

## **Topicalisation in Coordination under Subordination\***

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The following text considers the interaction of syntax (structure, word order) and semantics (interpretation, information structure). Using question-answer pairs of varying complexity set in different contexts, it outlines a number of properties of contrastive topic in Czech. These properties are then used to argue that topicalisation in coordination under subordination can target elements that are interpreted as contrastive topics. In the process, a couple of examples incompatible with the existing analyses of contrastive topic are presented to justify a new definition of this information-structural category.

### **1 Information Structure**

#### *1.1 Information-Structural Categories*

The following categories are commonly used in the literature on information structure: GIVEN (G), NEW (N), TOPIC (T), FOCUS (F), CONTRASTIVE TOPIC (CT), CONTRASTIVE FOCUS (CF). Often, linguists working on information structure differ as to which of these categories they consider to be the set of basic theoretical components. Although

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related, the task of splitting the various competing lines of thought is somewhat orthogonal to the present discussion. In this text, only G, T, F and CT are relevant<sup>1</sup>. In what follows, the information-structural category of each relevant constituent is marked by a subscript.

### 1.2 Question-Answer Pairs

In his insightful book, Jackendoff (1972) uses question-answer pairs to demonstrate how the form of the question can influence the form of the answer. The question primes the use of CT in the answer. Jackendoff (*ibid.*) distinguishes between an A-accent and a B-accent. The former is realised with a fall accent and the latter with a fall-rise accent (p. 261)<sup>2</sup>.

- (1) a. Well, what about FRED? What did HE eat?  
       b. FRED<sub>B</sub> ate the BEANS<sub>A</sub>.
- (2) a. Well, what about the BEANS? Who ate THEM?  
       b. FRED<sub>A</sub> ate the BEANS<sub>B</sub>.

Crucially, (1a) cannot be answered by (2b), and (2a) cannot be answered by (1b). Büring (2003) refers to any constituent marked by the A-accent as F, and to any constituent marked by the B-accent as CT. The accentuation is therefore taken to be a criterion for classifying a constituent as either CT or F. As far as Czech is concerned, Veselá et al. (2003), who studied a relatively large sample of spontaneous speech, claim that native speakers tend to realise CT with a rise accent, T with a level accent and F with a fall accent. However, it seems that, in most cases, elements interpreted as CT can also be realised with a level accent, which is otherwise typical of elements interpreted as T. The accentuation is therefore only indicative of the element's information-structural status. Consequently, it is important to consider the phonetic realisation of each relevant syntactic element in conjunction with the semantic and/or pragmatic import that it has. Building on his previous work, Büring (to

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<sup>1</sup> Sometimes, elements that qualify as G are not marked as such. This is due to the fact that these elements might be interpreted as T or CT. Whenever G-marking is of importance, it is discussed. It is also worth noting that not everyone assumes the existence of the category T. Büring (to appear), for instance, dedicates an entire section to pointing out various problems with pinpointing a precise definition of T. However, the argument defended below does not hinge on the existence of this category.

<sup>2</sup> The example numbering has been altered and the A-/B-accent marking has been added.

appear) formulates the following rule to account for the distribution of the category CT (pp. 3–4).

(3) CT-INTERPRETATION RULE

For a sentence  $S^{CT+F}$  to be felicitous, there must be at least one question meaning in  $S^{CT+F}$ 's CT-value which is

- |    |   |                 |
|----|---|-----------------|
| a. | currently pertinent, and                        | PERTINENCE      |
| b. | logically independent of $[[S^{CT+F}]_O]$ , and | INDEPENDENCE    |
| c. | identifiable.                                   | IDENTIFIABILITY |

$[[S^{CT+F}]_O]$  refers to the ordinary meaning of the sentence containing CT and F. It is used in juxtaposition with  $[[S^{CT+F}]_{CT}]$  and  $[[S^{CT+F}]_F]$ , which refer to the sentence's CT and F alternatives, respectively. Since the CT alternatives will be of primary importance in what is to follow, it is worth considering Jackendoff's examples in the light of Büring's proposal. The CT alternatives for (1b) and (2b) are *What did x eat?* and *Who ate y?*, respectively. Crucially, the variable  $x$  must be replaced by an individual other than *Fred*, and the variable  $y$  must be replaced by a dish other than *the beans*. PERTINENCE ensures that the alternative is relevant in the given context, INDEPENDENCE ensures that it neither entails nor contradicts the ordinary meaning of the sentence containing CT, and IDENTIFIABILITY ensures that it is recognisable by the hearer.

