The syntax-semantics of modal existential wh constructions¹

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This paper attempts to analyze the properties of a construction that is typical of Balkan languages, but is also encountered in non-Balkan Romance and Slavic, and a few additional languages. The construction, neutrally referred to as MEC (Modal Existential wh Construction), has the superficial appearance of a wh-clause, but the semantics of a narrow-scope existential generalized quantifier (GQ) such that the property expressed by IP has modal possibility/ability force. It is proposed, building on Grosu (1994), Grosu and Landman (1998) and Izvorski (1998), and modifying some of the views in these works, that MECs are non-core relative constructions consisting of a bare CP which carries the feature [GQ $_{\exists}$], as well as a specification of its particular modality. Cross-linguistic distribution is captured by extensions of subcategorization options from nominal to CP arguments, such extensions being potentially 'licensed' by semantic-pragmatic properties of the matrix predicates in conjunction with the larger context, in the sense that such properties constitute necessary, but not sufficient, conditions for extension. The proposed analysis accounts for the upper bound on MEC distribution, for the kind of attested cross-linguistic variation, and for certain hitherto unaccounted for properties of MECs, in particular, an inability to serve as predicates, and a complete incompatibility with wh+ever-like phrases.

1. Introduction

This paper re-examines a type of construction that has received a certain amount of attention in the earlier generative literature, and for which at least three kinds of analytical approaches have been put forward. I will argue that each of these three approaches is deficient in some respect, and will propose a fourth, which partly builds on one of its predecessors, and which overcomes some of the difficulties that confront all of them.

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The construction in question is typical of the Balkan languages, being found in Modern Greek, Bulgarian, Serbo-Croatian, Macedonian, Romanian and Albanian, but is also encountered in non-Balkan Romance and Slavic languages, as well as in Hungarian, Modern Hebrew, and Classical and Moroccan Arabic. Interestingly, it is absent from the major Germanic languages, except for Yiddish, where its presence may well be due to contact with Slavic. At least *prima facie*, the construction (i) has the appearance of a clause with a fronted wh-phrase, but (ii) its semantic force is that of a narrow-scope existential generalized quantifier, with (iii) the special property that the IP within it necessarily includes a semantic modal operator with possibility/ability force. In view of the controversial theoretical status of this construction, and in order not to prejudge its ultimate analysis, I will refer to it with the term "Modal Existential wh-construction" (MEC), which is descriptively correct, and, as we shall see, compatible both with the analyses so far proposed and with the one I will develop here.

A full list of the distinguishing properties of MECs will be provided at the beginning of section 4, but one of them bears mention here: The distribution of MECs is subject to significant systematic cross-linguistic variation (see below), and is in general properly included in the distribution of straightforward nominals with comparable semantic force. By and large, MECs occur as arguments of verbs/predicates whose semantics includes an existential component, and which fall into two major classes; (i) assertion of existence (usually expressed by verbs of the be or have type), and (ii) coming into being, view, or availability, or causation of one of these (for example, arrive, be born, choose, look for, find, send, obtain, and wangle.² Some languages disallow MECs entirely, while others permit them only with predicates of type (i). There are also more "permissive" languages, which allow MECs with predicates of type (i) and with some predicates of type (ii), but none, to my knowledge, that freely allow MECs with all of Szabolcsi's (1986) predicates. In relation to the more permissive languages just referred to, Szabolcsi's predicates are partly ordered by a scale of accessibility (that marks type (i) predicates as most accessible), with individual languages selecting different cut-off points on this scale.

Prior to outlining the gist of the three approaches alluded to above, I provide illustrations of MECs from a variety of languages, offering, whenever possible, examples with matrix predicates both of type (i) (in the (a) sub-cases) and of type (ii) (in the (b) subcases). For some languages, where this distinction has consequences, separate subcases (a) and (a') are provided, depending on whether the wh-element binds a non-subject or a subject position within the MEC.

In (1-13), examples of MECs from Romanian (Ro), Bulgarian (Bu), Macedonian (Ma), Modern Greek (MG), Hungarian (Hu), Russian (Ru), Polish (Po), Spanish (Sp), French (Fr), Modern Hebrew (MH), Albanian (Al), Serbo-Croatian (SC) and Classical Arabic (ClA) are provided:

² See Szabolcsi (1986) for morphologically explicit evidence from Hungarian that argument positions of such verbs/predicates become subject to 'indefiniteness requirements' when the verb fails to exhibit certain prefixes. However, Szabolcsi's predicates define only an "upper bound" on the distribution of MECs.

