introduced Juli to Mari, too. [Some people introduced some people to some people (e.g. Dezső introduced Ili to Kriszti and Ede introduced Lajos to Olga) and Péter introduced Juli to Mari, too.]'[6]
        b.   *Péter Julit   **is** bemutatta   Marinak.*
              Péter Juli.ACC also preV.introduced.3SG Mari.DAT
              meaning 1:   'Péter introduced Juli to Mari, too. [Péter introduced some people to Mari (e.g. Betti and Aliz) and Péter also introduced Juli to Mari.]'
              meaning 2:   'Péter introduced Juli to Mari, too. [Péter introduced some people to some people (e.g. Ili to Kriszti and Lajos to Olga) and he also introduced Juli to Mari.]'

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[6]   The readings are associated with somewhat different stress patterns. Essentially, the rule is that if a phrase belongs to the tuple in the scope of *is* in a particular reading, it bears heavier stress than when it does not belong to the scope of *is*. As a result, there is a (possible but less available) third reading with Péter and Mari in the scope of *is* (marked by heavier stress). The following situation can be presented as an example for this reading: [Some people introduced Juli to some people (e.g. Ili to Dezső, Kriszti to Olga), and Péter also introduced Juli to Mari.].

c. X_1 X_2 … X_k [Y_1 Y_2 … Y_n]

[*is* + … + V + …]   [*szintén* + … + V + …]

d.   *Péter*   ***is***   *megütötte*   *a*   *bokáját.*
Péter   also   preV.hurt.3SG   the   ankle.POSS3SG.ACC
literal meaning 1:   'Péter hurt his ankle, too. [Some people (e.g. Dezső and Jóska) hurt their ankles, and Péter also hurt his ankle.]'
literal meaning 2:   'Péter hurt his ankle, too. [Some people hurt themselves at various places (e.g. Dezső hurt his head, and Jóska hurt his arm), and Péter also hurt his ankle.]'
idiomatic meaning: 'Péter is also going to pay for this.'

3.2. Stress on is *and* szintén

Another difference between the two particles *is* that *szintén* has stress and it can appear as a separate clause, which two facts are presumably interrelated. This behavior of *szintén* can be illustrated with a short conversation set in a restaurant, for instance (see (7a)). *Is* is obligatorily unstressed—it has to cliticize on the constituent that precedes it—and, due to this fact, it cannot appear independently, as shown in (7a).

(7)   a.   A: *Vizet*   *kérnék.*
water.ACC   ask.COND.1SG
'I would like to have some water.'
B: ***Szintén****.* / **Is.*
also   / also
'Me, too.'

b.   ⟨*Sajnos*⟩   *Péter* ⟨…⟩ *Julit*[#]⟨…⟩ *Marinak* ⟨…⟩ ***szintén*** *bemutatta.*
unfortunately   Péter   Juli.ACC   Mari.DAT   also   preV.introduced.3SG
The intended meaning is as meaning 2 in (5): 'Péter introduced *Juli* to *Mari*, too. [Péter introduced some people to some people (e.g. Ili to Kriszti and Lajos to Olga) and he also introduced Juli to Mari.]'
The tuple considered under the intended meaning: [Julit, Marinak]

In contrast to *is*, *szintén* does not cliticize on the last noun phrase in the tuple that it pertains to. Moreover, in a sentence like (5), high sentence-adverbials such as *sajnos* 'unfortunately', *szerencsére* 'fortunately', *szerintem* 'according to me', *állítólag* 'allegedly', *valószínűleg* 'probably' (Surányi 2008) can readily be inserted between the given noun phrase and *szintén* (7b). As also presented in (7b), high adverbials can freely appear in several earlier positions on the left periphery of such sentences, with one restriction: they cannot appear inside the sequence of noun phrases in the scope of *szintén* under the intended meaning (marked by [Y_1 Y_2 … Y_n] in the scheme given in (6c)).

3.3. Is*, and only* is*, as a pragmatic marker*

Is can be replaced with *szintén* only if it functions as a distributive quantifier. If *is* has a pragmatic-marker function in the sense as Aijmer *et al.* (2006) describe it, their replacement results in ungrammatical constructions, as shown in (8). That is, *is* can function as a pragmatic marker while *szintén* cannot. We will return to the topic of the particle functioning as a pragmatic marker later in more detail in Section 5.

(8)   a.   *Kátyúztak*   **is**   / **szintén*, *meg   nem*   **is**   / **szintén*.
           fixed_road.3PL   also   / also   and   not   also   / also
           'They both fixed the roads, and they didn't. [They fixed the road in theory, but they didn't do a very
           good job at it.]'

      b.   *Kit*   **is**   / **szintén* *láttunk   tegnap?*
           who.ACC   also   / also   saw.1PL   yesterday
           'Again, who did we see yesterday?'