In the following sections, it will be shown that Büring's proposal is too restrictive. More concretely, it precludes *What did x eat?* and *Who ate y?* from being alternatives. This is at odds with the fact that it is possible to conjoin answers to these questions in Czech. In this text, it is assumed that the presence of CT indicates that the expression that contains it is a partial answer to a question that requires a multiple-pair answer (see (4)). This definition follows from the generalisation in (5), which is itself inspired by Kuno's (1982) observation that answers to multiple questions contain a sortal key (i.e., an expression according to which the answer is sorted). The last ingredient of the analysis is that it must always be possible for the element interpreted as CT to realise a rise accent. This can be viewed as a language-specific filter that is operative in Czech, but that need not be operative in other languages.

- (4) CT-INTERPRETATION (ALL LANGUAGES)  
The expression that contains CT is a partial answer to a question that requires a multiple-pair answer.
- (5) CT-PRESENCE (ALL LANGUAGES)  
A partial answer to a question that requires a multiple-pair answer must contain an element interpreted as CT.
- (6) CT-REALISATION (CZECH)  
The element interpreted as CT must (have the possibility to) realise a rise accent.

## 2 Basic Restrictions on Constituent Order

Czech is a language that is considered to have a very flexible constituent order. While this is generally true, the order of constituents is (often) heavily restricted by the context in which a given sentence is used. The information packaging ensures that each constituent gets interpreted in a particular way. The information structure then places certain (language-specific) restrictions on the order of these constituents. The aim of this section is to explore the nature of some of these restrictions.

### 2.1 Object-Oriented Questions and Simplex Answers

Assume that Speaker A asks the following question<sup>3</sup>. In the answer, the subject should be interpreted as CT, and the object as F<sup>4</sup>.

- (7) A co Petr? Co snědl ten?  
and what Peter<sub>NOM</sub> what<sub>ACC</sub> eat<sub>PST</sub> he<sub>DEM</sub>  
'And what about Peter? What did HE eat?'

The following are all possible permutations of subject, verb and object

<sup>3</sup> Unless specified otherwise, the questions used below are assumed to be uttered in the following context: Disregarding Speaker A and Speaker B, there were >2 individuals (Peter, Mary, Jacob) and >2 dishes (beans, spinach, aubergine), all of whom/which were familiar to Speaker A and Speaker B. Speaker A did not know who ate what, and Speaker B supplied this information. For reasons to do with simplicity, it is assumed that the relation between individuals and dishes is one-to-one. In other words, it is assumed that each individual is linked with exactly one dish. Unless stated otherwise, this is also the case in subsequent examples.

<sup>4</sup> This is due to the fact that *Petr* is being contrasted with the other individuals in the context, and that *fazole* corresponds to the *wh*-element in the question.

that Speaker B could produce in reply to the question in (7). Interestingly, the realisation of the subject with the rise accent is blocked when it follows the object. Examples (9), (10) and (11) are not acceptable regardless of the accent that the subject realises. (12) and (13) are marked, because interpreting the subject as T is at odds with what the context requires. Crucially, it follows from the above that the subject can be interpreted as CT only in the initial position<sup>5</sup>.