not have.1Sg who.Dat send.Inf Subj send.1Pl goods 'We have {someone, no one} to whom we can send merchandise.' a'. (Nu) avem *{*ne trimite/ să ne trimeată}* [cine marfă]. not have.1Sg who.Nom us send.Inf Subj us send.Subj.3Sg goods 'We have {someone/ no one} who can send us merchandise.' Îti b. voi trimite [cu ce {??spăla/ să you.Dat will.1Sg send.Inf with what wash.Inf Subj speli} rufele]. clothes.the wash.2Sg 'I will send you something with which to wash the clothes.' *{Ima/ njama} [na kogo da ispratime]* (2)parite]. Bu a. has not-has to whom Subj send.Perf.Pres.1Pl money-the.Pl 'There {is, isn't} someone to whom we can send the money.' Tja izbra ja zamesti]. b. [koj da she chose.3Sg who.Nom Subj her replace.Perf.Pres.3Sg 'She chose someone who can replace her.' (3) Ma *{Imame/ nemame}* [komu da mu a. gi have.1Pl not-have.1Pl who.Dat Subj him.Dat them.Acc *ispratime* parite]. send.1Pl money-the.Pl 'We (don't) have someone to whom to send the money.' [{prati vo Moskva/ so kogo b. Bara kogo da da look-for whom Subj sends in Moscow with whom Subj gi ostavi decata}]. them leave.Perf.Pres.3Sg children+the 'He is looking for {who to send to Moscow/ with whom to leave the children }.' MG (4) Den eho a. [pion na stilo sto Parisi] not have.1Sg whom Subj send.1Sg to-the Paris 'I have no one I can send to Paris.' b. {Epsaka/ vrika} [ti na su stilo stis diakopes]. looked-for found what Subj you send.Perf. in holiday 'I {looked for/ found} something to send you during the holiday.'

{trimite, să trimitem} marfă].

(1)

a.

(Nu) avem

[cui

Ro

(5)	a.	<i>Nincs [ki-nek {irnunk/ irjunk}]</i> is-not who-to write.Inf.1Pl write.Subj.1Pl 'We have no one we can write to.'	Hu
	a.' b.	Van[{ki-nek segíteni, ki segítsen} nekem]is who-Dat help.Inf.3Sg who-Nom help.Subj.3Sg me.Dat'There is someone who can help me.'Talátál [mit enni?]find.Past.2sg what.Acc eat.Inf.'Did you find something to eat?'	
(6)	a.	<i>Emu est' [s kem ostavit' detej].</i> him.Dat is with whom leave.Inf children 'He has someone with whom he can leave the children.'	Ru
	b.	<i>On isčet</i> [s kem ostavit' detej] he looks-for with whom leave.Inf children 'He is looking for someone with whom to leave the children.'	
(7)		mam [co robić]. ave.1Sg what do.Inf e {is something, isn't anything} I can do.'	Ро
(8)	a.	<i>Juan no tiene [a quien escribir].</i> Juan not has to whom write.Inf 'Juan has no one he can write to.'	Sp
	a.'	<i>Juan no tiene [quien le escriba]</i> . Juan not has who him write.Subj.3Sg 'Juan has no one who can write to him.'	
	b.	Briana no encuentra [con quien salir]. Briana not finds with whom go-out.Inf 'Briana can't find anyone with whom to go out.'	
(9)	a.	<i>Il n' y a plus [à qui s' adresser].</i> it not there has more to whom Refl turn.Inf 'There is no longer anyone we can turn to.'	Fr
	b.	<i>Je t'enverrai</i> [<i>de quoi te débarbouille le visage</i>] I you send.Fut.1Sg of what Refl.2Sg clean.Inf the face 'I will send you something with which to clean your face.'	
(10)	a.	<i>Eyn (li) [im mi le-daber].</i> is-not to-me with who to-talk 'There is nobody {I, one} can talk to.'	MH
	b.	<i>Eshlax lexa [be ma lirxoc et ha-panim].</i> will.send.1Sg you in what wash.Inf Acc the-face 'I will send you something with which to wash your face.'	

- Nuk ka Al (11)[kush të na dërgojë mall]. a. not have.Impers who Subj us send.1Pl merchandise 'There is noone who can send us the merchandise.'
 - b. Zgdjodhi [kush ta zëvendësojë]. chose.3Sg who Subj-her replace.3Pl 'She chose someone to take her place.'
- (12)Mi nemamo [šta {pročitati/, da pročitamo}] a. we not-have.1Pl what read.Inf Subj read.Perf.Pres.1Pl 'We have nothing to read.'
 - da b. Poslaću ti $\int S$ čime {*oprati/ send.will.1Sg you.Dat with what.Instr wash.Inf that opereš} pod] wash.Perf.Pres.2Sg floor 'I will send you something with which to wash the floor.'
- (13)Laysa li [mā af'alu]. is-not to-me what do.Indic.Imperf.1Sg 'There is nothing I can do.'

