



HAL
open science

The epistemological treatment of information and the interpersonal distribution of belief in language: German Modal Particles and the typological challenge

Pierre-Yves Modicom

► **To cite this version:**

Pierre-Yves Modicom. The epistemological treatment of information and the interpersonal distribution of belief in language: German Modal Particles and the typological challenge. W Abraham, E Leiss. *Modality and Theory of Mind elements across languages*, Berlin etc.: De Gruyter (Trends in Linguistics – Studies, 2012, 9783110270198. 10.1515/9783110271072.361 . hal-02860122

HAL Id: hal-02860122

<https://hal.science/hal-02860122>

Submitted on 24 Jul 2021

HAL is a multi-disciplinary open access archive for the deposit and dissemination of scientific research documents, whether they are published or not. The documents may come from teaching and research institutions in France or abroad, or from public or private research centers.

L'archive ouverte pluridisciplinaire **HAL**, est destinée au dépôt et à la diffusion de documents scientifiques de niveau recherche, publiés ou non, émanant des établissements d'enseignement et de recherche français ou étrangers, des laboratoires publics ou privés.

The epistemological treatment of information and the interpersonal distribution of belief in language: German Modal Particles and the typological challenge

Pierre-Yves Modicom

Abstract

The present chapter contains a discussion of the links between the different domains of the epistemological treatment of information in speech and discourse. It is based on a confrontation of concepts coined by Guentchéva & Landaburu (2007) with a set of German modal particles. According to Guentchéva & Landaburu, Theory of Mind is part of a wider domain of “epistemological treatment of information” together with mirativity and evidentiality. The concepts created by typologists are used to describe the distribution of modal functions between a few German modal particles examined in pairs. Both components of each pair have the same value in terms of Theory of Mind. The analysis makes the case for an internalist, monosemantic description of the meaning of those particles. Their different values in context are postulated to be inferable from the combination of their core meanings with other syntactic and illocutionary parameters.

It is finally shown that the complex meaning of German modal particles is best accounted for in a triangular framework including Theory of Mind, mirativity, and evidentiality as the permanent parameters followed by the speaker to track the distribution of knowledge between herself and the hearer.

1. Introduction

German Modal Particles (henceforth GMPs) are short, uninflected words with specific distributional properties and a modal meaning. Among other specificities, they are morphologically identical with lexemes belonging to other morphosyntactic categories like, for instance, “yes” (*ja*), “well” (*wohl*), “plain” (*eben*). They have now been intensively investigated for four decades, following Weydt’s first monograph on this topic in 1969. GMPs are now widely considered to encode (at least parts of) the felicity conditions of the utterance they form part of. They do not contribute to the propositional content of the utterance; rather, they seem to intervene in the interaction between speech act participants (see Abraham 1991a).

Two central interpretation factors have been proposed so far to characterize their pragmatic contribution. On the one hand, they encode what the speaker knows to be the state of her own knowledge and often what she assumes the hearer’s propositional attitude to be. On the other hand, they also seem to contribute to the overall politeness and vivification of the exchange. The latter interpretation can easily be shown to follow from the first: The fact that the speaker takes into consideration what she assumes to be her partner’s state of knowledge is a signal of willingness to cooperate. According to this interpretation, GMPs are fundamentally related to Theory of Mind. Nevertheless, research on this field (see Zimmermann 2008) has also shown how those particles interfere with the speaker’s truth-functional evaluation of the propositional content of her utterance.

Apparently, GMPs do not mark the sole intersubjective distribution of knowledge. They are not restricted to the first or second persons, but also encode the third-person status assigned to the propositional content: What matters is not only whether the speaker or the hearer had knowledge of the proposition before or whether they could have expected it, but also with which value it was or will be part of the common knowledge ground.

So far, GMPs seem to be related to both Theory of Mind and the truth functional evaluation of the propositional content. Both dimensions constitute the topics of the present study. Independently, the question of the borders and bridges between the subdomains of knowledge evaluation has often been addressed by typologists in the last years, (see Evans 2007, 2009 and Landaburu & Guentchéva 2007). The aim of the present paper is to show how some of these typological attempts of definition and delimitation are worth comparing with data provided by GMPs. Those observations might match up with the domain of Foreign Conscience Alignment (FCA, see Abraham 2010 and this volume), defined as a global theory of three-person epistemic alignment in the scope of Theory of Mind and of Donald Davidson’s theory on the triangulation of knowledge, where language also plays a key role (see Davidson 2001c).

2. A typological account for the epistemological treatment of information

2.1. The realm of information treatment

In the foreword to their typological overview, Landaburu & Guentchéva (2007: 1–3) introduce a set of definitions based on their works as well as on previous literature. They first discuss the concept of *médiation* (or *énonciation médiatisée*, litt. “mediated utterance”), which corresponds

to what is usually called evidentiality. According to them, it regroups all phenomena marking reported speech, hearsay, inferential knowledge and indirect knowledge of any kind. The paradigm of knowledge sources plays a key role in the context of evidential characterization, but in many languages, this domain seems to have relations to other questions such as assertive commitment or modality. Following Chung & Timberlake (1985), Landaburu & Guentchéva (2007: 2) subsequently propose to define a broad category of “epistemological treatment of information” covering the whole realm of “the grammatical expression of the qualities which the speaker assigns to her own knowledge of the information she is transmitting”.

This domain has to be divided into three parts: The first of them deals with the speaker’s expression of her commitment to the propositional content of the utterance. As such, it is closely related to epistemic modality as well as to what the authors consider to be the “intersubjective relation between the speaker and the co-speaker”. There are thus two branches in this first domain: The scale of commitment on the one hand, and Theory of Mind on the other. The second domain is that of evidentiality *stricto sensu*: It highlights the conditions under which the speaker has acquired the piece of information she is transmitting, and especially the source of that knowledge. Both dimensions have been treated separately by typologists for many years now. A third dimension has been addressed more recently and is still being discussed: that of expectability or surprise, whose autonomy as “the mirative” has been advocated by De Lancey (2001), mainly on the basis of Tibetan data.

