Discourse Marking in French: C Accents and Discourse Moves

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Abstract

It is currently assumed that the prosodic realization of utterances is sensitive to the Ground/ Focus articulation. However, the discourse thematic organization also plays a crucial role : in German and English, a specific category of pitch accent does play a role in marking discourse move (see [11] and the analysis of B accents in [5]). In this paper, we investigate how discourse moves are expressed in French, in particular prosodically.

1. Introduction

Taking stock of analyses of German and English intonation, Büring proposes that intonation articulates two marking systems: F-marking and T-marking (see [4] and [5]). F-marking is correlated to the Ground-Focus articulation (henceforth GFA) and T-marking to discourse moves. Here we focus on T-marking in French. We show that T-marking obtains in French and we present a preliminary study of its prosodic realization. The study has two aims:

• to clarify the use and meaning of a type of accent which is not related to the marking of informativeness in utterances, and
• to show that GFA is not the sole factor involved in utterance intonation.

2. What is T-Marking

Büring observes two types of question-answer pairs (henceforth Q/AP). In the former, the answer directly resolves the answer (see (1));

(1) Q: Was hatten die Popstars an?
What did the pop stars wear?
A: Die Popstars trugen [KAFTan]e
The female pop stars wore caftans

In the latter, the question indirectly resolves the question. The question brings up a "pop singer - clothing" issue, the answer brings up a "female pop singer - clothing" issue (see (2));

(2) Q: Was hatten die Popstars an?
What did the pop stars wear?
A: Die [WEIBlichen]e Popstars trugen [KAFTan]e
The female pop stars wore caftans

He embeds the observation in an explicit model of discourse (see [13]). Taking up an idea from the pragmatic tradition, he models the discourse as a chain of questions and answers. Questions shape up discourse topics (henceforth DT); questions may remain implicit in actual discourses.

Direct answers (resolving directly a question) are instances of a simple discourse strategy; Q/AP in (1) illustrates such a case. Indirect answers (partially resolving a question) are instances of a complex discourse strategy; they introduce an implicit question they resolve and thus change the current discourse topic. Q/AP in (2) illustrates such a strategy : the initial question (noted IQ) is partially resolved via an implicit question (a move) which is subordinated to IQ (Q + Q + A) as shown in (3):

(3) IQ: Que portaient les chanteuses pop?
SubQ: Que portaient les chanteuses pop?
A: Les chanteuses pop portaient des caftans.

An important clue for the analysis is the fact that answer (3.A) does not close the search for information about the "pop singer-clothing" issue; it calls for a continuation (what about male pop singer?, etc.). We call this strategy a downwards discourse strategy; the DT bringing up a "pop singer-clothing issue" is split into sub-DTs. The reverse move (an upwards discourse strategy) obtains when a given answer may be analyzed as resolving a superordinate question as in (4):

(4) SupQ: Que fumaient les Beatles?
IQ: Que fumaient les chanteurs pop dans les années soixante?
A: Les chanteurs pop fumaient du haschisch.

In this case, the answer brings about an enlargement of the DT (from a "Beatles-smoking material" issue to a "singers-smoking material" issue). Pragmatically, it calls for the closure of the Discourse Topic. Relevant for our study is the observation that in (2) weiblichen is accented: a rising pitch accent is realized on the first syllable of the lexical item (see [4]: 53). Moreover, it has to be accented. Thus, accentuation of the item which signals the recourse to a complex (downwards) strategy is obligatory in German and, by the same token, must be accounted for in the grammar of this language.

Büring calls the constituents (XP) bearing the T-accent S-topics. In order to clarify the prosody/discourse interface and to avoid any confusion with the usual notion of topic, we make the following distinction:

• T-exponents are XPs bearing T accents, and
• thematic shifters (henceforth : ST for shifteur thématique) are XPs signaling a complex discourse strategy, i.e a discourse move.

3. Evidence for T-marking in French

We observe that a complex strategy is signaled in French as well. Taking up an analog of example (2), we observe that an accent is realized on ‗anglais‘ or on the head of the NP
As for C accents on focalized XPs, C accent is obligatory on Bernard in (11) if a contrastive move is intended, whereas they are not in (10).