3.4. Szintén, *and only* szintén, *as a ground-preserving discourse marker*

A further difference between *is* and *szintén* is that *is* always pertains to the element which it follows, while *szintén* can also pertain to the constituent following it. In the latter case, *szintén* has a function which can be referred to as a "discourse preserving" function (see Huszics 2020). We try to convey this function in the translations under (9). In this function, *szintén* can be interpreted as a coherence-signaling discourse marker, as proposed by Aijmer *et al.* (2006) in their terminology.

(9)   a.   *Tegnap   elfogták   a   bankrablót.*
           yesterday   preV.captured.3PL   the   bank_robber.ACC
           (És)   **szintén** *tegnap   Tóth   bíró   elítélte   a   bűntársait.*
           and   also   yesterday   Tóth   judge   preV.sentenced.3SG   the   accomplice.PL.ACC
           'The bank robber was caught yesterday. (And) also yesterday, judge Tóth sentenced his accomplices.'

      b.   *Ibi   hozta   be   a   gyilkost.*
           Ibi   brought.3SG   preV   the   murderer.ACC
           (És)   **szintén** *Ibi   oldotta   meg   a   bankrablási   ügyet.*
           and   also   Ibi   solved.3SG   preV   the   bank_robbery.ADJ   case.ACC
           'It was Ibi who brought in the suspect. (And) it was also Ibi who solved the bank robbery case.'

      b'. ^{??}[*Ibi   be-hozta   a   gyilkost.*
           Ibi   preV-brought.3SG   the   murderer.ACC
           (És)   **szintén** *Ibi   meg-oldotta   a   bankrablási   ügyet.*]
           and   also   Ibi   preV-solved.3SG   the   bank_robbery.ADJ   case.ACC
           'Ibi brought in the suspect. (And) it can also be said about Ibi that she solved the bank robbery case.'
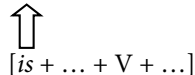
If the ground-preserving *szintén* pertains to an argument (9b-b') and not to an adjunct (9a), the argument has to appear in focus position (Huszics 2020). It requires future research to establish the kinds of satellites that can appear both in topic and in focus position, and the kinds of satellites that can appear only in focus position. At this point though, it can be stated that adjuncts can appear in both positions (presumably due to their independent interpretability, which is expectable with topic-like functions), while central arguments (viz. nominative and accusative case-marked ones) can only appear in focus, with non-central arguments seemingly showing an in-between (but uneasily characterizable) behavior.

4. Syntactic representations

This section provides syntactic representations for various constructions containing *is* or *szintén*.

4.1. The syntactic representation of **is**

First let us consider the structure belonging to (6b), repeated here as (10) in meaning 2. This meaning can be regarded as a realization of the general scheme presented in (6c), as follows: X_1=Péter, k=1, n=2, $[Y_1, Y_2]$ = [Juli, Mari], see (10b).

(10) a. *Péter   Juli   **is**   bemutatta   Marinak.*
          Péter   Juli.ACC   also   preV.introduced.3SG   Mari.DAT
          'Péter introduced Juli to Mari, too. [Péter introduced some people to some people (e.g. Ili to Kriszti and Lajos to Olga) and he also introduced Juli to Mari.]'