2.2. Illustration from Andoke

The division between the first and the second type is illustrated by Andoke, the Columbian language studied by Landaburu. In this language, the subject of the verbal predicate is always encoded by a personal marker to the left of the verb. TAM categories are distributed between this subject marker and the verbal lexeme. The verb is morphologically marked for aspect and its inflection varies according to the mood (*Realis* vs. *Irrealis*).

Tense, modality and optionally prospective modality are marked by suffixes at the very end of the subject lexeme. At this stage, the propositional content is defined in the real world and can already be granted a truth value. There is still no FCA marker and at the same time no illocutive force has been assigned to what is not an utterance yet, but can already be used as a subordinate clause. Following Dik’s model (see Dik 1989), Landaburu explains that what is now at stake is the closure of the proposition and its transformation into a felicitous utterance. This is coded in two distinct ways corresponding to the first two epistemological domains: A commitment prefix has to be added to the subject for the sentence to be grammatically acceptable as a main or a free clause, and an optional evidential suffix might come immediately after the core morpheme of the subject lexeme.

(1) dui² ʌʌ bə dəäʌ

“White people are coming” (Landaburu 2007: 24)

The structure of this sentence can be analyzed as follows:

dui'AtA	b-	ë	-Ø	-(Ø)	-Ø	dä-	ë-	Λ
White:PL (CLASS.3-3)	b-	SUBJ:CLASS.3-3	DIR.EXP	NPOT	PRES	INGR	move	AGR:CLASS3
(Noun)	COM	SUBJECT.TRACE	EVID	POT	TENSE	ASP	(Verb)	AGREEMENT
NP	SUBJECT					VP		

There are five possible commitment markers. The standard one, standing for strong commitment, is *b-*. When the speaker assumes that the hearer has no possibility to know whether she is saying the truth, she might use *ke~-*, which marks that the speaker has the monopoly of knowledge; the hearer is reported to have no access to the described matter of facts, whereas the speaker is strongly committing herself to her utterance. The marker *ba~-* is used when the speaker is questioning herself on the validity of what she is saying, and *k-* and *d-* mark the fact that the speaker

- (i) does not know of the truth of what she is saying and
- (ii) assumes that the hearer has more to say on this topic.

Building sentences with one of those markers as commitment prefixes is the normal way to form a question in Andoke, without further syntactic changes. The marker *k-* stands for global interrogation, whereas *d-* restricts the focus of the question to one argument of the predicate. It is therefore possible to arrange those markers along a scale representing how the speaker evaluates her own knowledge, with *ke~-* at the top and *k-* at the bottom. Yet, as Landaburu puts it, another classification is more relevant, based on Theory of Mind and reproduced in the following chart:

If one wants to take into account the complexity of the encountered phenomena, one should integrate the intersubjective relationship within the basic oppositions and arrange the values of the four prefixes alongside two polar axes dealing with the speaker's knowledge as well as with the I/You-connection. [. . .] Together with the speaker's knowledge, what is at stake here is thus the relationship of epistemic authority between the speaker and the hearer (Landaburu 2007: 30).

	[+Know; I]	[-Know; I]
[+Know; You]	b-	k- / d-
[-Know; You]	<i>ke~-</i>	<i>ba~-</i>

This account makes the case for the decisive role of FCA in language, in as much as the utterance is grammatically incorrect if there is no overt coding of the speaker's FCA-stance.

Illocutive force is defined as the speaker's concern with the integration of the propositional content of her utterance in the common knowledge ground of the speech act participants.

Interestingly enough, evidentiality appears as a secondary category in Andoke: It is overtly marked only if the direct source of knowledge is not the speaker's own experience, but hearsay (-há-) or rational inference (-dî-). It might also be derived from morphemes originally coding FCA: *Bâ* can appear before the speaker-affirmative FCA-markers *b-* or *kê-* and turn the proposition into a postulate, the combination FCA-FCA can be understood as EV-FCA.

According to Landaburu (2007: 43), there are as many intersubjective commitment markers as illocutionary independent clauses, and no more. For instance, in a relative clause, the subject lexeme is only deprived of its commitment marker, whereas the subject of the main clause presents all the usual morphemes. This syntactic data leads Landaburu to make the case for a hierarchy of morphemes with intersubjective commitment markers at the top, corresponding to Dik's fifth and last level of constitution. This empirical data corroborates Landaburu & Guentchéva's theory on the subdivision of epistemological patterns, which was then commented upon by Evans (2009). Evans uses the concept of *engagement*, re-using the French word used by Landaburu, which has been translated in the present summary (as is usual) by "commitment". Generalizing data from several languages and authors, Evans (2009:2f.) defines engagement as "the mental directedness of speech act participants towards a denoted state of affairs", involving four parameters: the "type of cognitive modality"; the "cognitive locus" (defined as the speaker, the hearer or a third party and "including speaker's model of the hearer, presumed mutual-knowledge based representations, etc."); the "domain", roughly corresponding to the scope of the engagement marker; and the "main vs. complement status of the marked proposition."