4. Discourse rules for T-marking in French

Now, we characterize the relation between the occurrence of a C accent and the reshaping of the question (and the DT), i.e. being a C accent exponent and being a thematic shifter. As (9) suggests, not all C-exponents are thematic shifters. The two following generalizations (given in (12)) account for the distribution of C accents in French:

(12) Localization:
  a. C accents occur in the presence of a complex downwards strategy.
  b. C accents are borne by XPs instantiating some variables in the question.

We have to define the notion of instantiation in (12.b). Consider again (5) and (6) and be more precise. It is usual to analyze a question as an open proposition, i.e. a set of propositions in which an element is a variable. Formally, the analysis of (5), repeated in (13) may be explicated as (13b) or (13c):

(13b) : (13b) is given in an intensional notation (an open proposition)
(13c) : (13c) is given in an extensional notation (an open proposition)

In (13b) and (13c), the variable corresponds to what will be the focus in the answer, in others words here, what is smoked. In the case of a complex strategy, with a discourse move, two distinct variables are instantiated in the partial answer: a variable which reflects the partition of the DT and a variable which corresponds to the piece of information the speaker is searching for. We call the former thematic instantiation and the latter focal instantiation.

Take again the rock singer example. When the answer of (13) is (14), then there are two elements which vary: the nationality of the singers and what is smoked.

(13) a. Que fumaient les chanteurs de rock?
   b. \( \lambda x \exists y (\text{chanteur-de-rock}(x) \rightarrow \text{Fumer}(x,y)) \)
   c. \( \exists y \forall x ((\text{chanteur-de-rock}(x) \rightarrow \text{Fumer}(x,y)) \land \text{anglais}(x)) \)

In (13b) and (13c), the variable corresponds to what will be the focus in the answer, in others words here, what is smoked. In the case of a complex strategy, with a discourse move, two distinct variables are instantiated in the partial answer: a variable which reflects the partition of the DT and a variable which corresponds to the piece of information the speaker is searching for. We call the former thematic instantiation and the latter focal instantiation.

Paradigmatic examples of such questions are given in (14) where the variable corresponds to the answer.

(14) Les chanteurs de rock ANglais fumaient des cigarettes

The partial answer (14) introduces the implicit question (15a), which is a sub-question of the more general question (15b).

(15) a. Que fumaient les chanteurs de rock anglois ?
   b. Que fumaient les chanteurs de rock de chaque nationalité ?

"Anglais" is the instantiation of the predicate variable P in "de nationalité P". Questions (15a) and (15b) receive the analysis in (16a) and (16b):

(16a) \( \lambda x \forall y ((\text{chanteur-de-rock}(x) \land \text{anglais}(x)) \rightarrow \text{Fumer}(x,y)) \)
(16b) \( \lambda y \lambda P \exists x ((\text{chanteur-de-rock}(x) \land \text{nationalité}(P)) \rightarrow \text{Fumer}(x,y)) \)
5.1. C accents and other pitch prominences

C accents are usually realized on the first syllable of the thematic shifters or on the head of the XP in which the ST occurs (see 5 and fig.1). In some cases, they might also be realized on both elements of the XP (see fig.2) : a prosodic “arc” is realized over the whole XP (see [14]). C accents have the following acoustic features:

- a sharp rise of F0,
- a lengthening of the onset of the accented syllable;
- a rise of intensity.

As there are other melodic movements on the initial syllable of lexical words in French, it is important to distinguish them from C accents. In French, an initial rise may be realized at the beginning of an utterance or of an Intonational Phrase (see [6] and [14] among others). This rise differs from C accents as follows:

- the High target may be reached on the second syllable in case of an initial rise, while it is usually reached at the end of the nucleus for C accents.
- the initial rise is characterized by a melodic movement, but intensity and duration remain usually unchanged. By contrast, C accents are realized with a lengthening of the syllable onset and a relatively important rise in intensity.
- The initial rise is optional and can be realized on a function word, which is apparently impossible for C accents.

C accents also differ from secondary stresses realized on the initial syllable of lexical word: the melodic movement of C accents is more important than that of secondary stresses. C accents also differ from ‘accents d’insistance’: the lengthening of the syllable onset is usually more important in this latter case.