- (8) [ Petr]<sub>T/CT</sub> [ snědl]<sub>G</sub> [ fazole]<sub>F</sub>. (SVO)  
 Peter<sub>NOM</sub> eat<sub>PST</sub> beans<sub>ACC</sub>  
 ‘Peter ate the beans.’
- (9) #[Petr]<sub>T/CT</sub> [fazole]<sub>F</sub> [snědl]<sub>G</sub>. (SOV)
- (10) \*[Snědl]<sub>G</sub> [Petr]<sub>T/CT</sub> [fazole]<sub>F</sub>. (VSO)
- (11) \*[Snědl]<sub>G</sub> [fazole]<sub>F</sub> [Petr]<sub>T/CT</sub>. (VOS)
- (12) [Fazole]<sub>F</sub> [Petr]<sub>T/\*CT</sub> [snědl]<sub>G</sub>. (OSV)
- (13) [Fazole]<sub>F</sub> [snědl]<sub>G</sub> [Petr]<sub>T/\*CT</sub>. (OVS)

## 2.2 Subject-Oriented Questions and Simplex Answers

To check the reverse, assume that Speaker A asks the following question. In the answer, the object should be interpreted as CT, and the subject as F<sup>6</sup>.

- (14) A co fazole? Kdo snědl ty?  
 and what beans<sub>NOM</sub> wh<sub>NOM</sub> eat<sub>PST</sub> them<sub>DEM</sub>  
 ‘And what about the beans? Who ate THEM?’

The following are all possible permutations of subject, verb and object that Speaker B could produce in reply to the question in (14). Interestingly, the realisation of the object with the rise accent is blocked when it follows the subject. Examples (16), (17) and (18) are not acceptable regardless of the accent that the object realises. (19) is severely degraded, because an element interpreted as G (i.e., *snědl*)

<sup>5</sup> Sentences that would be acceptable with a different information-structural marking (in a different context) are prefixed with a hash. Sentences that would be unacceptable in any context, regardless of the information-structural marking, are prefixed with a star. Various degrees of markedness are signalled by question marks.

<sup>6</sup> This is due to the fact that *fazole* is being contrasted with the other dishes in the context, and that *Petr* corresponds to the *wh*-element in the question.

appears in the sentence-final position, following an element interpreted as F (i.e., *Petr*)<sup>7</sup>. Interestingly, interpreting the object in (15) as T is possible. Crucially, it follows from the above that the object can be interpreted as CT only in the initial position.

- (15) [ Petr]<sub>F</sub> [ snědl]<sub>G</sub> [ fazole]<sub>T/\*CT</sub>. (SVO)  
       Peter<sub>NOM</sub> eat<sub>PST</sub> beans<sub>ACC</sub>  
       ‘Peter ate the beans.’
- (16) #[Petr]<sub>F</sub> [fazole]<sub>T/CT</sub> [snědl]<sub>G</sub>. (SOV)  
 (17) \*[Snědl]<sub>G</sub> [Petr]<sub>F</sub> [fazole]<sub>T/CT</sub>. (VSO)  
 (18) \*[Snědl]<sub>G</sub> [fazole]<sub>T/CT</sub> [Petr]<sub>F</sub>. (VOS)  
 (19) ??[Fazole]<sub>T/CT</sub> [Petr]<sub>F</sub> [snědl]<sub>G</sub>. (OSV)  
 (20) [Fazole]<sub>T/CT</sub> [snědl]<sub>G</sub> [Petr]<sub>F</sub>. (OVS)

In principle, Speaker B could select from three types of constituent order (i.e., SVO, OSV, OVS) when answering the question in (7), and from two types of constituent order (i.e., SVO, OVS) when answering the question in (14). However, the rise accent typical of CTs is restricted to appear in an SVO configuration (see (8)) in the answer to (7), and in an OVS configuration (see (20)) in the answer to (14). The fact that the element interpreted as CT must precede the element interpreted as F is in line with similar observations made by other authors for other languages<sup>8</sup>.

### 2.3 *Object-Oriented Questions and Complex Answers*

Apart from requesting information about a single person or a single dish, it is also plausible to request information about multiple persons or dishes at the same time. This can be achieved by coordinating two subjects or two objects in the question. Assume that Speaker A asks the following question. In the answer, the subject should be interpreted as CT, and the object as F.

<sup>7</sup> An explanation of why this constituent order is blocked can be found in Kučerová 2007 as well as Šimík and Wierzba 2015.

<sup>8</sup> Among others, Büring 1995 for German, and Wagner 2012 for German, Italian and English.