Even though Theory of Mind is but one of four criteria in this representation, it still plays a decisive role which is all the more crucial for the purpose of this paper since Evans explicitly quotes the GMP *doch* as an example of such an "engagement marker" in Western European languages. Indeed, GMPs are often supposed to mark assumed intersubjective states of knowledge and to have a wide scope over the whole propositional content. It might therefore be relevant to take the data from Landaburu & Guentchéva as a challenge, and to try to apply typologically obtained categories to GMPs. A restriction which we shall observe in the comparison of GMPs with these concepts is the fact that they primarily insist on the sharing of positive knowledge, i.e. on whether the information is assumed to be known or not to the speech act participants. In the present paper, what will be focused on is rather the question of whether the propositional content is part of the participants' set of beliefs, positive knowledge being a more determined kind of propositional attitude, yet always presupposing belief.¹ The present

1 As Davidson showed in his essays *Three varieties of knowledge* (Davidson 2001d) and *First-Person Authority* (Davidson 2001b), if there are good reasons to postulate that you know what you believe, estimating what is going on in someone else's head is primarily a question of what she believes (and not what she knows), i.e. to which propositions she is committing herself (given her concept of objective truth, which Davidson presents as the third-person status in the triangulation of knowledge, grounding – and at the same time being grounded on – first- and second-person stances).

paper will illustrate how GMPs fulfill this epistemological function with partially covert and diverse patterns and how FCA appears to be the unifying criterion to bring this diversity to a categorial solidarity. The following section(s) will focus on a few pairs of particles that seem to be equivalent as regards intersubjective commitment or Theory of Mind and yet differ when the whole scope of epistemological marking is concerned. The results will then be summarized and interpreted in a conclusive part.

3. *Doch* vs. *schon*

3.1. *Schon*: re-affirming potentially disputed propositions

According to Thurmair (1989: 50) *schon* (originally meaning “already”) introduces a “restriction over possible counterarguments”² which Ormelius-Sandblom (1997: 106) symbolizes as follows:

(2) λp [\neg fakt ($\neg p$)]

“it is not true that **p** is not true”

Here, **p** is the proposition over which *schon* takes scope. This may explain why *schon* is very often used with epistemic verbs, as in the expression *ich denke schon* (“I *schon* think”, meaning roughly “I believe it altogether”), or in the following example:

(3) In den größeren Städten wie Kapstadt oder Johannesburg darf man schon davon ausgehen, “In the bigger cities such as Cape Town or Johannesburg, one may *schon* suppose” dass die Stadien auch weiterhin benutzt werden.
“. . . that the stadiums will be used further on.” (DR Kultur 12th July, 2010)

Ormelius-Sandblom tends to regard *schon* as “speaker-oriented” since it encodes the attitude of the speaker towards the content of her utterance.

Nevertheless, the dialectical dimension of *schon*, which addresses possible opposition to the speaker’s assertion, could also justify an intersubjective or interpersonal interpretation. In a study on *schon*, Pérennec (2002: 191) defended the idea that the core meaning common to all uses of *schon* as a GMP, but also its use as a temporal adverb, represents the trespassing of a limit beyond which what was not true suddenly becomes real. He subsequently interprets the uses of *schon* as GMP as “hearer-oriented” and proposes the following interpretation for the use as a GMP:

Here, too, *schon* points beyond a limit, even though the limit is not designated here, be it as the utterance time thanks to deixis, be it thanks to an non-deictic adjunct. [. . .] The speaker uses as a fictive limit an element that might be called “the evaluation moment of the utterance”, following Vuillaume’s “moment of verification of the utterance”. I prefer “evaluation” rather than “verification” so as to make it clear that not only the mere truth value of the proposition is at stake, but also the relevance of an utterance or of a speech act. This moment of evaluation, which is

2 “Einschränkung möglicher Gegenargumente”

actually hearer-oriented, is hinted at by the speaker, who is putting herself in the role of the hearer. [. . .] With *schon*, the speaker makes it clear that this moment has already taken place, and that the evaluation has already given a positive result.

Commenting upon the case of assertive sentences, Pérennec writes: “From what has just been said, it is obvious that the speaker, when she marks the anticipation of the evaluation moment with *schon*, acts as the one who has knowledge as opposed to the ignoring hearer.” This overall interpretation of *schon* as the anticipation of possible doubts or reluctance of the hearer is advocated for by the DWDS dictionary, according to which *schon*, in assertive sentences, “reinforces an assertion against which a counterargument or a doubt has been expressed.”

3.2. Does *schon* restrict the validity of p?

Yet, according to some sources such as Grimm’s *Wörterbuch der Deutschen Sprache*, *schon* can also entail a restriction of the validity of **p**: Even though its first modal meaning consists in reaffirming a proposition against contrary expectations or assumed doubts,³ according to the authors of the dictionary, *schon* can also “prepare an objection or a restriction” while admitting that the proposition is basically true.⁴

In this respect, *schon* rather seems to undermine the validity of the proposition. Yet, there is a strong suspicion that this supposed other meaning actually has to be regarded as a secondary, usage-based reinterpretation in context. First of all, this apparent contradictory meaning can result from the fact that when she uses this lexeme, the speaker makes explicit that she is aware of the hearer being possibly reluctant to agree with her. This revelation pragmatically implicates that the proposition is not beyond doubt and could therefore seem to undermine it in some cases – or in Pérennec’s words, it might indicate that the validity limit has just been exceeded. But a compositional interpretation can also be proposed to solve more problematic cases, for instance those where *schon* is used in a clause before the same speaker utters a second clause apparently restricting the validity of the first one. In such cases, the authors of Grimm’s dictionary suppose that *schon* occurs in co-constructions with an adversative marker and therefore “prepares” the undermining of the proposition it is embedded in. This theory is illustrated by the following example from Lessing’s *Nathan der Weise* (1779):

(4) Nathan: Dann, Daja, hätten wir ein neues [Haus] uns / Gebaut; und ein bequemeres.
N.: “Then, Daja, we would have bought us a new one [=a house]; and a more comfortable one.”
Daja: Schon wahr! Doch Recha wär bei einem Haare mit verbrannt.
D.: “Schon true! But Recha could almost have been burnt.”
(Quotation from the WDS, Vol. 15: 1463)

3, Es wird hier eine thatsache schlechthin der gegentheiligen, anderer erwartung, ausgesprochenem oder angenommenem zweifel gegenüber hervorgehoben“ (Vol. 15, 1459–1464).