      b. X_1 X_2 … X_k $[Y_1$ ~~Y_2 … $Y_n]$~~ $[$~~Y_1~~$—Y_2$ … $Y_n]$

                                          ⇧

                                    $[is + … + V + …]$

The structure is based on Grohmann's (2003) theory of Prolific Domains – in particular, on the version proposed for Hungarian by Farkas and Alberti (2017). The triangle under the vP node signals that the internal build-up of the thematic domain (ΘΔ) is irrelevant here. In the ΦΔ, CentPs host central arguments (i.e. the subject and the object), while NonCentPs host non-central arguments. The order of CentPs and NonCentPs is free; it is based on Behaghel's Law, often used by É. Kiss (e.g. 2009), which predicts that the optimal order of the satellites of V at the right periphery of the Hungarian sentence is the following: heavy phrases tend to come last. In harmony with this principle, the basically free word order (determined mainly by the Behaghel's Law) appearing in Hungarian in the postverbal zone is expressed as such: the highest phrase in the ΦΔ is AspP, whose modifier is occupied by the preverb expressing the aspect of the sentence, and to whose head the verb moves.
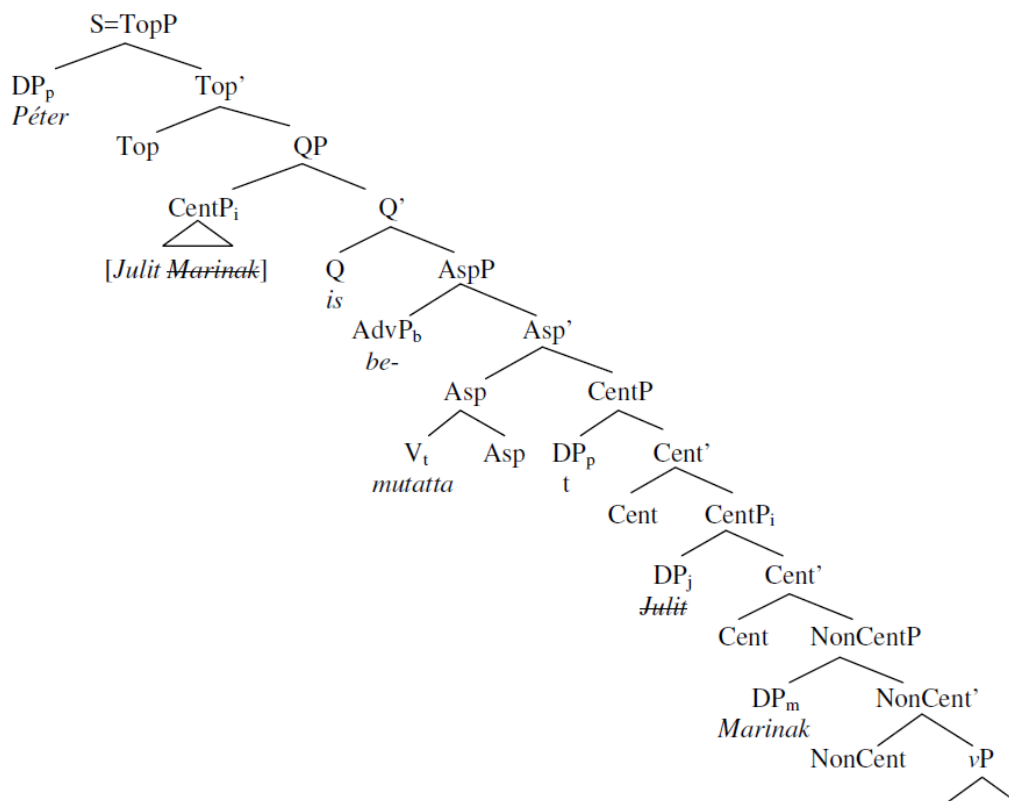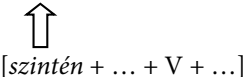

Figure 1: *The syntactic representation of (10a)*

As the particle *is* pertains to a whole proposition in (10), a whole CentP has to appear (in the ΩΔ) in the modifier of the quantifier, the head of which is occupied by the particle itself. Due to the fact that *is* is obligatorily unstressed and it has to cliticize on the head of the constituent it pertains to, the CentP is only partially spelt out in the modifier in question ($[Y_1, \overline{Y_2}]$); the rest of the CentP is spelt out in its base-generated position ($[\overline{Y_1}, Y_2]$).[7] The subject (Péter) appears as a topic, since it does not belong to the ordered n-tuple in question (it plays the role of X_1 in (10b) and (6c)).

4.2. The syntactic representation of szintén

Figure 2 presents the syntactic structure of the corresponding sentence containing *szintén* (see (5) in meaning 2), repeated here as (11).

(11)   a.   *Péter Julit   Marinak **szintén** bemutatta.*
            Péter Juli.ACC Mari.DAT also   preV.introduced.3SG
            'Péter introduced Juli to Mari, too. [Péter introduced some people to some people (e.g. Ili to Kriszti and Lajos to Olga) and he also introduced Juli to Mari.]'

   b. X_1 X_2 … X_k [Y_1 Y_2 … Y_n] $[\overline{Y_1\ Y_2\ …\ Y_n}]$

                              ⇧
                        [*szintén* + … + V + …]

This meaning can also be regarded as a realization of the general scheme presented in (6c), with the same specification: X_1=Péter, k=1, n=2, [Y_1, Y_2] = [Juli, Mari], see (11b). The crucial difference is that *szintén* has no "addiction" to insertion but behaves as a Cinquean middle (predicate-) adverbial, as proposed by Surányi (2008) (on the basis of word-order facts and the stressed status of *szintén*), which projects as an AlsoP left-adjacent to the field of the complex predicate (AspP here). Witnessed by (7b) in 2.2, projections of high sentences-adverbials (such as sajnos 'unfortunately') can appear between the lower TopP and this AlsoP (apart from when they appear between the two TopPs and above the higher TopP). That is why the specifier of AlsoP is assumed to only contain the trace of the remnant with the phonetic realization Julit Marinak. This latter sequence is considered to form a unit, in order to account for the fact that no high adverbial can appear between Julit and Marinak (as also illustrated in (7b)). This unit is assumed to occupy the specifier of a topic, instead of that of a quantifier, due to the data shown in (3c') in 1.2: this way, the ill-formed status of the word order in question can be attributed to the rule that a quantifier cannot take scope over a topic.[8] This implies the following complex semantics for *szintén*: its use relies on a complex predicate in an earlier clause, and

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[7]   The *partial spell-out* technique was first applied to Hungarian by Surányi (2009).