### 5.2. Realizations of C accents

It is a well established fact that prosodic events are highly sensitive to the GFA and that their prosodic realization may differ in pre-focus, focus and post-focus ‘fields’: in post-focus sequences, for instance, the pitch range is more compressed. Thus, we expect C accents to be realized differently according to their location in the utterance.

In the pre-focus part of the utterance, C accents are realized by an important melodic movement, as the H tone reached the top of the speaker’s range. When the word bearing a C accent has two syllables and when a H% boundary tone (continuation rise) has to be realized for syntactic reasons on the second syllable, the realization of the continuation may be inverted: pitch drops or remains level (noted here H↓%). (21) is an example of such realization that has also been mentioned by Rossi (see [14]).

(21) Qu’est-ce que fumaient les chanteurs de rock dans les concerts des années 70 ?
Les anglais de la marijuana et les français de la cocaïne. (see fig. 3)
(les AN glais) H↓% (de la marijuana)]…… H*

In focus constituents, C accents are also realized by an important pitch rise on the first syllable of the lexical word (or of the head) of the XP. Duration of the onset is usually lengthened and intensity is augmented.

The realization of C accents in post-focus field is different from the typical realization of accents. As pitch range is usually compressed after focus (see among others [2], [6], [10]), C accents cannot be realized with an important pitch rise. In this case, C accents are characterized by a rise of intensity or a lengthening of the onset. The presence of the rising melodic movement (H* tone) can be observed in the realization of the post-focus sequence: the post-focus sequence is not realized by a low plateau (indicating the presence of a L target just after the focus constituent), but by a continuous fall (cf. example (22) and fig. [4]).

(22) Qu’est-ce qu’il fume ?
Il fume des cigarettes le dimanche.
(il fume) (des cigarettes) L% (le DI manche) L]
H*

### 6. Conclusion

We have provided evidences for T marking in French. T marking is observed in presence of a complex strategy. It signals the enlargement, the narrowing down or the shifting of the current Discourse Topic. T marking in French abides to the same discourse trigger than German or English T marking.
even though the fine grain rules for its realization may be different across those languages. The crucial theoretical import of T marking is that accentuation may be sensitive to discourse moves and not to the informative contribution of the utterances to the context. By the same token, the analysis of intonational marking should not be restricted to GFA. We expect that T marking has an impact on word order as well; the preverbal/postverbal variation in Romance Subject placement is a case in point (see [12]).

7. References


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Footnotes:

1 Büring calls (2) a case of partial topics. He considers also what he calls contrastive topics and purely implicational topics (see [4]: 56).

2 In [4] and [5], the T-accent of German is identified with the B-accent of English (as recognized by [3], [8] and [13]).

3 Furthermore, if we accept the idealization that Q/APs provide a model of discourse topics in general (idealization currently made in pragmatic approaches to discourse), we are in a position to account for accentuation of utterances occurring in continuous discourses.

4 A topic in the current acceptation is the individual about which the discourse holds. As our description above makes explicit, the TD in the Q/APs we use for illustration, cannot be modeled as an individual, but as the properties of individuals or the relation holding between individuals (e.g. singers, pieces of clothing). In formal semantics, it will be represented as a question, i.e. as a set of propositions.

5 Why such a label? The accent we observe in (5) bears a pragmatic resemblances to English B accents and German T accents, but we did not want to imply that their fine grained prosodic and pragmatic features are identical.

6 Here we have a partitioned meaning approach to GFA. The first proponent of such an approach is Jacobs ([7]). It has also been developed in [1] and [2] recently.

7 Note that (10) may be analyzed as involving a complex strategy (who came? / who does not come?).

8 Here we leave aside the occurrence of C accents in questions: as our preliminary survey shows, they do appear in questions. Nothing in the analysis we adopt prevents them from doing so: they appear in explicit sub-questions (in the discourse perspective). Surprisingly, Büring reports that T accents do not occur in question in German. We do not know whether this limitation is due to a feature of German or to a limitation of Büring's analysis.

9 Büring proposes the following generalization for T accents in German: “[accent] T is chosen in the presence of a [complex] strategy, but it will be obligatory only if it serves to mark non-Given elements at the same time” (see [98]: 51).

10 We are not yet in the position to specify the parameters of this choice. It requires an extended observation of actual discourses.