Romanian Evidentials

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1 Introduction

This paper contains an investigation of some aspects of Romanian modality constructed with auxiliaries. These forms can be combined either with the infinitive, or with overt (imperfective/perfective) aspectual morphology. In the latter case, they might give rise to interpretations which have been classified in Romanian grammars as *presumptive* (broadly described as referring to probability, uncertainty, guessing). In these contexts, all the auxiliaries are traditionally taken to be synonymous. This paper demonstrates that this conclusion cannot hold; a more in-depth examination shows instead that each modal auxiliary encodes a specific type of indirect source of information that the proposition is based upon. In other words, Romanian modal auxiliaries have an individual indirect evidential component.

The application of canonical tests used in the literature supports a modal analysis of Romanian evidentials, as opposed to an alternative illocutionary operator account. Another characteristic of modal auxiliaries that is touched upon is the nature of the ambiguity relations with their perfective forms. It is assumed, following recent accounts by Condoravdi (2001), Ippolito (2002, et subseq.), Copley (2002), among others, that the ways in which temporal/aspectual heads interact with modal projections are responsible for various interpretations. For example, when temporal/aspectual heads are above the modal, counterfactual readings arise. When they are below the modal, only evidential interpretations are possible.

These observations will be detailed in five parts. After a presentation of the data (section 2), section 3 provides arguments demonstrating that Romanian auxiliaries can have the function of indirect evidentials. Section 4 deals with explaining the source of meaning alternations obtained with perfective (past) forms. In section 5 some tests are applied, and based on their outcome, it is proposed that Romanian indirect evidentiality has to be analyzed as constructed from a modal nature. Section 6 contains a brief conclusion.

2 Romanian Auxiliary Modals

In Romanian, modality can be conveyed either by main verbs or by auxiliaries. For example, notions pertaining to ability concepts (abilitatives) and to obligations (deontics) are expressed by the inflected verbs in (1a) and (1b):

(1) a. El   *poate*   citi.
       he   can.PRES[1].3.SG   read.INF
       'He can/is able to read.'
    b. Cartea   *trebuie*   (a   fi)   cititã[2].
       book.the   must.PRES.3.SG   INF   be   read.PST.PRT
       'The book must be read.'

The main verb strategy will not be examined here; the focus is rather on the morphosemantics of auxiliary modals, which have four variants, as illustrated in Table 1. Each of these morphemes is able to convey various modal meanings when combined with the infinitive. For example, the Conditional-Optative (C.O.) is the means of expressing non-past counterfactuality. The Literary Future (Fut.) morpheme constructs a "future tense," which encodes certainty. This

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semantic flavor makes this form suitable in formal discourses, hence the label "literary." In this paper, it will be abbreviated as Fut. The so-called Popular Future refers to rather uncertain future events. In fact, its characterization as "future tense" is not accurate, for reasons that will become clear later in this paper. It will be translated here as Mod. (modal), and in the next sections its precise modal base will be specified. Finally, what is traditionally called the subjunctive (Subj.) marker is a polyfunctional element, specialized in conveying afactivity (Farkaş, 1985), usually in embedding contexts. All these auxiliaries, with the exception of the subjunctive marker, carry dessinences for person and number:

Auxiliary/marker	Forms
Conditional-Optative auxiliary	*aş* (1.sg), *ai* (2.sg), *ar* (3.sg.), *am* (1.pl), *aţi* (2.pl.), *ar* (3.pl.)
Literary Future auxiliary	*voi* (1.sg.), *vei* (2.sg.), *va* (3.sg.), *vom* (1.pl.), *veţi* (2.pl), *vor* (3.pl.)
Popular Future (Mod.) auxiliary	*oi* (1.sg.), *oi* (2.sg.), *o* (3.sg.), *om* (1.pl.), *oţi* (2.pl), *or* (3.pl.)
Subjunctive marker	Uninflected *sã*

Table 1: Auxiliary/modal marker forms in Romanian.