[8]   The same rule accounts for the well-formed status of (3c): the noun phrase before the AlsoP is a Topic, which is permitted to take scope over the *is*-quantifier after the AlsoP. AlsoP is the leftmost element of the comment / predicate zone of the Hungarian sentence structure, immediately after the topic zone. Quantifiers can appear in both sentence zones (Szeteli and Alberti 2018), resulting in this general structure (H: high adverbials, *: Kleene star, which means that 0, 1, 2 or more copies of the given category can occur):
      [Topic zone H* Top* H* Top* H* Q* H*] [Comment zone Also Q* Foc …]

szintén associates the new copy of this (in the given clause) with a new tuple of referents.[9] The distributive character can be explained as follows: the new topic does not refer to a participant in the original (or old) eventuality itself, but to a participant in an eventuality which is of the same type as the antecedent eventuality, but another instance of that type.
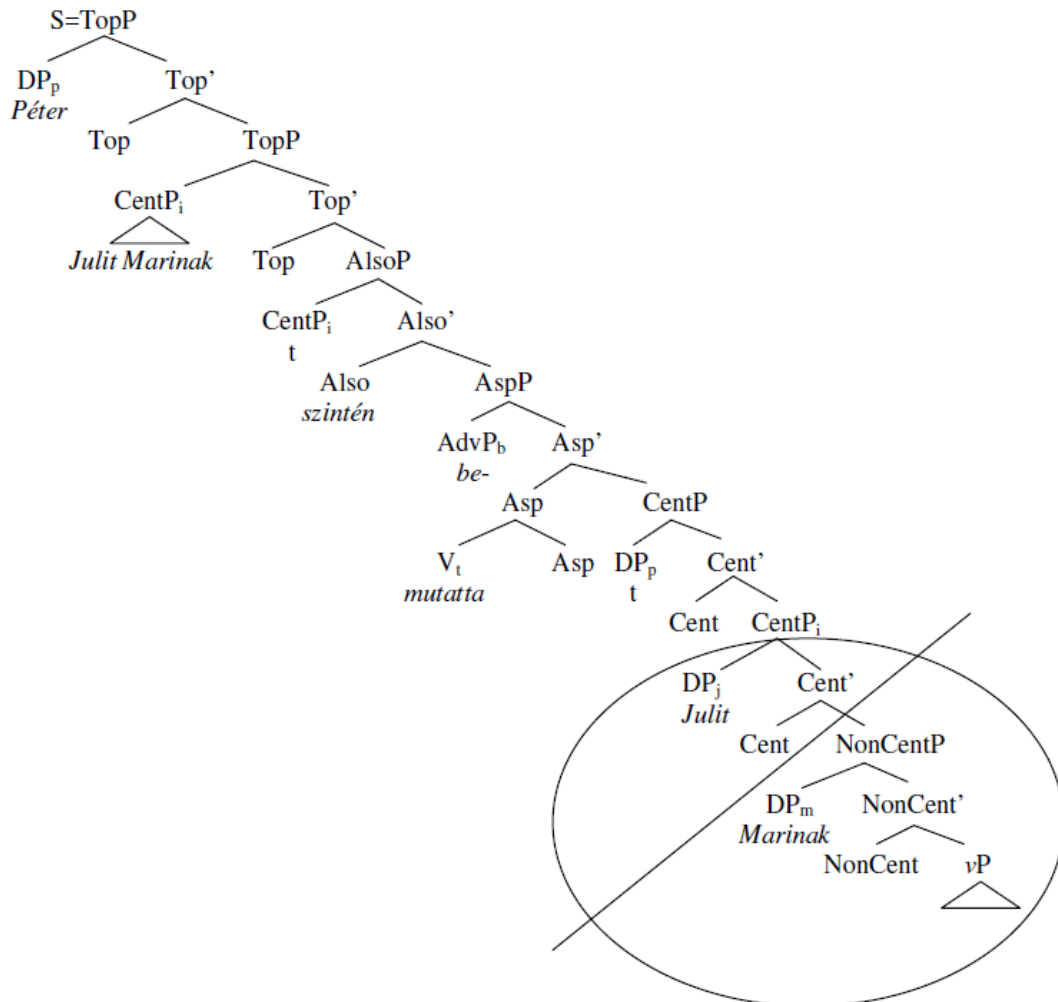

Figure 2: *The syntactic representation of (11a)*

4.3. *The syntactic representation of the "ground preserving"* szintén

The final structure we consider is the one where *szintén* has a discourse preserving function; see (9a), for instance, repeated here as (12)). Just like in 3.2, its semantics relies on the association of something old with something new; except here, certain elements in the topic zone of an earlier clause are exploited. This anchoring information is associated with a new complex predicate, whose projection appears in the complement of the given Also head.