- (21) A co Petr a Marie? Co snědli ti?  
 and what Peter<sub>NOM</sub> and Mary<sub>NOM</sub> what<sub>ACC</sub> eat<sub>PST</sub> they<sub>DEM</sub>  
 ‘And what about Peter and Mary? What did THEY eat?’

Interestingly, the only permissible constituent order within each partial answer (= conjunct) is one in which the subject can be realised with the rise accent.

- (22) [ Petr]<sub>CT</sub> [ snědl]<sub>G</sub> [ fazole]<sub>F</sub> ( a [ Marie]<sub>CT</sub> [ snědla]<sub>G</sub>  
 Peter<sub>NOM</sub> eat<sub>PST</sub> beans<sub>ACC</sub> and Mary<sub>NOM</sub> eat<sub>PST</sub>  
 [ špenát]<sub>F</sub>). (SVO-SVO)  
 spinach<sub>ACC</sub>  
 ‘Peter ate the beans (and Mary ate the spinach).’

The other two constituent orders (i.e., OSV and OVS) that were allowed in an answer to the object-oriented question in (7) may not be used in either a partial or a complete answer to (21). This is predicted by the combination of (5) and (6) in the context of (21).

- (23) \*[Fazole]<sub>F</sub> [Petr]<sub>CT</sub> [snědl]<sub>G</sub> (a [špenát]<sub>F</sub> [Marie]<sub>CT</sub> [snědla]<sub>G</sub>).  
 (OSV-OSV)  
 (24) #[Fazole]<sub>F</sub> [snědl]<sub>G</sub> [Petr]<sub>CT</sub> (a [špenát]<sub>F</sub> [snědla]<sub>G</sub> [Marie]<sub>CT</sub>).  
 (OVS-OVS)

#### 2.4 Subject-Oriented Questions and Complex Answers

To check the reverse, assume that Speaker A asks the following question. In the answer, the object should be interpreted as CT and the subject as F.

- (25) A co fazole a špenát? Kdo snědl ty?  
 and what beans<sub>NOM</sub> and spinach<sub>NOM</sub> wh<sub>NOM</sub> eat<sub>PST</sub> them<sub>DEM</sub>  
 ‘And what about the beans and the spinach? Who ate THEM?’

Interestingly, the only permissible constituent order within each partial answer (= conjunct) is one in which the object can be realised with the rise accent. This is predicted by the combination of (5) and (6) in the context of (25).

- (26) [ Fazole]<sub>CT</sub> [ snědl]<sub>G</sub> [ Petr]<sub>F</sub> ( a [ špenát]<sub>CT</sub> [ snědla]<sub>G</sub>  
 beans<sub>ACC</sub> eat<sub>PST</sub> Peter<sub>NOM</sub> and spinach<sub>ACC</sub> eat<sub>PST</sub>  
 [ Marie]<sub>F</sub>). (OVS-OVS)  
 Mary<sub>NOM</sub>  
 ‘Peter ate the beans (and Mary ate the spinach).’

The only other constituent order (i.e., SVO) that was allowed in an answer to the object-oriented question in (14) may not be used in either a partial or a complete answer to (25)<sup>9</sup>.

- (27) #[Petr]<sub>F</sub> [snědl]<sub>G</sub> [fazole]<sub>CT</sub> (a [Marie]<sub>F</sub> [snědla]<sub>G</sub> [špenát]<sub>CT</sub>).  
 (SVO-SVO)

Crucially, the overt realisation of either *Petr* and *Marie* or *fazole* and *špenát* in the question does not *per se* restrict the interpretation of the elements in the answer. While (26) would be infelicitous as an answer to (21), (22) would be felicitous as an answer to (25). Thus, the constituent of the answer that corresponds to the *wh*-element of the question does not have to be always interpreted as F, and the constituent of the answer that is primed by the question to be interpreted as CT does not have to be always interpreted as CT.

There are many factors that need to be controlled when considering question-answer pairs such as (25)–(22). First, subjects tend to be better topics than objects. Second, the subject is animate and the object is inanimate. Third, first names might be more easily associated with their referents than definite nouns. Given the complex interplay of these various factors, finding the answer is beyond the scope of this paper.