As mentioned above, the infinitive is not the only element that can occur with these auxiliaries. To any of them, the short infinitive of the verb *fi* (*be*) can be added, together with an aspectual marker which gives the temporal information. For a present tense reading, the gerund is required, which in Romanian is inherently specified as progressive, and has the ending *-nd*. In the past tense interpretation, the gerund is replaced by the past participle (*-t*), described as a semantic perfect(ive). Traditional grammars have long observed that when the gerund is added, auxiliaries lose their "canonical" meaning and rather obtain "presumptive" interpretations. This label appears to have been adopted from Jespersen's (1924) inventory of modality, where *presumptive* was taken to refer to readings characterizing sentences like "He is probably rich." Romanian grammars refer to a full range of "presumptive" specifications: *uncertainty, hearsay, non-vouchability, guess, surprise, weak possibility, strong possibility.* This is illustrated in example (2) with a "presumptive" (Presm) constructed from the C.O. morpheme, and whose approximate translation is indicated by the sign ≈.

(2) *Ar   fi   având   un   şarpe.*
     PRESM.3 be.INF   have.GER   a   snake
     ≈ 'He/she/they apparently has/have a snake, as they say. (and I am surprised about this)'

Moreover, the commonly held assumption is that all the four auxiliaries are "presumptively" synonymous when constructed with gerunds. This observation has lead scholars to postulate the existence of a "presumptive mood" in Romanian, on a par with the other moods (the C.O., the Subj., the indicative, the imperative). This goal of this paper is to formulate a precise account regarding the (semantic) status of this "mood," starting from the observation that these forms are NOT synonymous.

It should be mentioned first that postulating the existence of the presumptive as an independent category leads to serious complications. First of all, when the gerund is replaced with the past participle, ambiguity arises with C.O. and Fut. auxiliaries. A sentence like (3) that contains a C.O. morpheme and the past participle of the verb *have* (*avut*) can be interpreted as "presumptive" about the past (3a), or as a past subjunctive conditional/counterfactual (3b):

(3) *Ar fi avut* un şarpe.
     a. ≈ 'She/he apparently had a snake, based on what I am told. (and I am surprised about this/I cannot vouch for this)'
     b. 'She/he would have had a snake.' (possible continuation: if she/he had had the money to buy it)

The sentence in (4) containing the Fut. auxiliary and the past participle *terminat* 'finished' can mean that they apparently finished writing yesterday ("presumptive" in the past), or that they will have finished writing tomorrow ("future perfect"):

(4) *Vor fi terminat* de scris.
    a. ≈ 'They apparently finished writing.' (possible continuation: *yesterday at 5 pm*)
    b. 'They will have finished writing.' (possible continuation: *tomorrow at 5 pm*)

The question that is asked is, if there is indeed a separate "presumptive" paradigm (as it is generally assumed), what is to be included in it? Various scholars proposed different answers, which are briefly discussed below. The most extensive account formulated for the presumptive is found in Slave (1957). Its basic claim is that the presumptive is a conjugation that includes several moods. Nevertheless, it does not explain how the "ambiguity" in the past is resolved. If the presumptive is to include the conditional mood (her *subjunctive*), then the alternation counterfactual-evidential, among other facts, does not get an answer.

This analysis has been criticized by Romanian scholars. For example, Dimitriu (1979:269) argues against the existence of independent moods within the presumptive conjugations, by pointing out that, in his view, all the possibilities are synonymous. Instead, he considers, in a similar vein to Iorgu and Robu (1978:473), Irimia (1983), Goudet (1977), and Halvorsen (1973), among others, that the presumptive is itself a separate mood (and not a *conjugation* that includes several moods) that has both present and past tense forms. The distinction among the various interpretations in the past is computed from contextual (pragmatic) factors. But it is left unexplained how specifically the pragmatic account works.

To summarize the discussion so far, several analyses have been proposed for the *presumptive*. What they have in common is the interest towards finding a morphological classification of these forms within the Romanian grammatical system. The shortcomings result from the fact that the "ambiguity"/"homonymy" with the past formants, although widely acknowledged, is either not accounted for, or, if addressed, attributed to pragmatic factors, which are left unspecified.