(12)   (*És*)   **szintén**   *tegnap*   *Tóth*   *bíró*
        and   also   yesterday   Tóth   judge

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9   The new copy of the antecedent predicate can be elided. *Julit Marinak szintén* – this verbless sequence of words, for instance, can serve as a well-formed alternative to (11a) in contexts with appropriate antecedents.

elítélte   a   bűntársait.
preV.sentenced.3SG   the   accomplice.POSS3SG.PL.ACC
'[The bank robber was caught yesterday.] (And) also yesterday, judge Tóth sentenced his accomplices.'

As formulated in Huszics (2020), the specifier of the AlsoP contains the antecedent clause, which is then to be regarded as still "active" in the discourse: the antecedent clause 'yesterday, the bank robber was caught' is referred to by the anaphoric element pro-Top'.[10] Given the fact that this kind of *szintén* must be cliticized on the constituent in the specifier from the left, the word order changes in the Phonological Form (resulting in the sequence *szintén tegnap*). Here *szintén* functions as a *high* sentence-adverbial (old topic(s) with a new predicate), in contrast to the predicate-adverbial variant of *szintén* (new topic(s) with an old predicate).
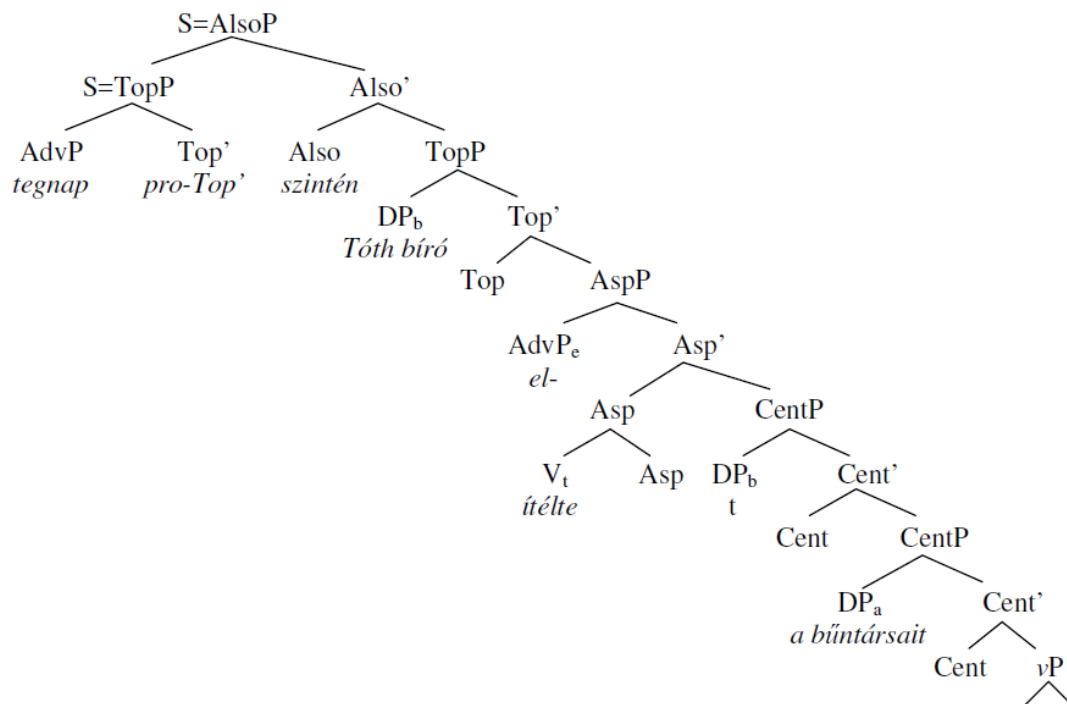

Figure 3: The syntactic representation of (12)

5. *Is* as a pragmatic marker

As mentioned previously (see (8) in Section 3), the particle *is* does not only have a logical role, but it can also function as a pragmatic marker – as used in the terminology proposed by Aijmer *et al.* (2006). In this role, it cannot be replaced with *szintén* (NB: the function of *is* can be called 'logical' if the given function can be expressed by a corresponding *szintén*-expression). In this section, we present how the different kinds of *is* can be systematically differentiated from one another, and how they can be accurately characterized in a formal representational dynamic

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[10] Bánréti (1992: 789) accounts for various elliptical constructions by using empty proposition-level pronominal expressions. In his example (136'), a pro-V' refers to a situation with a boy looking at a girl. The sentence in question consists of a single word: *Hosszasan* 'at length'. In the same way, *Tegnap* 'yesterday' can serve as a short answer to the question: *When was the robber caught?*

theory of interpretation called ℜeALIS (*Reciprocal and Lifelong Interpretation System*).[11] These observations are the first steps towards revealing the complex polysemic network of the particle *is* in full (Fischer 2006: 13–14), with special regard to the subtle differentiation between pragmatic markers and discourse markers, such as *szintén*. As mentioned in the Introduction, a pragmatic marker in the terminology of Aijmer *et al.* (2006) is a word or expression that does not contribute to the propositional, truth-functional content of an utterance, while a discourse marker signals coherence relations.