### 2.5 Subordination

The acceptability judgments observed above for simplex and complex answers are not preserved under subordination. The answers to questions in (7), (14), (21) and (25) can be embedded. Depending on its complexity (i.e., single-pair vs multiple-pair), the answer could be inserted into the empty slot(s) in one of the following two templates. A single-pair answer

<sup>9</sup> The sentence in (27) is perfectly grammatical, and it would be acceptable if the interpretation of the subject and the object within each conjunct were reversed (see (22)). The possibility of restructuring the discourse to accommodate such reversals is briefly considered further below.



could be inserted into the template in (28), and each conjunct of a multiple-pair answer could be inserted into the template in (29).

- (28) No. Jakub řekl, že \_\_\_\_ .  
 well Jacob.NOM say.PST že \_\_\_\_  
 ‘Well. Jacob said that \_\_\_\_.’
- (29) No. Jakub řekl, že \_\_\_\_, a že \_\_\_\_ .  
 well Jacob.NOM say.PST že \_\_\_\_ and že \_\_\_\_  
 ‘Well. Jacob said that \_\_\_\_ and that \_\_\_\_.’

What is crucial is that subordination allows only those constituent orders in which the element interpreted as CT (realised with either a level accent or a rise accent) precedes the element interpreted as F (realised with a fall accent). Subordination therefore places further restrictions on the order of constituents within the clause.

### 3 Multiple Questions: Single-Pair vs Multiple-Pair Answers

#### 3.1 Multiple Questions and Multiple-Pair Answers

Czech is a language in which all *wh*-elements are typically fronted. For present purposes, it suffices to consider multiple questions with two *wh*-elements. Interestingly, the questions in (7) and (14) can form different strategies to answer the common super-question below.

- (30) Kdo co snědl?  
 wh<sub>NOM</sub> what<sub>ACC</sub> eat<sub>PST</sub>  
 ‘Who ate what?’

In an attempt to answer the above question, the speaker can select from two different sortal keys. The answer might be ordered by ‘individual’ (see (31)) or by ‘dish’ (see (32)). Note that, in each case, one constituent of the answer that corresponds to a *wh*-element of the question is interpreted as CT.

- (31) [ Petr]<sub>CT</sub> [ snědl]<sub>G</sub> [ fazole]<sub>F</sub>.  
 Peter<sub>NOM</sub> eat<sub>PST</sub> beans<sub>ACC</sub>  
 ‘Peter ate the beans.’

- (32) [ Fazole]<sub>CT</sub> [ snědl]<sub>G</sub> [ Petr]<sub>F</sub>.  
       beans<sub>ACC</sub> eat<sub>PST</sub> Peter<sub>NOM</sub>  
       ‘Peter ate the beans.’

It is also possible to provide one of the following sentences as an answer to the question in (30).

- (33) [ Petr]<sub>CT</sub> [ snědl]<sub>G</sub> [ fazole]<sub>F</sub> ( a [ Marie]<sub>CT</sub> [ snědla]<sub>G</sub>  
       Peter<sub>NOM</sub> eat<sub>PST</sub> beans<sub>ACC</sub> and Mary<sub>NOM</sub> eat<sub>PST</sub>  
       [ špenát]<sub>F</sub>). (SVO-SVO)  
       spinach<sub>ACC</sub>  
       ‘Peter ate the beans (and Mary ate the spinach).’
- (34) [ Fazole]<sub>CT</sub> [ snědl]<sub>G</sub> [ Petr]<sub>F</sub> ( a [ špenát]<sub>CT</sub> [ snědla]<sub>G</sub>  
       beans<sub>ACC</sub> eat<sub>PST</sub> Peter<sub>NOM</sub> and spinach<sub>ACC</sub> eat<sub>PST</sub>  
       [ Marie]<sub>F</sub>). (OVS-OVS)  
       Mary<sub>NOM</sub>  
       ‘Peter ate the beans (and Mary ate the spinach).’

Regardless of which strategy is selected, the initial element within each partial answer may not be realised with a fall accent. This is a good indication that it is not interpreted as F.