In order to overcome these problems, this paper proposes a completely new systematic analysis to modal auxiliaries in Romanian. Several claims are made and accounted for:

a) the semantics of the *presumptive* is in fact evidential and encodes the indirect source of information statements are based upon. Moreover, the auxiliaries are not synonymous, when specified with evidential readings. The application of several tests also demonstrates that evidentiality has a modal nature, and cannot be analyzed as an illocutionary operator.

b) distinct semantic specifications (which are not found only in Romanian, but are pervasive cross-linguistically) arise as a result of the interaction between the modals and the tense/aspect heads (in a similar line to Condoravdi (2001), Ippolito (2002) et subseq., as well as Copley (2002), among others). In the case of the traditionally called *conditional-optative* auxiliary, when tense/aspect is interpreted below the modal, evidential readings are obtained. On the other side, when tense/aspect heads are interpreted above the modal, *metaphysical (historical)* readings are obtained, which correspond to counterfactuality (subjunctive conditionals).

c) gerund forms do not give rise to ambiguity, because they are constructed with c-commanding [+Pres] T head. Even if the temporal head could be interpreted above the modal, a counterfactual reading does not arise, because counterfactuals are not built with present tense. They rather need past or present perfect (Iatridou, 2000; Ippolito, 2003).

d) the so-called *popular future* is not a "future tense." It is instead a pure modal. When combined with a tense/aspectual head specified for present, evidential interpretations for the present result. When the infinitive is added, *forward-shifting (future)* readings are possible.

Section 3 starts the analysis by introducing the data supporting the evidential nature of the four modal auxiliaries.

3 Romanian Auxiliary Modals as Evidentials

A closer examination of the semantics of the Romanian auxiliary modals shows that their present tense forms unambiguously indicate something about the source of information for the proposition

under their scope. Moreover, their readings match the inventory of evidential meanings classified cross-linguistically, and broadly correspond to the definitions proposed for this category by various analyses (Aikhenvald, 2003, 2004; Chafe and Nichols, 1988; Palmer, 1986; Rooryck, 2001; among others). The term evidentiality obtained its current linguistic status from the linguist Roman Jakobson (1957), who, in a description of Slavic Balkan languages, took it to refer to the encoding of the source of information sentences are based upon. In a study of 38 languages, Willett (1988) found out that evidential systems have the taxonomy illustrated in Figure 1.

Direct   ***Indirect***

Attested   **<u>Reported</u>**   **<u>Inference</u>**

Visual   Secondhand Results
Auditory   Thirdhand   Reasoning
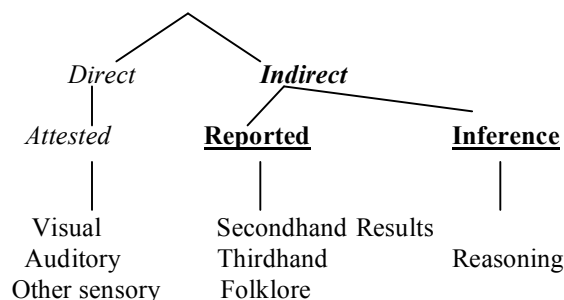Other sensory   Folklore

Figure 1: Evidentiality taxonomy.

Languages in which evidentials appear to be obligatory are rather rare. Romanian does not make up part of this class; evidentiality marking is not obligatory, and also not the only morphological means of conveying details about the source of information (for example, various types of adverbs could also be used with the same purpose).

Having made this remark, this section provides, first, sentences which demonstrate the use of the conditional-optative morpheme as an indirect reported evidential. As a general note, such forms are felicitous when the speaker obtained (and came to know and, possibly, believe) the information from someone else. The report variant of the C.O. does not distinguish between secondhand, third-hand, or folklore information. In Willett's classification, *folklore* is taken to be a cover term for representing information which is common knowledge or part of oral history. Similarly, *third-hand* does not strictly encode "third-hand" reports. Such evidentials are taken instead to mean that the speaker obtained the information from someone who did not directly witness the specific situation themselves.

The example in (5) below, containing a context adapted from Matthewson et al. (2007), illustrates a REPORT interpretation of the C.O. auxiliary:

(5) <u>Second-hand context</u>: Speaker is talking about an event of her laughing when she heard some news. The speaker does not remember the occasion, but was told about it by a friend, who witnessed it.