5.1. The pragmasemantic characterization of the emotive is

The example below (13a) serves to illustrate one of those cases where the role of *is* can be "non-logical". Here, *hárman is* (three+also) does not refer to a set of more than three (that is, at least four) students. Instead, *is* yields an exclamative sentence, with the intensional characteristics given in (13b).

(13)   a.   *Hárman* **is**   *megoldották*   *ezt*   *a*   *feladatot!*
            three   also   preV.solved.3PL   this.ACC   the   task.ACC
            'There were (as many as) three people who solved this task (separately).' = e

       b.   iB↓ ∈ '–3'   [At an earlier point of time, I considered it quite unlikely that *e* should take place.]
            iD ∈ '5   [*e* taking place has a considerable emotional impact on me, either a positive or a negative one]

The pieces of intensional information involved in this situation are presented with the formalism of ℜeALIS. Essentially, the strings (e.g. iBuB↓) represent possible worlds of their holder, which is indicated by the first symbol in them (i=I (the speaker), u=you (the listener), o/o'/o"/… = 'underspecified holders'). The second symbol represents the modality of the possible world that the holder of the world (indicated by the first symbol) associates with the propositional content of the sentence. It can be, among others, a belief (B), a desire (D) or an intension (I). The modality is followed by an element of the set T={↓,↑,•}, which indicates the temporal properties of the world ('↓ ' for past, '↑' for future, '•' for present, in the string usually unmarked). If such a string is followed by a new holder, a new modality and a new temporal property, it means that it is embedded into the previous wordlet. This technique of reciprocity (cf. ℜeALIS) makes it possible to handle, for instance, the thoughts that interlocutors attribute to each other in the course of mind reading. A scale is also introduced for the values referring to false (−5), true (+5), and underspecified (0) information, and to various degrees between them (which more or less correspond to Farkas and Roelofsen's (2017) credence levels). As for the apostrophes, relative to the value −3, the complex symbol '−3' denotes the interval {−5, −4,

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[11] ℜeALIS is presented, among others, in Alberti (2011), Alberti and Kleiber (2015), Alberti *et al.* (2019a), in addition to Alberti *et al.* (2016), Kleiber and Alberti (2017), Szeteli *et al.* (2019) and Viszket *et al.* (2019), published in Poland. We have opted for this theory due to its integrative character. On the one hand, ℜeALIS is a representationalist counterpart of Lauer's (2013) and Farkas and Roelofsen's (2017) antirepresentationalist dynamic pragmatics in the post-Montagovian world of formal semantics. On the other hand, it simultaneously aims at serving as a "cognitively viable linguistic representation," as formulated in Andor's (2011: 1) interview with Searle.

−3, −2, −1} around the precise value −3. The relation iBuB↓ ∈ '+4·−5 thus means that "I am more or less convinced that you thought that a given information unit *e* is false."

Thus, (13b) provides possible-world indices. The first index defines the possible world of certain earlier assumptions of the addresser (modified later).[12] The second one "collects" states of affairs immensely desirable or, on the contrary, definitely undesirable for the addresser. We claim that this underspecified situation should be regarded as a linguistically and conventionally encoded part of the meaning of the given type of *is* (cf. Farkas and Roelofsen 2017: 237). In a particular conversation, the polarity value can typically be decided on the basis of world knowledge. Success in solving tasks is typically desirable, but the particular context may imply the opposite polarity value.

5.2. *The pragmasemantic characterization of* is *meaning 'and so it happened'*

The second type of *is* we discuss is the one that can be referred to as the *Úgy is lett* 'And so it happened' type. This type is mentioned in Alberti and Farkas (2018: 41), where its syntactic properties are accounted for. Here (see (14)), we present the crucial elements of the pragmasemantic contribution of the type to the discourse, based on the three examples in (14a-a").