4 Coniglio (2007: 1), following Thurmair (1989: 200), also assumes that there might be such a value of “validity restriction” for *schon*.

The second speaker (Daja) might well be anticipating Nathan's re-affirmation of **p** (the fact that it would have been possible to have a new house built) being valid in spite of all counterarguments. This could suggest that the meaning of *schon* has to be reconsidered, or that it primarily corresponds to an external strategy of communication in context. Yet, another, more systematic explanation can be proposed. *Schon p, aber q* may be glossed as follows: "Indeed, in spite of all I could say to undermine it, it is not true that **p** is not true, and yet I affirm **q** in order to restrict this consensual validity to a precise domain."

Actually, **p** has already been asserted and must therefore be accepted as part of the common ground unless the second speaker strongly denies it, which she does not do here. She concedes the common ground status of **p** and then tries to restrict it with **q**. The most overt syntactic strategy corresponding to this pattern is the use of a concessive subordinate clause – inside which *schon* may occur, as explained by Coniglio (2007: 12).

(5) Hans hat sich mit Depressionen in seinem Zimmer eingeschlossen,
"Hans locked himself up in his room feeling depressed"
obgleich er das Examen schon bestehen wird.
"even though he will *schon* succeed in the exam."
(Borst 1985: 120, quoted in Coniglio 2007)

In a concessive reasoning, the acknowledgement of the validity of **p** has dramatic consequences for the following developments: If **p** is part of the common knowledge ground, its positive truth value has been endorsed by the speaker, even though she wants to present counterarguments or restrict the validity of **p**. This corresponds to the value of *schon*. The only specificity of this kind of usage is the fact that both roles are played by one and the same speaker. Nevertheless, in spite of their being uttered by the same person, the status of both asserted propositions is not identical. The *schon*-marked one has already been introduced into the common knowledge ground and has therefore the status of a third-person truth, whereas the other clause is newly asserted under first-person commitment.⁵ The apparently special value of *schon* in such contexts can be compositionally explained if we assume that the case in (4) is just an informal equivalent of an overt concessive structure such as in (5), which should be regarded as the main case for such configurations. Concessive clauses represent a case of polyphony in the sense that the conceded proposition is endorsed by the third person. This third-person status proceeds from the concessive subordination which scopes over the rest, including *schon*. In this perspective, the third person strongly commits herself to the propositional content and rejects in advance any claim that forthcoming restrictions could undermine the validity of the proposition per se. Then the main illocutive act of the first person takes scope over the third-person proposition. This first-personal act contains the assertion of those restrictions, whose domain is

⁵The sentence whose acceptance as part of the common ground is only re-asserted corresponds to the subordinate clause in the concessive sentences involving overt subordination. The newly asserted proposition gets the status of a main clause, which can be seen as the surface equivalent of its pragmatic status as main assertive goal of the utterance. Yet, both are being asserted and can therefore include a GMP. That such uses of *schon* correspond to covert subordination can be argued for on the basis of other lexical phenomena such as the grammaticalization of *obschon* as a concessive complementizer equivalent to *obwohl* and *obgleich*.

now self-limited, since the third person is nothing but a convergence of the first with the second one. This means it is not *schon* that weakens the commitment to **p**, but the overall logical relation between both propositions, which might be overtly marked by a concessive clause. The interplay between the voice of the common ground and the voice of the first person can account for such usages without externalizing the motivations for the use of *schon*.⁶ There are not two values of *schon*, but only one, which is contextually interpreted with respect to whether the proposition over which *schon* scopes conveys old or new information, or rather, whether the propositional content is already part of the assumed common knowledge ground. Thus, we can assume that *schon* always marks:

- (i) the reaffirmation of the speaker's commitment to **p**
- (ii) her assumption that the status of **p** could still be disputed by other speech act participants.

In other words, the assumed interpersonal belief coordinates in the case of *schon* are relatively similar to what we see in Andoke with *ke~*.⁷ This also makes the case for the idea that the attributed third-person value of a proposition actually proceeds from the alleged distribution of belief and authority between both speech act participants, thus making Theory of Mind a basic category for modality in general.

3.3. Introducing mirativity: the case of *doch*

Another GMP is fundamentally linked to the assumption that the hearer disagrees with the speaker, namely *doch*. In its basic, non-GMP use, *doch* is an adversative adverb meaning “nevertheless”. The GMP can be identified when there is no explicit proposition to be countered, and when the lexeme appears in the characteristic GMP position on the left part of the middle field (whereas it is generally sentence-initial as an adverb) without being accentuated (see Abraham 1991b or Coniglio 2007 for syntactic considerations). It has a clear adversative dimension, as in the following example.

(6) Ja, das ganze war ja bewusst als vertrauensbildende Maßnahme konzipiert,
“Yes, the whole thing was conceived as a measure to bring back some confidence,”
man wollte zeigen, dass die Banken doch besser da stehen,
“one wanted to show that the banks are *doch* finer”
als das was gedacht wurde, und deswegen hat man ja auch die Tests so konzipiert,
“than what people thought, and therefore, one has also conceived the tests so,”
dass manchen Risiken gar nicht aufschneiden.
“that some risks do absolutely not come into part.”(DLF, July 24th, 2010.)

6 Far from making the case for external strategies, this value of *schon* rather suggests that the personal voices at stake here are cognitive instances (analogous to the points of Davidson's triangle?) and not (or at least not necessarily) concrete persons of the external world.

7 Under the restriction named above regarding knowledge vs. belief. In a belief-based framework, we can say that *kê* is felicitous in configurations where the speaker strongly believes what she is saying and assumes that the hearer does not necessarily believe it. Thus, the opposition of standpoints is probably more emphasized in German.