(Cică)   Aş   fi   râs.
(They say) C.O.Report.1.SG   be   laugh.PST.PRT
≈ [reportedly] 'I laughed.'

Turning to evidentials constructed from "futures," three observations have to be made regarding their semantics. First of all, the so-called "popular future" appears not to be a "future tense" marker, as generally assumed in Romanian grammars. This is demonstrated by its interaction with pure stative predicates. It has been observed by various researchers (Condoravdi, 2001; Werner, 2006; Stowell, 2004, among others) that pure statives do not leave the temporal orientation of modals unaffected. There are specific contexts in which they are able to create what is called "back-shifting" (non-prospective reference), even with modals that are future-oriented:

(6) He might be sick now/$^{??}$tomorrow.
(7) He might get sick tomorrow/$^{??}$now.
(8) He must be in the library now/$^{??}$ tomorrow.

The so-called "future tense" markers in English have this property only when obtaining an unambiguous epistemic modal reading:

(9) He will be sick now.   (according to what the speaker knows).
(10) He will be sick tomorrow.

In Romanian, when the inherent aspect of the verb is stative, the interpretation with the so-called popular future is *exclusively* about the present tense (11); with non-statives (13), both present and future-oriented readings are obtained:

(11) *O*   *fi*   bolnav.
     INFER.3.SG   be.INF   sick.3.SG.M
     ≈ 'He/she might/may be sick.'
     ≠ 'He will be sick.'
(12) *O*   *sta*   cu   pãrinţii   lui.
     INFER.3SG   stay.INF   with   parents.the   his
     ≈ 'He/she might/may live with his parents.'
(13) *O*   *pleca*   la   garã.
     INFER.3.SG   leave.INF   at   railway station
     ≈ 'He might be going to the railway station now.'   OR
     ≈ 'He might go to the railway station in the future.'

The function of this modal auxiliary is that of a general inferential evidential (glossed, therefore, as Infer). The difference between the felicity of the Report marker and the Inferential can be noticed in examples like (14). The intended general inferential meaning in the sentence below cannot be conveyed by using the conditional-optative based morphology:

(14) *Ar   fi   dormind   pisica.
     report.3.SG   be   sleep.GER   cat.the
     [intended meaning] ≈ 'The cat is apparently sleeping.'

The "literary future" morpheme appears to be required when the deduction made is based on reasoning; moreover, it conveys that the possibility of the underlying proposition is not "weak." It is glossed as Good-Poss (good possibility). In Modern Romanian, its occurrences carry a rather formal language flavor:

(15) Iubitorii   de   istorie   românească   *vor*   *fi*   *având*
     lover.PL.the   of   history   Romanian.F.SG GOOD-POSS   be   have.GER
     multe   documente de   colecţie
     many.PL.N   document.PL of   collection.
       ≈ 'Those who love Romanian history must have many valuable documents.'

The illustration of the evidential semantic component of Romanian presumptives brings into discussion the nature of the alternations observed with past participle forms. More specifically, C.O. auxiliary is felicitous as a reportive evidential (epistemic) or as a counterfactual, as in example (3) resumed here in (16):

(16) *Ar fi avut* un şarpe.
     a. ≈ [reportedly] 'She/he/they had a snake. (and I am surprised about this/I cannot vouch
        for this)'
     b. 'She/he/they would have had a snake. (if she/he/they had had the money to buy it)'

Similarly, the Fut. inflected morpheme accepts a good-possibility indirect evidential and a future perfect reading (just like *will have* in English). Sentence (4) is resumed below as an illustration:

(17) *Vor fi terminat* de scris.
   a. ≈ 'They apparently finished writing.' (possible continuation: *yesterday at 5 pm*)
   b. 'They will have finished writing.' (possible continuation: *tomorrow at 5 pm*)

The literature review in Section 2 pointed out that these alternations are treated in Romanian grammar as a result of pragmatic (discourse related) factors. Nevertheless, it is not specified how precisely the pragmatic explanation works. In section 4, it will be shown that the "ambiguity" can be, in fact, resolved structurally.