(14) a. *Gondoltuk,   hogy   havazni   fog.   És   havazott   is!*
          thought.1PL   that   snow.INF   will.3SG   and   snowed.3SG   also
          'We thought that it would snow. And so it did.'

      a'. *Rossznak   tűnik.*   [a bit later]   *És   rossz   is!*
           bad.DAT   seem.3SG   and   bad   also
           'It looks bad. *[a bit later]* And so it is.'

      a". *Marinak   akartalak   bemutatni.*
           Mari.DAT   wanted.2OBJ.1SG   preV.introduce.INF
           És   Marinak   is   mutattalak   be!
           and   Mari.DAT   also   introduced.2OBJ.1SG   preV
           'I wanted to introduce you to Mari specifically. And so I did.'[13]

      b.   iB↓ ∈ '+3'   [I considered it likely that *e* should take place]
           iD ∈ '5'   [*e* taking place has a considerable emotional impact on me, either a positive or a negative one]

5.3. *The pragmasemantic characterization of the* is *of refutation*

Compared to the intensional profile in (13b), the one in (14b) also contains a substantial emotional impact, but here, the anticipatory epistemic state is positive. In example (14a"), this is not expressed explicitly in the sentence before the one including the *is*, but it is obvious that committed volition tends to yield success.

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[12] In ℜeALIS, the term *addresser* is used with the aim of distinguishing (and then truth-conditionally comparing) the 'addresser role' as a conventionalized intensional profile (to be calculated based on sentence types and discourse markers) from 'speaker' – as a conscious psychological ego with permanently changing information states.

[13] The first syllable of (14a") in both occurrences of the noun *Marinak* is pronounced with the (same) peculiar narrow-focus stress.

The third type we discuss is a kind of denial, as presented in (15b), an answer to (15a). This construction is typically used to explicitly refute some presupposition within the content of the antecedent statement. Hence, a detailed formal analysis of this type requires the "lifelong" character of ℜeALIS (cf. ℜeA<u>L</u>IS). This means that the basis of interpretation contains the interlocutors' momentary information states as lifelong-built (Alberti 2000) discourse representation structures (Kamp *et al.* 2011). These structures can obviously contain both the contextual information in the interlocutors' episodic memories and the scripts in their semantic memories (Leiss 2014), required to calculate the connection between the (b-b')-sentences and the (a)-sentence. The (15a+b') dialogue, for instance, can be explained with reference to a script which is available to the interlocutors and which contains information on the relation between dancing and potential dance lessons.

(15) a. A: *Tegnap   táncoltam   Ilivel   a   bulin.*
              yesterday   danced.1SG   Ili.INS   the   party.SUP
              'I danced with Ili yesterday at the party.'

      b. B: *Nem   **is**   Ili   volt   a   lány   neve.*
              not   also   Ili   was   the girl   name.3SG
              / *Nem   **is**   tegnap   volt a   buli.*
              / not   also   yesterday was   the party
              '(But) the girl's name was not (even) Ili. / (But) the party was not (even) yesterday.'

      b'. B: *Nem **is**   tudsz   táncolni.*
              not   also   can.2SG   dance.INF
              'You cannot even dance.'

      c.   iB ∈ −5   [I think that *e* is false]
           iB<u>u</u>B ∈ −5   [I think that you are aware of the fact that *e* is false]
           iBuIi<u>B</u>↑ ∈ +5   [it seems to me that you intend to have me believe that *e* is true]
           <u>iD</u>uIiB↑ ∈ '−5   [I wish you intended to tell me the truth, according to which *e* is false]

(15c) presents the possible-world indices that we propose as the definitive factors of the conventionalized intensional profile of the "refutative" *is*-construction. The information in question (denoted by *e* above) is the content of the sentence in (15a). Essentially, the profile expresses the addressee's stance according to which the addresser should stop pretending as if (15a) were true.

5.4. The pragmasemantic characterization of the is of "contradictions"

The fourth type of *is* we discuss displays the form [p and not p] of a logical contradiction, which is regarded as a non-contingent but constantly false expression in logics (16a-a'). The given double-*is*-construction, however, does provide some contingent intensional contribution. It becomes possible like this: the two clauses that the construction consists of concern two different possible worlds; and it is not impossible at all but definitely typical that alternative possible worlds support a proposition and also its opposite.

(16) a. *Kátyúztak*   **is**,   *meg   nem*   **is.**
           fix_road.PAST.3PL also   and   not   also
           'They both fixed the roads, and they didn't.'
           [They fixed the road in theory, but they didn't do a very good job at it.]'
           http://www.vasarhely24.com/vasarhely/katyuztak-is-meg-nem-is-a-rarosin (20200109)

      a'. *Burgonya* *is*,   *meg   nem   is.*
           potato   also   and   not   also
           '[Sweet potatoes] are both potatoes and not.'
           [Certain properties of potatoes, in contrast to other properties, hold for sweet potatoes.]'
           https://www.magyarszo.rs/hu/3826/hetvege/192403/Burgonya-is-meg-nem-is.htm (20200109)

      b.   iBo'B ∈ +5   [I believe that some people think that *e* has taken place]
           iBo"B ∈ −5   [I consider that some people think that *e* has not taken place]

      b'. iB' ∈ +5   [a set *e'* of criteria (characterizing potatoes) holds true (for sweet potatoes)]
           iB" ∈ −5   [a set *e"* of criteria (characterizing potatoes) does not hold true (for sweet potatoes)]