It can also be used in questions or in imperative sentences (with deontic illocution). This last case exhibits the difference between *doch* and *schon*. In imperative sentences, *doch* usually manifests impatience or anger at the addressee not doing what she is supposed to do. In questions, according to the *Wörterbuch der Deutschen Sprache*, it often contains a latent reproach (see Vol. 2: 1204). Those two connotations tend to suggest that *doch* is used when the speaker expects the hearer to agree with her. Zimmermann (2011: 2015) summarizes this when he describes the triggering of *doch* as “an adversative attitude to certain background assumptions”.

An informal description would thus be that *doch* is felicitous iff:

- (i) the speaker expected the proposition to be immediately accepted by the hearer on the basis of the assumed common knowledge ground and
- (ii) the latest developments tend to suggest this expectation of hers was false: The hearer is not aware of the validity of what should have been a matter of consensus.

As a consequence, the speaker has to switch her second-person alignment from “from our common knowledge ground, my evaluation for the truth value of *p* must be shared by the hearer”, a distribution that would classically be marked with *ja*, to the *schon* distribution: “I believe *p* is true but I assume the hearer has doubts about it”.

Doch encodes this switch in Foreign Conscience Alignment: *Schon* depends exclusively on the speaker’s FCA at the moment of utterance and remains underspecified as regards the past epistemic background, whereas *doch* is specified in time and can be felicitous if and only if the belief discrepancy between both speech act participants was unexpected by the speaker.⁸ This FCA-switch is not so different from what is now generally called mirativity (after De Lancey 2001), which designates all forms where the speaker manifests that the matter of facts the proposition accounts for was unexpected for him: *Doch* marks a brutal and unexpected revision of second-person epistemic marking. This confirms Evans’ suggestion that expectation is a dimension of *engagement* and constitutes an argument for the integration of mirativity into the first pool of epistemological categories sketched by Landaburu & Guentchéva (2007).

4. The structure beyond apparent polyfunctionality of *ja*

4.1. A compositional account for *ja*’s apparent polyfunctionality

The meaning of the GMP *ja* (“yes”) has been explored quite intensively in the previous literature. Two contexts of usage are generally distinguished, depending on whether *ja* occurs in exclamative or in declarative sentences.

8 This time is not the propositional time (comparable to what narratologists call narrated time) but the speaker’s time (so-called narration time).

Ja encodes both strong commitment and the expectation that the addressee will not contradict the speaker. Given its syntax and felicity conditions, *ja* seems to occupy a very high place in the structural hierarchy, probably scoping over the illocutionary type as an assertion modifier (see Jacobs 1991: 141 sqq and Zimmermann 2008). *Ja* highlights supposed agreement between the speakers. It not only expresses that **p** is consistent with or entailed by the common knowledge ground, thus being already virtually part of it, but it generally encodes the fact that the hearer is assumed to already believe **p**. *Ja* therefore has to be defined as a marker of assumed shared commitment, or bi-affirmativity. Nevertheless, *ja* should not be regarded as a strict cross-linguistic equivalent to Andoke *b-*, which is defined by Landaburu as the default commitment prefix and which encodes a sort of bi-affirmativity only insofar as it is opposed on the one hand to particles standing for the speaker's ignorance, and on the other hand to *kê-*, which focuses upon the knowledge discrepancy in favour of the speaker. Much rather, *b-* seems to be the unmarked prefix, thus probably encoding the standard configuration of common ground compatibility and conversational cooperation, which is but a weakened form of assumed joint acceptance, the strong form being bi-affirmativity. One should not forget that in Andoke, the use of FCA markers is required for every illocutionarily autonomous sentence, whereas it is optional in German, where this underspecified type of commitment is rather expressed by the absence of a particle.

In this configuration, *ja* is rather restricted to those cases where the speaker wants to focus on the first and the second person being on the same wavelength. Yet, those cases are typically what Grice's maxim of quantity should rule out (see Grice 1975), since they just deal with redundant information. If we consider that overt Theory of Mind is not primarily an external, almost rhetorical strategy, but a systematic cognitive alignment of the epistemological coordinates of the exchange, and if we consider that Grice's conversational rules then bias the performance of this (internal) alignment, we can reduce the several values of the particle *ja* to this core bi-affirmative meaning. More explicitly, given the rule of quantity, sentences whose propositional content is not only known to both speech act participants, but also believed or known to be such are more likely to be uttered in contexts where what matters is precisely this statutory recognition as common knowledge ground. This distortion accounts for context-bound bias. For instance, corpus-based studies show a very high proportion of usages in clauses whose textual function is thematic and which are often initial concessions preceding a contradiction, or reminders introducing questions: *Ja* is used when the existence of a common knowledge ground is actually what has to be focused on rather than the propositional content in itself.

(7) Es gibt ja auch den Vorschlag, Medikamente erst mal vorläufig zuzulassen. Wäre das eine Möglichkeit?

“There is *ja* also the possibility to authorize drugs temporarily at first. Would that be a possibility?” (Bayerischer Rundfunk, Samstagsforum 12. 06. 2010)

4.2. Is there really a mirative *ja*?

Supposing pragmatic bias to interfere with an internal cognitive process can account for the supposed “other” meaning of *ja*, namely its mirative meaning in exclamations such as example (8).

(8) Das ist ja eine Unverschämtheit!
“This is ja an impertinence!”