4 Resolving Alternations

The interaction with "mismatched" temporal adverbials provides a means of disambiguating between the interpretations mentioned above. More specifically, past subjunctive conditionals in Romanian allow the presence of "future-oriented" adjuncts:

(18) Dacã *ar   fi venit*   **mâine**,   nu *am   fi plecat*   ieri.
     If   C.O.3 be come.PST.PRT tomorrow, not C.O.1.PL be leave.PST.PRT yesterday
     'If he had come tomorrow, we would not have left yesterday.'

Evidentials, on the other hand, do not have this malleability. They systematically reject the addition of any adverb whose temporal perspective does not identically match their tense specification. In sentence (19), forcing a reportive/evidential reading on the past participle auxiliary in combination with a future-oriented adverbial results in ill-formedness:

(19) *Ar   fi   venit   mâine.
      REPORT.3   be   come.PST.PRT   tomorrow
      Intended reading: [reportedly] 'he will come tomorrow.'/ [reportedly] 'he might come tomorrow.'/ [reportedly] 'he would have come tomorrow.'

This paper proposes that such "alternations" are explained structurally. The analysis builds on previous proposals formulated for counterfactuals/subjunctive conditionals. Condoravdi (2001), Ippolito (2002, and subseq.) interpret their temporal permissibility as a result of the fact that the temporal/aspectual heads are not interpreted in the position where they superficially occur, more specifically, below the modal. Rather, they are interpreted above the modal. For other readings, temporal/aspectual heads are interpreted below the modal, and, as a consequence, the temporal specification is strictly set.

The claim put forward in this paper is that in the case of Romanian evidentials, tense/aspect heads are interpreted below the modal. This is in line with what is observed in other languages, where the same type of semantic alternation is salient (for example Bulgarian, other Romance, Turkish, German, etc). Romanian auxiliaries turn out to respect general cross-linguistic generalizations regarding the construction of modality. One question has to be addressed now: what is the precise temporal/aspectual information? That is, how are evidentials built?

The answer to this question starts from the observation that different aspectual heads are involved in the creation of present vs. past evidentials. In the former case, only gerunds are allowed, while the latter require past participles. In Romanian, gerunds spell out imperfective aspect[3]; following the analysis proposed by Klein (1994), the role of Aspect is to locate the time of the event with respect to the time provided by Tense. Imperfectives have reference time contained within the event time. The following lexical entry is from Klein (1994), and Kratzer (1998):

(20) $[[\text{IMPERFECTIVE}]] = \lambda P.\lambda t. \exists e\ [t \subseteq \tau(e)\ \&\ P(e)\ (w) = 1]$

It is also important to note that in many languages, imperfective aspects give rise to default present tense specification; one typical example is constituted by the verbal roots (temporally neu-

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[3] Irimia (1983), Iordan and Robu (1978), etc.

tral) in Turkish, where the addition of the IMPERF, allows only *present tense* interpretation, while preserving the imperfective/continuous semantics.

(21) Turkish (Taylan, 2001):
    Ayşe   tavuğ-u   pişir-**iyor.**
    Ayşe   chicken-ACC   cook-IMPERF
    'Ayşe is cooking the chicken.'

The assumption put forward in this paper is that this is due to the default specification of a higher c-commanding T head as [+Pres]. As generally assumed in the literature, Aspect heads are lower than T. The basic skeletal configuration for evidentials in the present is in (22):

(22)

$\text{Mod}_{\text{EPIST}}$

$\text{T}_{[Pres]}$

$\text{Asp}_{[IMPF]}$
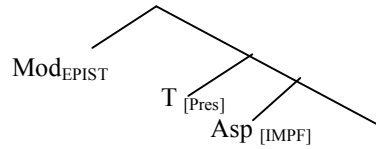
Past participles, on the other hand, have the capacity to refer to the past, as the event time is contained within the reference time. This paper assumes that they make use of a perfective head, c-commanded by a default [+Past] T projection. The lexical entry for perfectives (23) is also Klein's (1994) and Kratzer's (1994):