In (1)-(11), the modal force of MECs is reflected in the grammatical mood of their verb, which is either infinitive or subjunctive, subject to some cross-linguistic and intra-linguistic variation. Earlier works known to me that mentioned or analyzed MECs, in particular Pesetsky (1982), Suñer (1984), Rappaport (1986), Rivero (1986), Rudin (1986), Grosu (1989, 1994), Grosu and Landman (1998), and Izvorski (1998), have all assumed that a non-indicative mood is an inherent property of MECs. This assumption is, as far as I can tell, basically correct, provided that in languages which do not have a morphological indicative/subjunctive contrast (e.g., Modern Hebrew, Serbo-Croatian), we make the reasonable assumption that MECs with finite verbs are "concealed subjunctives". As for the choice of Infinitive or Subjunctive, it is sometimes fixed for an entire language, e.g., Modern Greek, Albanian, Bulgarian and Macedonian invariably use the Subjunctive (there being in fact no infinitive in these languages), while French and Russian invariably use the infinitive (although a distinct subjunctive exists). In other cases, the choice of grammatical mood varies from situation to situation within a single language, e.g., Spanish requires the subjunctive when the wh-element is the MEC's subject, and the infinitive otherwise, while Romanian requires the subjunctive with wh-subjects, but allows variation otherwise. Some languages are sensitive to whether the matrix predicate is of type (i) or (ii) – e.g., Serbo-Croatian requires the subjunctive (which, as noted above, has concealed status) with predicates of type (ii), but allows alternation with the infinitive with predicates of type (i), and an analogous, if somewhat weaker effect of this kind is found in Romanian (see (12b) and (1b) respectively).

Some of the writers that addressed MECs, and in particular, some of those that adopted one of the three approaches alluded to above, proposed that MECs have certain exceptional characteristics, and that within a model of grammatical description

SC

ClA

that recognizes a "core" and a "periphery", certain properties of MECs belong to the periphery; to put this another way, MECs are, in certain respects, "marked" constructions, or "syntactic idioms". This conception is made prominently explicit in Rappaport (1986), who moreover expresses the uncontroversial view that an optimal analysis should aim at maximizing the core properties and minimizing the peripheral properties of a construction. I will argue, however, that the particular approach adopted by Rappaport is on the wrong track, and that it misidentifies the core and the peripheral properties of MECs.

In part, the reason for this state of affairs may lie in the fact that Rappaport's analysis addressed exclusively data from Russian - a language in which MECs exhibit a special twist that has not, to my knowledge, been reported with respect to other languages: When the matrix clause is semantically negative, negation contracts morphologically with the wh-pronoun, and the resulting complex word may be separated from the remainder of the subordinate clause by elements of the matrix (cf. (17b)) – a state of affairs which suggests that the wh-element is itself part of the matrix, at least in superficial representation. To account for this state of affairs, Rappaport proposes that morphological contraction is a lexical process, and that the contracted forms, although morphologically distinct from every uncontroversial indefinite pronoun of the language, are nonetheless indefinite pronouns that get base-generated (in more recent teminology, merged) as part of the matrix. MECs are thus viewed as complex nominals consisting of an indefinite pronoun and a complement clause, and thus as core constructions from the configurational perspective. As for the idiosyncratic properties of MECs, Rappaport proposes the following: (A) The matrix predicates that allow MECs as arguments are lexically marked. (B) The wh-pronouns of MECs, whether combined with negation or not, are exceptional in that they also exhibit some of the properties of "syntactic quantifiers" (i.e., relative or interrogative pronouns that have undergone movement to [Spec, CP]), namely, (i) an inability to occur without an accompanying IP (in the case of MECs, the presumed complement clause), and (ii) the fact that their morphological, syntactic and semantic properties are entirely determined by the subordinate clause.

I believe that something like (A) is in fact necessary for an adequate analysis of MECs (see section 4), but (B) strikes me as unnecessarily *ad hoc*. The proposed "complement" relation between the wh-element and the subordinate clause is unlike any complement relation known to me, and can in general be straightforwardly accounted for by taking the wh-element to be base-generated within the subordinate IP and subsequently fronted to the Spec of some category within the subordinate "CP area" (in the sense of Rizzi 1997). Such an analysis is fully adequate for all other languages with MECs that I know of. As for the ability of Russian wh-forms to raise to the matrix out of Russian MECs, this can be handled in a reasonably simple alternative way (for a proposal, see section 2).