Mirativity can be induced by the very illocutionary type of the exclamation. As was already sketched before, mirativity is not to be considered as a category in itself, but as an over-specification of FCA in first-person time. For this reason, exclamative sentences are far from exhausting the field of mirativity in German. The example of *doch* has shown that it was present in declarative sentences, and the GMP *denn* probably has to be interpreted as a mirative operator over the illocutionary type of questions, given that it indicates that the speaker did not expect to find herself ignorant (see Abraham 1991b: 210 sqq).⁹ The mirative sentences including *ja* manifest a switch in the speaker’s overall Theory of Mind. In this case, the speaker suddenly switched to a propositional attitude which she assumes must be shared by the hearer. The peculiarity of the “mirative *ja*” is due to the fact that there seems to be a second switch to explain, which regards the personal orientation of the GMP. In assertive sentences, *ja* is rather second-person oriented; the speaker tells the hearer what she assumes to be common knowledge ground (thus, *ja* is often being glossed as “the speaker expects the hearer not to contradict her”). In exclamations on the other hand, *ja* is first-person oriented: What is revised in the speaker’s FCA is her own state of knowledge, whereas the second-person status of the proposition is not (or at least not obligatorily) affected, as in the following example from Hentschel/Weydt (1994: 283), supposed to be uttered after the speaker has just eaten for the first time something cooked by the hearer, and the hearer has not expressed special concerns about her capacities as a cook.

(9) Du bist ja ein guter Koch!
“You’re ja a good cook!”

This shift of personal focus can be accounted for thanks to the proprieties of the respective illocutionary types of the sentences *ja* is embedded in. According to Grice’s rule of quality, an assertion is defined by the speaker’s commitment to a proposition, which in its turn is supposed

9 *Denn* is the basic German interrogative particle. Therefore, in terms of Theory of Mind, it might be assumed to encode a supposed distribution of beliefs where (i) the speaker has no commitment to a precise answer to the question she asks; (ii) she assumes that the hearer could possibly know more about it. If we regard questions as sets of propositions, this means that the speaker does not know which proposition of the set would be a true belief, but she assumes the hearer could have reduced this set of propositions to one token corresponding to her belief, which the speaker could subsequently also commit herself to. Nevertheless, the use of GMPs being always optional, the question of what *denn* brings to such an FCA-configuration can be raised, since it could actually fit for any interrogative clause. Commenting on the sentence *Wo ist denn meine Brille?* Abraham (1991: 4) suggests that “in using the original con-junction *denn* in the middle field, the speaker indicates that she expected to find her glasses in a particular place, but didn’t.” *Denn* can be compared to *doch* as a marker encoding not only an online evaluation of belief distribution, but also a switch of this evaluation by the speaker in the recent time. This also means that *denn* is primarily first-person oriented, since it encodes more epistemological details on the speaker’s side than on the hearer’s one. Meanwhile, questions are principally perlocutive speech acts, and in this sense they are second-person oriented. *Denn* therefore seems to modify the balance between the speech act participants and to re-evaluate the weight of first-person states of mind.

not to be evident for the hearer because of the rule of quantity. The information is therefore new for the hearer. On the contrary, exclamations are defined by the novelty of their propositional content for the speaker. This means that the switch of the first-person status of a proposition¹⁰ in exclamative sentences is actually not encoded by *ja*, but is already present in the illocutive type. As for *ja*, it seems that it merely indicates (i) the fact that there is *hic et nunc* a convergence of all three personal stances and (ii) a peculiar attention to the recipient of third-person knowledge (which is often the addressee, but in an exclamative sentence, it is the speaker). As we have seen, given the rule of quantity, *ja* mainly occurs when the propositional attitude is what is being focused upon. It is therefore highly compatible with an exclamative sentence, whose purpose is precisely to encode a switch in the speaker's state of knowledge. Such an explanation would also imply that the only contribution of *ja* is to anchor more explicitly the switch to the relationship between the first and the second person.¹¹

This might explain why this alleged mirative *ja* is the most general and unspecified particle occurring in exclamative sentences (see Hentschel & Weydt 1994: 283 for a more precise account). The mirative *ja* does not exist *per se*, but it is a syncretism of several FCA-determinations: The illocutive type encodes first-person epistemic focus and FCA-switch, and *ja* just carries what can be identified as its core value, namely joint affirmativity. It is felicitous iff the third-person value of the propositional content is assumed to be recognized as positive by both speech act participants.

4.3. On the evidential specialization of *wohl*

Wohl, originally the adverb for “well”, seems to be a Janus-faced particle as well, since it has basically two meanings according to whether it is accentuated or not. If it is accentuated, it highlights the speaker's strong commitment to the propositional content, which is added to the common ground. If it is not, it has an almost opposite meaning of weak commitment, making the felicity of the utterance compatible with states of the real world not corresponding to what the proposition describes.

The first value is easily compatible with the core meaning of the lexeme, whereas the second is not (see Abraham 1991b for further analysis). At first sight, the accentuated *wohl* seems to be redundant with *ja*, yet, interestingly enough, *wohl* is not oriented to the information recipient as *ja*, but to the epistemic reference point, that is to the knowledge holder (see Zimmermann 2008). This peculiarity is shared by both the accentuated and the unstressed *wohl*. The interpretation to be defended here is that the latter, unstressed *wohl* is structurally a bi-affirmative particle being pragmatically biased. This occurs along other lines than in the case of *ja* because of the different point of focus we already mentioned. Evans (2007) has developed a conceptual distinction between double perspective and joint perspective. Joint perspective is the speaker's perspective insofar as it is supposed to converge with the hearer's, whereas double perspective is the presence of two assumed epistemic standpoints. In the framework of this

10 This switch is also a switch of the third-person status, because the latter is just a composition of the first- and the second-person ones.