### 3.2 *Switching the Sortal Key*

It was shown above that an answer to the question in (30) might be ordered by ‘individual’ (see (33)) or by ‘dish’ (see (34)). In addition, it is also possible to answer (30) by conjoining partial answers with different sortal keys<sup>10</sup> (see (35)).

- (35) [ Petr]<sub>CT</sub> [ snědl]<sub>G</sub> [ fazole]<sub>F</sub> a [ špenát]<sub>CT</sub> [ snědla]<sub>G</sub>  
       Peter<sub>NOM</sub> eat<sub>PST</sub> beans<sub>ACC</sub> and spinach<sub>ACC</sub> eat<sub>PST</sub>  
       [ Marie]<sub>F</sub>). (SVO-OVS)  
       Mary<sub>NOM</sub>  
       ‘Peter ate the beans and Mary ate the spinach.’

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<sup>10</sup> Given the combination of (5) and (6), the sortal key has to be different for each conjunct in (35).

The possibility of changing the sortal key was noted in Wagner (2012), who argued against the analysis of parallel examples by Neeleman and van de Koot (2008) as involving a switch in the relative ordering of constituents interpreted as CT and F. The sortal key can be switched most easily if the question is general enough not to prime the answer to follow the ‘by-individual’ or the ‘by-dish’ strategy. More concretely, it would not be ideal to use (35) as an answer to (21) or (25).

The fact that the sortal key can be switched poses problems for any analysis that imposes strict interpretive correspondence between the elements of each partial answer. According to Büring (to appear), for instance, the CT alternatives for the two conjuncts in (35) would be *What did x eat?* and *Who ate y?*, respectively. However, the meanings of *What did x eat?* and *Who ate y?* are not compatible in the sense that the former cannot be taken to be an alternative for the latter, and *vice versa*. In other words, the additional layer of semantic embedding (that turns a set of propositions into a set of simple questions) prevents the propositions expressed by the two conjuncts in (35) from being alternatives. However, (4) does not place any such restrictions on the alternatives; on the contrary, the acceptability of (35) in the context of (30) is predicted. This is so, because the answers to *What did x eat?* and *Who ate y?* count as partial answers to the question in (30).

Given the possibility of switching the sortal key, it could be proposed that the elements interpreted as CT must be ‘given’ in the sense of Chafe 1976: p.30.

(36) GIVEN

Given information is that knowledge which the speaker assumes to be in the consciousness of the addressee at the time of the utterance.

This formulation of givenness encompasses PERTINENCE and IDENTIFIABILITY mentioned in the definition in (3): the speaker may assume that only the elements that are in the consciousness of the addressee are both ‘pertinent’ and ‘identifiable’<sup>11</sup>. In the light of the above, consider the following question<sup>12</sup>.

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<sup>11</sup> INDEPENDENCE, which is also mentioned in the definition in (3), is an independent property of question-answer pairs. A partial answer to a question must neither entail nor

- (37) Kdo se kdy narodil?  
 who CL<sub>REFL</sub> when born  
 ‘Who was born when?’

Speaker B does not consider the two dates to be in the consciousness of Speaker A at the time the answer is uttered. This explains why (38) can, and (39) cannot, serve as a felicitous answer to (37).

- (38) [ Petr]<sub>CT</sub> se narodil [ 1. října]<sub>F</sub> a [ Marie]<sub>CT</sub>  
 Peter<sub>NOM</sub> CL<sub>REFL</sub> born 1st October and Mary<sub>NOM</sub>  
 se narodila [ 31. ledna]<sub>F</sub>.  
 CL<sub>REFL</sub> born 31st January  
 ‘Peter was born on the 1st of October, and Mary was born on the  
 31st of January.’