The other two approaches to MECs were put forward, respectively, in Grosu and Landman (1998) (who built on Grosu 1989, 1994) and in Izvorski (1998). Both approaches converge on the view that the wh-element of a MEC originates within the

subordinate IP and remains within the subordinate CP at all levels of representation.³ In fact, both sets of writers argued that MECs are "bare" CPs. But while Grosu and Landman view MECs as "relative clause constructions of a special (i.e., peripheral) kind", the principal distinction between them and core relative constructions being that they do not exhibit any kind of CP-external "pivot" (that is, a "head" or a correlate), Izvorski proposed to view MECs as "featurally underspecified interrogatives". In viewing MECs as configurationally and morpho-syntactically indistinct from (standard) interrogatives, Izvorski went further than Grosu and Landman in her attempts to "regularize" MECs, and thus to maximize their core-grammar properties. Elegant in itself, this particularly step will be shown to be inadequate in a number of ways.

While Grosu and Landman's and Izvorski's analyses avoid the objections that were raised with respect to Rappaport's point (B), I will argue that they both fall short of full adequacy in a number of ways, and that some of the problems they face are traceable to their shared view that MECs are construed as properties at the CP level, "the matrix being entirely responsible for their quantificational properties". I will also argue that a higher degree of adequacy can be achieved by viewing the matrix and the subordinate clause as jointly responsible for the quantificational force of MECs, in the sense that the source of quantification is MEC-internal, with the matrix playing a licensing role.

The remainder of the paper is organized as follows: In section 2, I review the principal arguments offered in Grosu (1989, 1994), Grosu and Landman (1998) and Izvorski (1998) in support of a "bare CP" analysis of MECs, strengthening some of them with novel evidence, and arguing for the superiority of this analysis over the one proposed in Rappaport (1986) with respect to Russian. Section 3 shows that, while a substantial class of data arguably provides *prima facie* support for the view that MECs are syntactic and morpho-syntactic interrogatives, other data show that such a view cannot be maintained in general. Section 4 develops my own analysis of MECs, which builds on an insight of Izvorski's, while introducing modifications that enable it to overcome some of the difficulties that confront her analysis. Section 5 is a summary of results.

2. The bare CP status of MECs

In this section, I reproduce, refine, and briefly illustrate a number of arguments from earlier literature in support of a bare CP analysis of MECs. The facts to be discussed argue against any complex-XP analysis of MECs, whether the CP-external "head" is taken to be the wh-phrase (as proposed by Rappaport 1986) or a null element (as in the structure assigned to Free Relatives in Groos and van Riemsdijk 1981 and numerous later works (for some references, see Grosu 2002, 2003, to appear).

A first argument (from Grosu and Landman 1998), is that extraction out of MECs is easier than extraction out of FREEs or overtly headed DPs in certain languages, and moreover has the essential degree of acceptability of extraction out of

³ The data from Russian discussed by Rappaport were not addressed.

non-indicative interrogatives (which I take to be uncontroversially bare CPs) in the corresponding languages. Illustrations of this state of affairs are provided in (14)-(14') with Romanian and Hebrew data, the bracketed structures in the (a)-(d) sub-cases being free relatives (FREE), MECs, interrogatives (INTER), and overtly headed DPs.⁴

(14)	a.	*Despre ce (nu) ai pe [cine t vorbește cu Ro-FREE about what not have.2Sg Acc who speaks with Maria t] în clasa ta? Maria in class-the your '*What do(n't) you have [who is talking to Maria about t] in your class?'
	b.	<i>Despre ce (nu) ai [cu cine să vorbești</i> t t]? Ro-MEC about what not have.2Sg with who Subj talk.2Sg 'What is such that you have no one with whom to discuss it?'
	c.	<i>Despre ce nu ştii [cu cine să vorbeşti</i> t t]? Ro-INTER about what not know.2Sg with who Subj talk.2Sg 'What is such that you don't know who to talk to about it?'
	d.	<pre>?*Despre ce nu ai pe [nimeni [cu care să Ro-DP about what not have.2Sg Acc nobody with who Subj vorbeşti t t]]? talk.2.Sg 'What is such that you have no one with whom to discuss it?'</pre>
(14')	a.	<pre>*al ma {yesh/eyn} lexa (et) [mi she medaber im Hu-FREE on what is is-not to-you Acc who that talks with miriam t] be-kitatxa? Miriam in-class-your '*What do(n't) you have [who is talking to Miriam about t] in your class?'</pre>
	b.	<i>al ma {yesh/eyn} lexa [im mi ledaber</i> tt]? Hu-MEC on what is is-not to-you with who to-talk 'What is such that you have no one with whom to talk about it?'
	c.	<i>al ma eynxa yode'a [im mi ledaber</i> tt]? Hu-INTER on what not.2Sg know with who to-talk 'What is such that don't you know who to talk to about it?'
	d.	*al ma eyn lexa [af exad [ito efšar Hu-DP on what is-not to-you anyone with who (it is) possible ledaber t t]]? to-talk 'What is such that you have no one with whom it is possible to talk about it?'