11 Intersubjectivity being the ground of third-person evaluation, this implication of the second person feeds the third-person commitment, so that *ja* is often glossed as reinforcing the assertion (e.g. in the DWDS dictionary).

paper, FCA resorts to double perspective, and joint perspective is but a special case of it, that of congruence of propositional attitude, as illustrated by *ja*. How did *wohl* receive another specialization, and how can this be related to the question of its orientation? If we consider that GMPs are functional operators which take the propositional content and the speech act participants as arguments (in the sense of Dik 1989) and if we take into account the fact that functions in Dik's sense might select their arguments according to the kind of predicate they represent, then the following hypothesis can be raised: *Wohl* operates as a bi-affirmative assertion marker over propositions whose truth-functional evaluation has been suspended. This interpretation follows from a reconstruction of *wohl*'s epistemological function and felicity conditions from the core meaning "well". A modal reinterpretation of the adverb as scoping over the whole proposition would logically be expected to be a validation of the propositional content by the knowledge holder or epistemic point of reference (prototypically, by the speaker in an assertion). Being assigned an FCA function, *wohl* becomes the origo-oriented equivalent of *ja*, thus being exposed to the bias of Grice's maxim of quantity, as well. Given *wohl*'s weaker reference to the second person, the usage conditions would nevertheless collide with a second rule, namely the rule of quality. Since the knowledge holder is per default supposed to strongly commit herself to whatever she says, origo-oriented strong commitment markers are irrelevant in this second respect, too.

This problematic orientation to the speaker plays a crucial role in the functional value of *wohl*. Given Grice's maxims, this core meaning of origo-oriented strong commitment with expected acceptance from the recipient is relevant in only one case: When it is focused upon, e.g. prosodically. This is the origin of the specific meaning of the accentuated *wohl*. When the GMP is not accentuated, its meaning tends to be reinterpreted so as to conform to the conversational rules: If *wohl* is used by the speaker to validate the propositional content, this should mean that for her, this commitment was not evident so far, suggesting that the speaker has no direct evidence for the correspondence of the proposition with reality and that the acceptance follows from reflection: *Wohl* becomes an inferential marker. This can be observed cross-linguistically: Strong commitment markers can often be reinterpreted as inferentials. Thus, in French, *sans doute* ("without doubt") actually means "probably" or *sûrement* ("certainly"), "I suppose." In German, *gewiss* ("for sure, certainly") has also the meaning of an inferential standing for propositions accepted after reflection (see WDS, Vol. 6, 6206). *Wohl*'s orientation to the origo seems to lead one to reinterpret its modal use as the subsequent acceptance of a proposition for the validity of which one has no direct evidence. Thus, *wohl* would add propositions to the common ground *cum grano salis*, and under the restriction that their positive truth value was not granted at first sight, but has been set as a postulate after reflection. This turns the unstressed *wohl* into an origo-oriented commitment operator upon unverified propositions, thus doomed to encode weak commitment.

(10) Das mag wohl sein.
"It may be so." (literally: "That might *wohl* be")

First empirical evidence for this interpretation would be the fact that *wohl* scopes over question formation (see Zimmermann 2008: 205 sqq.). In Dik's words, question formation occurs one

level lower than the determination of the illocutive type, where GMPs are located.¹² Questions being sets of propositions among which the speaker does not designate the true one, they are formed at the level where propositions receive their truth value. In this case, the evaluation ends with a suspension of judgement. Further arguments would be found in the list of *wohl*'s usages in the *Wörterbuch der Deutschen Sprache*. *Wohl* appears to occur preferably in a future, potential, or conditional syntactic context. Other contexts of appearance are sentences containing ethical datives, whose modal function in German is often to help the speaker distance herself from the propositional content of the utterance, or together with epistemic modal verbs with a strong evidential meaning, which, as Guentchéva & Landaburu report, often correspond to a covert pattern of non-commitment. There is therefore a strong suspicion that *wohl* operates over propositions whose truth value has already been suspended so that it does not directly contribute to weakening them. It could rather be used to legitimate what is a mere hypothesis, and to present the assumption as a default common knowledge ground for lack of more reliable information.

This means that *wohl* synthesizes all three personal stances of FCA. The knowledge holder and the knowledge recipient (corresponding to the first and the second person irrespectively of which of both epistemic roles they play) are differently treated. The knowledge holder is at the center of the described epistemological treatment of information. The proposition is marked as something she assumes to be true without empirical evidence but as an inference and for the purpose of the conversation. The knowledge recipient is clearly in the background, being just asked to accept it for lack of better evidence. The third-person status of the proposition is the other crucial axis, together with the first-person one. *Wohl* selects its propositional argument as an element of unverified knowledge and sets it as a postulate: This is typical of the kind of epistemological trackers defined by Guentchéva & Landaburu as the second category, that of evidentiality or source-marking. More precisely, it is covertly cognate to inferential markers, designating what is neither empirically proved nor mere hearsay but presented conjectures of the mind. This category is shown by Landaburu to be subordinate to commitment marking, and as we have seen, GMPs operate over propositions whose status in this respect is already determined. But unlike most of them, which are drastically under-determined and indifferent as regards source-tracking, *wohl* seems to select only propositions having this inferential status.

5. Conclusion

The study of this sample of German Modal Particles following Guentchéva & Landaburu's typological data has delivered two results: At first sight, the distribution of features in German might be so different and pervasive that no isomorphism could be found. But actually, the categories coined to account for an epistemological treatment of information in the languages of the world are relevant for German as well. *Schon*, *doch*, *denn*, *ja* and *wohl* can all be integrated into a system of knowledge distribution between the first, the second, and the third person. Yet, the pairs constituted by *schon* and *doch*, on the one hand, and *ja* and *wohl*, on the other hand,

¹² Respectively the fourth level for truth-functional evaluation and the fifth for the speech act. The latter roughly corresponds to the "Left Periphery" of the Logical Form in recent Generative Grammar.

were composed of two particles filling the same blank in the classification along the lines of Theory of Mind. The components of each pair were distinguished by criteria such as [\pm mirative] for *doch* and *schon* or [\pm evidentially restricted] for *wohl* and *ja*. The mirative was defined as a specification of FCA in time and as a marker of realignment. Evidentiality cannot be subsumed under the description of belief distribution as mirativity can, but the case of *wohl* showed that this second branch of evidential tracking was directly linked to the first one insofar as a systematic pragmatic bias interacting with the core semantic value of the GMP caused it to operate exclusively over a precise evidential class. Thus, evidentiality appears to belong to the epistemological tracking of the first-person stance. It is exhibited together with the encoding of the assumed propositional attitude of the speech act participants regarding the utterance.