- (39) #[ 1. října]<sub>CT</sub> se narodil [ Petr]<sub>F</sub> a [ 31. ledna]<sub>CT</sub>  
 1st October CL<sub>REFL</sub> born Peter<sub>NOM</sub> and 31st January  
 se narodila [ Marie]<sub>F</sub>.  
 CL<sub>REFL</sub> born Mary<sub>NOM</sub>

However, if the context comprised (a mention of) the possible dates of birth of the relevant individuals, then (39) would be a perfectly felicitous answer to (37). Buring (to appear) uses a similar example to show that there exists an asymmetry between CT and F. However, it seems that what needs to be ‘pertinent’ and ‘identifiable’ is the element interpreted as CT rather than the alternative of the sentence that contains it. Thus, only the element that might be interpreted as G might be interpreted as CT<sup>13</sup>.

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contradict any other partial answer to that question. This is a general property of question-answer pairs, which holds independently of the analysis proposed here.

<sup>12</sup> The question used below is assumed to be uttered in the following context: Disregarding Speaker A and Speaker B, there were >2 individuals (Peter, Mary, Jacob), all of whom were familiar to Speaker A and Speaker B. Speaker A did not know who was born when, and Speaker B supplied this information.

<sup>13</sup> Interestingly, syntactic elements such as ‘nobody’, ‘tomorrow’, ‘quickly’, as well as ‘sentential subjects’ cannot be (easily) interpreted as Ts. However, given the right context, all these elements can be interpreted as CTs in Czech, because they can be easily contrasted with other similar elements.

#### 4 Topicalisation

Topicalisation of the element that is interpreted as CT is readily available in the second conjunct of an embedded coordinate structure.

- (40) Jakub řekl, že [ Petr]<sub>CT</sub> [ snědl fazole]<sub>F</sub>, a  
 Jacob<sub>NOM</sub> say<sub>PST</sub> že Peter<sub>NOM</sub> eat<sub>PST</sub> beans<sub>ACC</sub> and  
 [ Marie]<sub>CT</sub> že [ snědla]<sub>G</sub> [ špenát]<sub>F</sub>.  
 Mary<sub>NOM</sub> že eat<sub>PST</sub> spinach<sub>ACC</sub>  
 ‘Jacob said that Peter ate the beans, and that Mary ate the spinach.’

This movement operation is generally disallowed in the first conjunct; regardless of whether CT in the second conjunct is topicalised or not.

- (41) \* Jakub řekl, [ Petr]<sub>CT</sub> že [ snědl fazole]<sub>F</sub>, a  
 Jacob<sub>NOM</sub> say<sub>PST</sub> Peter<sub>NOM</sub> že eat<sub>PST</sub> beans<sub>ACC</sub> and  
 ([ Marie]<sub>CT</sub>) že ([ Marie]<sub>CT</sub>) [ snědla]<sub>G</sub> [ špenát]<sub>F</sub>.  
 Mary<sub>NOM</sub> že Mary<sub>NOM</sub> eat<sub>PST</sub> spinach<sub>ACC</sub>  
 ‘Jacob said that Peter ate the beans, and that Mary ate the spinach.’

Interestingly, certain predicates that express some sort of ‘emphasis’ are marginally compatible with topicalisation in the first conjunct<sup>14</sup>.

- (42) ?? Jakub si stěžoval, [ Marie]<sub>CT</sub> že [ ho]<sub>G</sub>  
 Jacob<sub>NOM</sub> CL<sub>REFL</sub> complain<sub>PST</sub> Mary<sub>NOM</sub> že he<sub>ACC</sub>  
 [ nemiluje]<sub>F</sub>, a ([ Lucie]<sub>CT</sub>) že ([ Lucie]<sub>CT</sub>) [ ho]<sub>G</sub>  
 not-love<sub>PRS</sub> and Lucy<sub>NOM</sub> že Lucy<sub>NOM</sub> he<sub>ACC</sub>  
 [ ignoruje]<sub>F</sub>.  
 ignore<sub>PRS</sub>  
 ‘Jacob complained that Mary does not love him and that Lucy ignores him.’

<sup>14</sup> Native speakers differ in the degree to which they accept the topicalised element to intervene between the subordinating predicate and the particle *že*. This movement operation results in strong markedness, which might explain why, even though not completely ungrammatical, examples such as (42) are not productive in contemporary Czech.

While possible, this type of topicalisation seems to be highly restricted. Given this, it seems meaningful to focus only on the more productive type of topicalisation, which takes place in the second conjunct of an embedded coordinate structure.