⁴ Note that the subordinate clause in (14d) is subjunctive, just as the one in (14b).

Past studies of constraints on extraction out of subordinate clauses have shown that there are two factors which potentially reduce extractability: (a) the indicative status of the clause and (b) the existence of two potentially blocking constituent boundaries that must be crossed in a single step (Subjacency). While (14a) and (14'a,d) violate both constraints, (14d) violates (b) only. The fact that (14b) is decidedly more acceptable than (14d), as well as the fact that the (b) subcases in both sets of examples have the essential acceptability of the corresponding (c) subcases, point to the conclusion that MECs are bare CPs, just like interrogatives.

The second, and to my mind strongest argument in favour of a bare CP analysis of MECs, is the total absence of certain constraints that are typically found in complex nominals that consist of a CP-external head and an adjunct clause with a filled [Spec, CP]. One of the constraints at issue (known in the generative literature as "matching effects") concerns the extent to which the Case and categorial properties of the external head and those of the phrase in [Spec, CP] may differ from each other when exactly one of these two elements is null. Matching effects, which differ in severity cross-linguistically, have been extensively documented with respect to free relatives (see, for example, Grosu 1994, to appear, and references therein), and also with respect to headed relatives with a null operator in [Spec, CP] (see Bayer 1984) and comparative constructions (see Grosu to appear). In contrast, matching effects are completely absent in interrogatives, which, as noted already, are bare CPs. The fact that matching effects are also completely absent in MECs, strongly points to the conclusion that MECs, too, are bare CPs. Another kind of constraint that strongly affects free relatives, but is absent from interrogatives and MECs, concerns the Pied Piping of a DP by a wh-pronoun in its Spec (Grosu 1989, 1994, to appear). This state of affairs reinforces the conclusion reached on the basis of matching effects, namely, that MECs are bare CPs, just like interrogatives.

The facts just described are illustrated in (15)-(16) with data from Romanian and Hebrew, respectively. The bracketed structures in the (a)-(c) sub-cases are, respectively, free relatives, MECs, and interrogatives. The non-primed sub-cases illustrate the presence/absence of matching effects, while the primed sub-cases illustrate the presence/absence of the restriction on DP-Pied-Piping by a wh-pronoun in its Spec.

- (15) a. ??Voi cumpăra [cu ce se joacă copilul]. Ro-FREE will.1Sg buy.Inf with what Refl plays child-the 'I will buy what the child is playing with.'
 - a.' *[Cu fiica cui te-ai certat] m-a with daughter-the whose Refl.2Sg-have.2Sg quarreled me-has atacat azi. attacked today 'The person whose daughter you quarreled with attacked me today.'
 - b. *N-am* [cu cine vorbi]. Ro-MEC not-have.1Sg with who talk.Inf 'There is nobody with whom I can talk.'

	b.'	<i>N-am</i> [cu fiica cui să vorbesc]. not-have.1Sg with daughter-the whose Subj talk.1Sg 'There is nobody whose daughter I can talk to.'	
	C.	<i>Nu ştiu [cu cine să vorbesc].</i> not know.1Sg with who Subj talk.1Sg 'I don't know who to talk to.'	Ro-INTER
	c.'	<i>Nu știu [cu fiica cui să vorbesc].</i> not know.1Sg with daughter-the whose Subj talk.1Sg 'I don't know whose daughter to talk to.'	
(16)	a.	*[Im mi she Miriam medaberet] takaf oti. with who that Miriam is-speaking attacked me 'The person who Miriam is talking to attacked me.'	Hu-FREE
	a.'	*[Im bito shel mi itvakaxta] takaf oti. with his-daughter of whom you-argued attacked me. 'The person whose daughter Miriam is talking to attacked n	ne.'
	b.	<i>Eyn li [im mi ledaber]</i> . not me with who talk.Inf 'There is nobody with whom I can talk.'	Hu-MEC
	b.'	<i>Eyn li</i> [<i>im bito</i> shel mi le-daber]. not me with his-daughter of whom to-speak 'There is nobody whose daughter I can talk to.'	
	C.	<i>Eyneni yode'a [im mi ledaber].</i> not-I know with who talk.Inf 'I don't know who to talk to.'	Hu-INTER
	c.'	<i>Eyneni yode'a [im bito shel mi le-daber].</i> not-I know with his-daughter of whom to-speak 'I don't know whose daughter to talk to.	