It has also been shown that the different uses of each GMP can be reduced to one core meaning directly derived from the original lexeme and related to FCA when analyzed at a sufficient level of abstraction.

Their apparent diversity can be explained compositionally by their co-construction with other FCA strategies and by a systematic implementation of the conversational rules at the point of the utterance.

Acknowledgement

The volume editors and one anonymous reviewer have helped immensely to improve earlier versions of this paper.

Primary sources

Deutschlandfunk (DLF)

Deutschlandradio Kultur (DRK)

Grimm, J. & W. et al. 1852–1971 Wörterbuch der Deutschen Sprache. Leipzig/Berlin/Göttingen.

Secondary sources

Abraham, Werner. 1991a.

“Introduction to Discourse particles. Descriptive and theoretical implications on logical and pragmatic particles in German.” In: Abraham, W. (Ed.), *Discourse particles*. Amsterdam: J. Benjamins. 1–10.

Abraham, Werner. 1991b.

“Discourse particles in German: How does their illocutive force come about?” In: Abraham, W. (Ed.): *Discourse particles*. Amsterdam: John Benjamins Publishing. 203–252.

Abraham, Werner. 2010.

“Diskurspartikeln zwischen Modalität, Modus und Fremdbewusstseinsabgleich (Theory of Mind)”, in Harden, Th. & Hentschel, E. (Ed.) 2010. *40 Jahre Partikelforschung*. Tübingen: Stauffenburg. 33–70.

- Chung, Sandra & Timberlake, Alan. 1985.
“Tense, aspect and mood”, In: Grammatical categories and the lexicon, Shopen, T. (ed.),
Cambridge: Cambridge University Press, p. 202–258.
- Coniglio, Marco. 2007.
German modal particles in root and embedded clauses. Venice: University of Venice Working
Papers in Linguistics Vol. 17.
- Davidson, David. 2001a.
Subjective, intersubjective, objective. Oxford: Clarendon.
- Davidson, David. 2001b.
“First-person authority” (first publ. 1984), in Davidson, David. 2001a: 3–14.
- Davidson, David. 2001c.
“The second person” (first publ. 1992), in Davidson, David. 2001a: 107–122.
- Davidson, David. 2001d.
“Three varieties of knowledge” (first publ. 1991), in Davidson, David. 2001a: 205–220.
- De Lancey, Scott. 2001.
“The mirative and evidentiality”, in *Journal of Pragmatics* 33/3. 369–382.
- Dik, Simon C. 1989.
The theory of functional grammar. Part I: The structure of the clause. Dordrecht: Foris.
- Evans, Nicholas. 2007.
“View with a view: towards a typology of multiple perspective”. Berkeley Linguistics Society,
93–120.
- Evans, Nicholas. 2009.
The grammar of expectation, talk at the Ludwig-Maximilians-Universität München, Dec. 2009.
- Grice, H. Paul. 1975.
“Logic and conversation”, in Cole, P., and Morgan, J. L. (Eds.) *Syntax and semantics: speech
acts*. Vol. 3. New York: Academic Press. 41–58.
- Guentchéva, Zlatka & Landaburu, Jon. 1997
Introduction, in Guentchéva, Z. & Landaburu, J. (Eds.): *L’énonciation médiatisée II. Le
traitement épistémologique de l’information. Illustrations amérindiennes et caucasiennes*.
Louvain, Paris: Peeters. 1–19.
- Henschel, Elke & Weydt, Harald. 1994.
Handbuch der deutschen Grammatik. Berlin/New York: de Gruyter.

Jacobs, Joachim. 1991.

“On the semantics of modal particles. Illocutionary semantics.”

in Abraham, W. (Ed.): *Discourse particles*. Amsterdam: John Benjamins Publishing. 141–162.

Landaburu, Jon. 2007.

“La modalisation du savoir en langue andoke (Amazonie Colombienne)”, in Guentchéva, Z. & Landaburu, J. (Eds.). 23–48.

Ormelius-Sandblom, Elisabet. 1997.

“The modal particle *schon*; its syntax, semantics and pragmatics”, in Swan, T. and Westvik, O. J. (Eds.): *Modality in Germanic languages*, Berlin-The Hague: Mouton de Gruyter (Trends in Linguistics – studies and monographs 99).

Pérennec, Marcel. 2002.

“Unter- und Überschreitung eines Grenzwertes: Überlegungen zu *schon* und *noch*”, in: *Sur le texte. Énonciation et mots du discours en allemand*. Lyon: Presses Universitaires de Lyon. 185–204.

Thurmair, Maria. 1989.

Modalpartikeln und ihre Kombinationen. Tübingen: Niemeyer.

Weydt, Harald. 1969.

Abtönungspartikel. Die deutschen Modalwörter und ihre französischen Entsprechungen. Bad Homburg v.d.H., Berlin, Zürich: Gehlen (Linguistica et litteraria; 4).

Zimmermann, Malte. 2008.

“Discourse particles in the left periphery”. In: Shaer, B., Cook, Ph., Frey, W. & Maienborn, Cl. (Eds.) *Dislocated elements in discourse. Syntactic, semantic, and pragmatic perspectives*. London: Routledge 200–231.

Zimmermann, Malte. 2011

“Discourse particles”. In: Portner, P., Maienborn, C. & von Heusinger, K. (Eds.), *Handbook of semantics*. Berlin, 2011–2038. Mouton de Gruyter: *Handbücher zur Sprach- und Kommunikationswissenschaft*.