(23) $[[\text{PERFECTIVE}]] = \lambda P.\lambda t.\exists e\ [\tau(e) \subseteq t\ \&\ P(e)(w) = 1]$

The skeletal structure for past evidentials is in (24):

(24)

$\text{Mod}_{\text{EPIST}}$

$\text{T}_{[PST]}$

$\text{Asp}_{[PERFECTIVE]}$
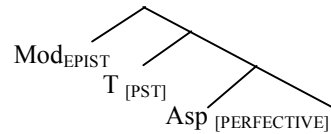
Many more details are necessary in order to provide a fully-fledged analysis of the temporal-aspectual specification of Romanian, but they go beyond the scope of this short paper. One observation that deserves attention is the impossibility of subjunctive conditionals to be constructed with gerund forms, which are interpreted as present tense:

(25) *Dacã   *ar*   *fi*   *având*   un şarpe,   *ar*   *fi*   bucuros.
    If   REPORT.3 be   have.GER a snake SC.3   be.INF happy.M.SG
    Intended meaning: 'If he had a snake, he would be happy.'
(26) *Dacã   *ar*   *fi*   *având*   un şarpe,   *ar*   *fi*   *fost*   bucuros.
    If   REPORT.3 be   have. GER a snake, SC.3 be   PST.PRT happy.M.SG
    Intended meaning: 'If he had had a snake, he would have been happy.'

The explanation for the infelicity of these constructions comes from analyses postulating that the marker of counterfactuality is *past tense* (Iatridou, 2000, and others). As the construction of the gerund involves the presence of a c-commanding T head specified as present, the impossibility of this alternation is predicted.

Besides "ambiguities," Romanian presumptives also raise a question about the semantic nature of evidentiality. More specifically, do Romanian evidentials have an epistemic modal construction, or are they illocutionary operators? The application of various tests presented in section 5 argues for an epistemic modal analysis.

5 Evidentials and Epistemics

Evidentials have made their entrance into the (formal) semantic theory quite recently. Nevertheless, various proposals have been formulated to account for their properties. The analyses can be taken to represent three directions. The first is proposed by Izvorski (1997), Garrett (2001), McCready and Ogata (2007), Matthewson et al. (2007), etc., who argue that evidentials have to be analyzed as (epistemic) modals with a supplementary meaning component. The second is to consider evidentials as illocutionary operators which do not contribute to the meaning of the proposition expressed. Faller (2002) was the first to put forward this analysis. The third direction is mainly concerned with the spatio-temporal properties of evidential-like deictic elements, and was defended by Chung (2007) for Korean, and Faller (2003) for some adverbials in Cuzco Quechua.

By the application of tests, this section will demonstrate that in Romanian evidentials have to be analyzed as epistemic modals, which have a truth-conditional contribution. The tests used are a) *embedding*, b) *assent/dissent*.

Canonically, *embedding* tests say that an element is truth-conditional if it can occur in the antecedent of a conditional; the same conclusion holds if the element is allowed in a subordinate clause introduced by a factive verb or by a verb of saying. If it does not allow such embeddings, then it does not contribute to truth-conditions. As previously remarked by Jackendoff (1972) and Cinque (1999), *frankly* is a typical example of an adverbial that cannot be embedded; on the contrary, *reportedly* and *obviously* can.

(27) a. If John's book has *frankly* sold very little, you shouldn't be surprised.
      b. If the ball was *reportedly* over the line, the matter should be investigated further.
      c. If the cook *obviously* won't poison the soup, we can eat the meal without worrying.

Romanian evidentials allow embedding under *if*, but the interpretation obtained has to be that of an indicative conditional[4]. This is seen from the mood choice in the consequent, which is always marked as indicative. In (28) an example with the inferential and the good-possibility auxiliary is given:

(28) *Context*: You are taking an exam, and your colleagues are telling you that one of your friends studied a lot. You can draw the following conclusion:

Dacã	ar	fi	studiat	(aşa cum se		spune),
If	REPORT.3	be	study.PST.PRT	as how IMPERS		ay.3.SG.INDIC.PRES
atunci	va		lua	o	notã	mare.
then	FUT.3.SG		take.INF.	a	grade	big.SG

≈ "If there is a report that she studied, and people say that there is such report, then she will get a good grade."