Based on the analyses of a wide range of relevant Internet data, we hypothesize that the intensional profile of the construction under investigation is highly underspecified. The common factor in the data is that the interpretation of the same content in the same possible world is somehow avoided. Apart from this, the interpretation of the utterance is often extremely vague. Regarding the sentence in (16a), the profile proposed in (16b) accounts for the apparent contradiction in that it assumes that the addresser articulates the opinions of different groups (o' and o") of people. As for the profile (16b'), proposed for the sentence in (16a'), our analysis relies on the script- and schema-based technique of interpretation in ℜeALIS, as exemplified in (15b'). For something to qualify as a potato requires the satisfaction of a set of criteria more or less known to the interlocutors. Thus, the two clauses in (16a') should be regarded as ones that concern two different sets of properties related to sweet potatoes (viz. the potato-like and the non-potato-like properties, respectively).

5.5. *The pragmasemantic characterization of the basic metacognitive* **is**

The last type of *is* we discuss here to demonstrate the non-logical uses of *is*—where it cannot be replaced with *szintén*—is the one that can be referred to as the metacognitive *is*; the nearest English equivalent for this *is* could be 'again' (17a).

(17) a. *Kit*   **is**   *láttunk*   *ott*   *tavaly?*
           who.ACC   also   see.PAST.1PL   there   last_year
           'Again, who did we see there last year?'

      b. (i)   iB ∈ '0'   [I do not know whether *e* is true or false]
          (i')   iB̲u̲B̲ ∈ +5   [I think that you know the truth]
          (i")   iIuI↑u̲B̲↑ ∈ +5   [I intend to have you prepared to tell me the truth]
          (ii)   iB↓ ∈ +5   [there was a time when I knew the truth]
          (ii') iBuBi̲B̲↓ ∈ +5   [I think that you are aware of the fact that there was a time when I knew the truth]

The intensional profile of the metacognitive *is* (at least, of this particular subtype, see Futó (2020)) is presented in (17b.ii-ii'). The addresser is scanning his/her own lifelong mind representation and realizes that there is some information that he/she had had earlier (17b.ii)

but is now missing from his/her current information state (17b.i). They also realize that, luckily, this is a piece of information that they are likely to (have) share(d) with the addressee (17b.ii'). Note that the profile elements given in (17b.i-i") are necessary for elucidating the functioning of the *wh*-word+*is* construction (the addresser asks for the missing information), but they belong to the general interrogative intensional profile, discussed in Alberti *et al.* (2019b) and Viszket *et al.* (2019), among others.

6. Summary

The purpose of the paper was to discuss two Hungarian particles with the same logical core meaning ALSO: *is* and *szintén*. Since *is* has been extensively studied in Hungarian generative literature (e.g. Brody 1990 and É. Kiss 1992, 2002) while *szintén* has scarcely been paid attention, we described the two particles in relation to each other, using the already available descriptors for *is* as a point of departure for the description of *szintén*. The parallel analysis of the two particles yielded novel observations for the syntax and pragmasemantics of both particles, as summarized below (see Section 2 for details):

I.   Both *szintén* and *is* have a distributive meaning.

II.   Neither *is*, nor *szintén* can be followed by a topic, and neither of them can follow a (narrow) focus.

III.   *Is* and *szintén* can be combined within one clause, with certain restrictions on word order.

IV.   Both *szintén* and *is* can pertain to ordered n-tuples of noun phrases (as a generalization of the case n=1), but in syntactically different ways.

V.   *Is* is obligatorily unstressed, while *szintén* bears stress, with the exception of its ground-preserving use, when it can be regarded to function as a discourse marker (Aijmer *et al.* 2006).

VI.   *Szintén* can appear as a separate clause, while *is* cannot.

VII.   *Is* can function as a pragmatic marker (Aijmer *et al.* 2006) while *szintén* cannot.

After an overview of the similarities and differences (Sections 2 and 3), we demonstrated how the syntactic characteristics of the two particles can be captured by the *partial spell-out* technique used in some branches of minimalism (Surányi 2009), and we classified *szintén* as a high sentence-adverbial (Surányi 2008) – in contrast to the clitic-like *is* (Section 4). In what followed, we drew up a pragmasemantic system for those usages of *is* where the particle cannot be replaced with *szintén* – i.e. the cases where *is* functions as an intensional/metacognitive pragmatic marker, as opposed to *szintén*, which acts as a coherence-signaling discourse marker (Section 5). For this analysis, we used the framework of the formal representational dynamic theory of interpretation called ℜeALIS (see, for instance, Alberti *et al.* 2016, 2019; Szeteli *et al.* 2019, and Viszket *et al.* 2019).

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