It seems appropriate at this point to address the special facts of Russian discussed by Rappaport (1986) (see section 1). While matching effects are clearly absent from Russian MECs, as can be gathered from (6) and (18) (= Rappaport's (2a-b)), the wh-pronouns (which have the morphology of interrogative pronouns) may, and in prescriptive Russian must, morphologically contract with matrix negation. The contraction process is illustrated by the (b) subcases of (17) (= Rappaport's (1)) and (18), and has the following consequences: (a) stress shifts from the wh-element to negation, (b) negation loses its ability to license negative polarity items (see Rappaport's section 3.3.5.), and (c) the wh-pronoun becomes a sub-element of an element of the matrix. I wish to note that the effect in (b), and more generally, the fact that an element involved in contracted counterpart can, is not an unexpected or *sui-generis* state of affairs. A comparable situation is found in the internally-headed relatives of Navajo,

where the object of a postposition can in general function as an internal head, but loses this ability if the preposition encliticizes on the noun, forming a contracted form (Platero 1974). Another comparable situation is found with the process that yields forms like *thereon* from *on it/that*, and which is quite productive in German and Dutch; as illustrated with German (Ger) data in (19), a non-contracted pronoun may be modified by a relative, but a contracted form basically resists modification.⁵ As for the effect in (c), it is illustrated in (18b), where the sequence *ne o čem* is separated from the remainder of the subordinate clause by the matrix verb *budet*.

(17)	a.	<i>Nam est' [čto delat'].</i> us.Dat is what do.Inf 'There is something we can do.'	Ru
	b.	<i>Nam nečego [delat'].</i> us.Dat Neg-what do.Inf 'There is nothing for us to do.'	
(18)	a.	<i>Nam budet</i> [o čem dumat']. us-Dat will-be.3Sg about what think.Inf 'There will be something for us to think about.'	Ru
	b.	<i>Nam ne o čem budet [dumat'].</i> us.Dat Neg about what will-be.3Sg think.Inf 'There will be nothing for us to think about.'	
(19)		sich immer nur {mit dem/?*damit} beschäftigt, was s Refl always only with that therewith busied what	Ger

(19) Et hat sich immer har {mit dem/? damit; beschäftigt, was
 (19) Et hat sich immer har {mit dem/? damit; beschäftigt, was
 (19) he has Refl always only with that therewith busied what
 ihm von Nutzen sein konnte. him of use be could
 'He has always been concerned only with that which could be useful to him.'

An important aspect of effect (c) above is that it only occurs in the presence of contraction. For example, the wh-forms in (17a) may not occur to the left of the matrix verb, so that there is no reason for viewing them as elements of the matrix. I take it that there is no justification for assuming Rappaport's highly *ad hoc* complement structure (see section 1), and that the data in (17)-(18) can be analyzed just like the MECs of other languages, that is, as bare CPs with a fronted wh-element, with the only additional Russian-specific proviso that when the matrix contains a Neg element, wh-phrases must (and in colloquial speech, may) raise into the matrix and contract with Neg. As far as I can see, the contraction process has no effect on semantic interpretation, so that some version of "reconstruction" is needed to ensure that contracted and non-contracted forms are interpreted in the same way.

Before turning to the next argument for bare CP status, I wish to note that the picture I have drawn on the basis of the data in (15)-(16) is subject to a caveat: While the (c') sub-cases of (15)-(16) are immediately accepted by informants, the cor-

⁵ If the pronominal subpart is emphatically stressed, some speakers report partial improvement.

responding (b') sub-cases are sometimes accepted only if a suitable context has been made sufficiently salient. For example, the following context induces full acceptance of the MECs in (15b') and (16b'): 'I have already spoken with the daughter of each of those guys, and I no longer have ...' I suggest in fn. 16 that these effects, as well as others that will be noted in connection with (22) below, may be traceable to the fact that MECs are arguably peripheral constructions, in contrast to interrogatives, which belong to the grammatical core.

A third argument for the bare CP status of MECs was put forward in Grosu and Landman (1998), where it was pointed out that MECs allow multiple wh-phrases under certain circumstances. Multiple wh-phrases seem to be generally possible in CPs that do not form a constituent with an external "head". In particular, they are allowed in interrogatives, in CP-adjoined correlatives, and in adverbial concessives (for independent arguments that the latter are bare CPs, see Izvorski 2000). At the same time, they seem to be generally disallowed in headed constructions, and in particular, in free relatives (which I assume to be headed by null material; for arguments, see Grosu to appear, and references therein). The availability of the multiple wh option in interrogatives, adverbial concessives, and MECs and its unavailability in free relatives are illustrated in (20)-(23) respectively.