## 5 Formalism

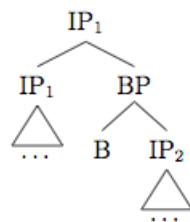
### 5.1 *Topicalisation*

Sturgeon (2008) assumes that the rise accent can be realised in SpecIP. While it remains an open question whether this is the only position in which it can be realised, the analysis proposed above is fully compatible with this assumption. Constant (2012, 2014) proposes that there is a functional projection high in the left periphery of the clause that is associated with elements interpreted as CT. At some point in the derivation, these elements must move (either overtly or covertly) into the specifier of this functional projection. He refers to this movement operation as ‘topic abstraction’. In the absence of the evidence to the contrary, the present analysis assumes that the elements interpreted as CT move to SpecIP, where they have the possibility to realise the rise accent. Whether there are cases where this movement is covert remains to be seen.

### 5.2 *Coordination*

Munn (1993) assumes that coordinate structures are hierarchical adjunct structures, and that only the first conjunct is selected by a higher functional or lexical head.

(43) An abstract representation of the coordinate structure.



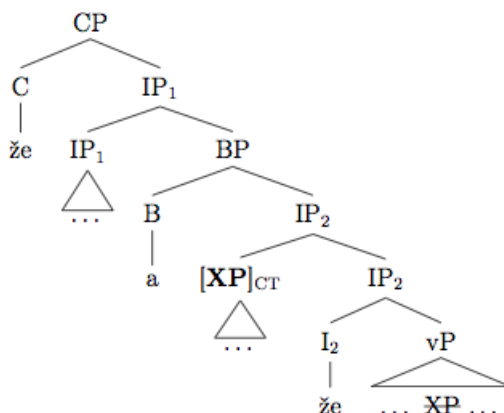
Assuming the structure above seems necessary, for, as was shown above,

topicalisation is possible only in the second conjunct if certain requirements having to do with the licensing of CT are met. This asymmetry is expected if it is only the first conjunct that is selected by the embedding predicate.

### 5.3 Subordination

Kaspar (2016) argues that the particle *že* can appear in I or C. Given the assumption that the element interpreted as CT moves to SpecIP, the emerging picture is one where the embedded coordinate structures similar to (40) are represented as follows.

- (44) A more detailed abstract representation of the coordinate structure.



## 6 Conclusion

A number of conclusions can be drawn from the relatively large data sample presented above. Perhaps the most crucial one is that the distribution of the information-structural category CT is restricted by the following rules (repeated from above).

- (4) CT-INTERPRETATION (ALL LANGUAGES)  
The expression that contains CT is a partial answer to a question that requires a multiple-pair answer.

- (5) CT-PRESENCE (ALL LANGUAGES)  
A partial answer to a question that requires a multiple-pair answer must contain an element interpreted as CT.
- (6) CT-REALISATION (CZECH)  
The element interpreted as CT must (have the possibility to) realise a rise accent.

The rule in (4), which is itself rooted in the rule in (5), is motivated by the need to explain a number of apparent mismatches in question-answer congruence (i.e., (25)–(22)), and the possibility of switching the sortal key from conjunct to conjunct (i.e., (30)–(35)). The rule in (6) is motivated by the restricted distribution of CT and F in coordinated structures, and by the observation that CTs are typically realised with the rise accent.

Crucially, topicalisation in coordination under subordination can target elements interpreted as CT. Modulo the syntactic and semantic restrictions, an element interpreted as CT may precede *že* in the second conjunct, but not in the first conjunct. The syntactic structure must reflect this fact. The most convenient solution is to treat coordination as adjunction. The element preceding *že* in the second conjunct is in SpecIP, which is a position that has been independently argued to allow the realisation of the rise accent. The possibility of moving an element with a different information-structural status in front of *že* is hard to test, because it is difficult to restrict the interpretation and at the same time control for a number of possible interfering factors (e.g., prosody, re-interpretation). However, the proposed analysis makes clear predictions, which makes it possible for one to test its adequacy against various data from different languages.

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