The *assent/dissent* test predicts that if an element can be questioned, agreed with, disagreed with, doubted or rejected, then it contributes to the truth conditions of the proposition. Turning to evidentials, a truth-conditional account would predict that the evidence a statement is based upon should undergo the assent/dissent. Simplistically put, a sentence like (29) should allow the *disagree* reading of the form (30), besides the more "obvious" interpretation (31):

(29) I guess John is at home.
(30) That's not true. You do not guess that John is at home.
(31) That's not true. John is not at home.

The contexts below demonstrate that the test holds with Romanian evidentials:

(32) Context: You went outside to take a walk and notice that the lights are off at your friend's room. You conclude that she must be sleeping.

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[4] It should be noted in passing that embedding under *if* is not a weird property of Romanian evidentials. McCready and Ogata (2007) report the same facts about some Japanese evidentials.

Maria	*o*	*fi*	*dormind.*	Lumina	e
Maria	INFER.3.SG	be	sleep.GER	light	be.INDIC.PRES.3SG
stinsã		în	camera	ei.	
turn off.PST.PRT		in	room.the	her	

≈ 'Mary is apparently sleeping. The light is off in her room.'

The sentence above can be continued as follows (B's statement in 33):

(33)	Nu	e		adevãrat.	Maria	nu	poate	sã	doarmã
	not	be.INDIC.PRES.3.SG		true.	Maria	not	can.3.SG	SUBJ	sleep.SUBJ.3
	la	ora	asta.	E		prea	devreme.		
	at	hour.the	this	be.INDIC.PRES.3.SG		too	early		

'That's not true. It is not possible that Mary is sleeping at this hour. It is too early.'

B's statement ≠ 'Mary is not sleeping.'
B's statement = 'It is not true that is it possible that Mary must be sleeping.'

To conclude, the application of the tests above demonstrates that evidentials in Romanian have a truth-conditional interpretation. They should be analyzed as epistemic modals, in a similar line as proposed by Izvorski (1997). But some modifications of her original analysis are necessary, though. For example, Izvorski (1997) builds in the universal (□) quantifier into the semantics of evidentials, as shown in (34):

(34) The interpretation of Ev*p*   (Izvorski, 1997:226)
      Assertion: □ p *in view of the speaker's knowledge state*
      Presupposition: *speaker has indirect evidence for* p

This type of implementation does not seem to work in Romanian, where indirect evidentials are rather interpreted existentially (◊). They assert that it is possible, given the indirect evidence, that the proposition embedded[5] holds. The same observation has been made for evidentials in other languages (for example, St'át'imcets as described in Matthewson et al., 2007). Nevertheless, a precise and detailed execution of the existential interpretation requires an in-depth analysis of cross-linguistic facts, and will be left for future work.

6 Conclusion

This small paper offered a broad description of Romanian *presumptives*, focusing on some problematic aspects. It has been shown, first of all, that their semantics is that of an indirect evidential. Secondly, the alternations observed with the past forms were taken to result from structural constraints. And, thirdly, two main tests applied (*embedding, assent/dissent*) pointed towards an epistemic modal account of Romanian evidentials, signaling their truth-conditional contribution.

References

Aikhenvald, Alexandra Y. 2004. *Evidentiality*. Oxford University Press.
Aikhenvald, Alexandra Y., and R.M.W. Dixon. 2003. *Studies in Evidentiality*. John Benjamins Publishing Company.
Chafe, Wallace, and Johanna Nichols. 1986. *Evidentiality: the Linguistic Coding of Epistemology*. Norwood, NJ: Ablex.

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[5] In fact, Izvorski (1997) admits herself that the same is true in Bulgarian. But she decided to allow universal quantification, in order to include some cases in which the reading seems to be rather universal.

Chung, Kyungsook. 2007. Spatial deictic tense and evidentials in Korean. *Natural Language Semantics* 15:187–219.

Cinque, Guglielmo. 1999. *Adverbs and Functional Heads: a Cross-Linguistic Perspective.* Oxford University Press.