- (20) I wonder what to send to whom.
- (21) Whichever of you flies to whatever destination, I, for one, am staying put.

(22)	(22) a. <i>Nu mai avem pe cine cu cine împerechia.</i> not more have.1Sg Acc who with who match.Inf			
	a.'	?*Nu mai avem pe cine împerechia cu cine.		
		'We no longer have pairs of individuals that we can match.'		
	b.	Nincs kitkivelösszepárosítanunkis-not who-Acc who-withup-match.Inf.1.Pl	Hu	
	b.'	?*Nincs kit összepárosítanunk kivel		
		'We don't have pairs of individuals that we can match.'		
(23)	a.	*[(Ori)cine cu (ori)cine dansează] trebuie să who(ever) with who(ever) dance.Subj.3Sg must.3Sg Subj meargă la cinema împreună. go.Subj.3Sg to cinema together Purported sense: 'Each dancing couple must go see a movie togeth	Ro er.'	
	b.	*[ki kivel táncol] {jöjjön/jöjjenek} ide együtt. who.Nom who-with dances come.Subj.3Sg/3Pl here together Purported sense: 'Each dancing couple must come here together.'	Hu	

The reason for the deviance of data like (23) is not clear to me, but it seems to be a robust fact nonetheless. In earlier literature, this state of affairs has often been attributed to the presumed fact that only one of the wh-forms can (a) occur in head position (under the CP-external wh-headed analysis of Bresnan and Grimshaw 1978) or (b) be related to an external null head (under the analysis of Groos and van Riemsdijk 1981), but this is not necessarily so. Thus, if one adopts the null-head analysis, the null head can in principle function as a plural "anaphor" with "split" antecedents. In fact, such a reading would make sense in (23a-b), as suggested by the purported translations, but these examples are nonetheless deviant. A particularly clear demonstration that the deviance of complex DPs with multiple relative pronouns is not reducible to violations of the X-bar theory or to uninterpretability can be appreciated on the basis of the Hindi data in (24), which were kindly constructed (at my request) by R. Bhatt. In Hindi (Hi), correlatives may occur adjoined either to IP or to DP, but may exhibit multiple j-phrases in the former case only. Importantly, IP-adjoined correlatives with multiple j-phrases may have a single plural correlate in the matrix, as illustrated in (24a). Note that X-bar theory is not violated if such a correlative is adjoined directly to a single plural correlate, but as shown in (24b), the result is deviant nonetheless.⁶ In short, it seems that, for whatever reason, complex DPs are unable to exhibit multiple relative pronouns. The contrast between (23) and the non-primed versions of (22) thus favours a bare CP analysis for MECs over a complex DP analysis.

- (24) a. [jo laRkii jis laRke-se baat kar rahii thii], Maya kal wh girl wh boy-Instr talk do Prog Past Maya tomorrow paadri-se un-kaa ek-dusre-se parichay kar-vaa-yegii. priest-Instr Dem-Gen with-each-other introduce do-Caus-Fut 'Which girl was talking to which boy, Maya will have the priest introduce them to each other tomorrow.'
 - b. *[jo paadrii ruusi hai], Maya kal us paadri-se wh priest Russian is Maya tomorrow Dem priest-Instr [jo laRkii jis laRke-se baat kar rahii thii] un-kaa ek-dusre-se wh girl wh boy-Instr talk do Prog Past Dem-Gen with-each-other parichay kar-vaa-yegii. introduce do-Caus-Fut '*Which priest is Russian, Maya will have that priest introduce [which girl was talking to which boy] those to each other tomorrow.'

All of this notwithstanding, it needs to be pointed out that MECs with multiple whelements cannot be freely formed, and seem to reach a reasonable level of acceptability just in case all wh-phrases have been fronted, as can be appreciated by comparing the primed and non-primed sub-cases of (22); correlatively, in languages that do not permit multiple fronting, e.g., French and Hebrew, MECs with multiple wh-forms are

Hi

⁶ An additional correlative has been adjoined to the matrix IP to ensure that the other correlative is necessarily adjoined to DP, since it seems to be in general impossible to adjoin two correlatives to the same IP.

felt to be marginal or unacceptable.⁷ At the same time, languages that do permit (or require) multiple fronting, seem to tolerate MECs with multiple wh-forms reasonably well. Additional illustrations from Serbo-Croatian, Polish, and Russian are provided in (25a)-(25c) respectively.