Condoravdi, Cleo. 2001. Temporal interpretation of modals. Modals for the present and for the past. In *Stanford Papers on Semantics*, ed. D. Beaver, et al. CSLI Publishers.

Copley, Bridget. 2002. The Semantics of the Future. Doctoral Dissertation, MIT.

Dimitriu, Cornel. 1979. *Gramatica limbii române explicată. Morfologia.* [Grammar of Romanian. Morphology]. Editura Junimea. Iaşi.

Faller, Martina. 2002. Semantics and Pragmatics of Evidentials in Cuzco Quechua. Doctoral Dissertation, Stanford University.

Faller, Martina. 2003. Propositional- and illocutionary-level evidentiality in Cuzco Quechua. *Proceedings of SULA* 2:19–33. Amherst, Mass.: GLSA.

Farkas, Donka.1985. *Intentional Descriptions and the Romance Subjunctive Mood.* New York: Garland.

Garrett, Edward John. 2001. Evidentiality and Assertion in Tibetan. Doctoral Dissertation, University of California, Los Angeles.

Goudet, Jacques. 1977. An attempt at interpreting the periphrastic verbal system: *a fi* + gerund. In *Transformational Grammar and the Rumanian Language*, ed. A. Sorin, 53–59. Lisse.

Halvorsen, Arne. 1973. *Essai d'une analyse des forms dites 'de futur' en roumain moderne.* Bergen.

Iatridou, Sabine. 2000. The grammatical ingredients of counterfactuality. *Linguistic Inquiry* 31:231–270.

Iordan, Iorgu, and Vladimir Robu. 1978. *Limba română contemporană.*[Contemporary Romanian]. Bucharest.

Ippolito, Michela. 2002. The Time of Possibilities. Truth and Felicity of Subjunctive Conditionals. Doctoral Dissertation, MIT.

Ippolito, Michela. 2003. Presuppositions and implicatures in counterfactuals. *Natural Language Semantics* 11:145–186.

Irimia, Dumitru. 1983. *Structura gramaticală a limbii române* [The grammatical structure of Romanian]. Editura Junimea. Iaşi.

Izvorski, Roumyana. 1997. The present perfect as an epistemic modal. In *Proceedings of SALT VII*, ed. A. Lawson and E. Cho. Cornell: CLC Publications.

Jackendoff, Ray. 1972. *Semantic Interpretation in Generative Grammar.* Cambridge, Mass.: MIT Press.

Jakobson, Roman. 1971. Shifters, verbal categories and the Russian verb. In *Selected writings, II: Word and Language*, ed. R. Jakobson, 130–147. The Hague: Mouton.

Jespersen, Otto. 1924. *The Philosophy of Grammar.* London: Allen and Unwin.

Klein, Wolfgang. 1994. *Time in Language.* London and New York: Routledge.

Kratzer, Angelika. 1998. More structural analogies between pronouns and tenses. In *Proceedings of SALT* VIII. Cornell: CLC Publications.

Matthewson, Lisa, Henry Davis, and Hotze Rullmann. 2007. Evidentials as epistemic modals: evidence from St'át'imcets. Ms.

McCready, Eric, and Naori Ogata. 2007. Evidentiality, modality, and epistemic probability. *Linguistics and Philosophy* 30(2): 147–206.

Palmer, F.R. 1986. *Mood and Modality.* Cambridge University Press.

Rooryck, Johan. 2001. Evidentiality, Part II. *Glot International* 5(5):161–168.

Slave, Elena. 1957. Prezumtivul. [The presumptive]. In *Studii de gramaticã* [Studies in Grammar] 11:53–60.

Stowell, Tim. 2004. Tense and modals. In *The Syntax of Time*, ed. J. Gueron and J. Lecarme. Cambridge, Mass.: MIT Press.

Taylan, Eser Erguvanli. 2001. *The Verb in Turkish*. Cambridge University Press.

Werner, Thomas. 2006. Future and non-future modal sentences. *Natural Language Semantics* 14:235–255

Willett, Thomas. 1988. A cross-linguistic survey of the grammaticization of evidentiality. *Studies in Language* 12:51–97.

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