(25)	a.	<i>Mi više</i> we no-longer <i>pošaljemo]</i> . send.Perf.Pre	nemamo not+have.1Pl s.1Pl	[kome whom.Dat	<i>šta</i> what	<i>da</i> Subj	SC
		'We no longe a to b.'	r have pairs of	individuals <	<a,b> such</a,b>	that we can	n send
	b.	we-have who	o <i>z kim</i> m with whom rs of individua	matchmake.I			Ро
	c.	0	t' [kogo s k who with w	-	-		Ru

(25c) deserves special comment. Rappaport (1986, section 3.3.1) asserts that multiple wh-forms are impossible in Russian MECs. However, the data with which he supports this claim (his (20a-b)) are arguably unacceptable because only one wh-element is fronted, the other being left *in situ*. (25c) (kindly provided to me by H. Trugman) shows that Russian MECs do basically tolerate multiple wh-forms under conditions of multiple fronting.

'He has pairs of individuals $\langle a, b \rangle$ such that he can introduce a to b.'

A fourth property of MECs which points in the same direction as the first property noted above (greater transparency to extraction than is found in free relatives) is that Clitic Climbing out of MECs is possible in some languages, while Clitic Climbing out of free relatives has not been attested, to the best of my knowledge. The contrastive behaviour of Clitic Climbing with respect to MECs and free relatives is illustrated below with data from Serbo-Croatian. This contrast supports the hypothesis that MECs, unlike free relatives, are bare CPs, since under this view, Clitic Climbing needs to cross fewer constituent boundaries in the case of MECs.

(26)	a.	Nemam ga [kome dati]	SC-MEC
		not-have.1Sg it.Acc who.Dat give.Inf	
		'I have no one to give it to.'	
	b.	*Ja ga ne odobravam [što kažnjavaš].	SC-FREE
		I him not agree approve.1Sg that punish.2Sg	
		'I do not agree that you punish him.'	

b.' cf.: Ja ne odobravam što ga kažnjavas.

 $^{^{7}}$ For certain speakers, there is an improvement when the wh-phrase *in situ* is strongly stressed (see fn.17 for a suggestion concerning this effect).

I note in passing that extraction out of embedded interrogatives is disallowed in Serbo-Croatian (Z. Bošković p.c.), so that the facts in (26), while supporting a bare analysis of MECs, do not support Izvorski's thesis that MECs are interrogatives. Izvorski in fact adverts to Rizzi (1982) and Kayne (1993) for "highly restricted" Clitic Climbing options out of Romance infinitival interrogatives, but in the absence of comparable data with MECs in the same languages, such facts fail to support her thesis.

Summarizing the gist of this section, we have seen that there are at least four types of phenomena that support the hypothesis that MECs are bare CPs.

3. Similarities and differences between MECs and interrogatives

In addition to the facts discussed in the preceding section, some of which reveal a certain parallelism between interrogatives and MECs, Izvorski (1998) notes three additional language-specific phenomena, which bring out a comparable parallelism. At the same time, there exist phenomena from other languages with respect to which MECs and interrogatives do not behave in the same way. This state of affairs argues against the view that MECs can be reduced to interrogatives **in general**, and shows that the kinds of parallelism noted by Izvorski constitute at best a tendency, but not a necessary state of affairs.

A first phenomenon that reveals a common patterning of MECs and interrogatives concerns the morphology of wh-elements in certain languages, for example, in Modern Greek, Bulgarian and Hungarian. Izvorsky points out that the wh-pronouns of free relatives in these languages exhibit an affix which constitutes a reduced form of the definite article, and that such affixes are absent in both interrogatives and MECs. This point is illustrated in (27) in relation to the Nom form of the counterparts of *who*.

(27)	Greek	Bulgarian	Hungarian	
	pjos	koj	ki	INTER
	o-pjos	koj-to	a-ki	FREE
	pjos	koj	ki	MEC

This fact undoubtedly reveals a common patterning of interrogatives and MECs, but it is unclear that further conclusions can be drawn from it. Izvorski proposes that the affixes which occur in free relatives constitute an overt reflex of the uniqueness operator that is part of the semantics of free relatives (Jacobson 1988, 1995; Grosu and Landman 1998). It is unclear, however, that so tight a connection between morphology and semantics is warranted in this case, because the same affix occurs in these languages on the relative pronoun of restrictive clauses with an indefinite head, which clearly involve a non-vacuous set intersection and can have no uniqueness operator within CP.

A second language-specific phenomenon pointed out by Izvorski (1998) is that resumptive pronouns in Modern Hebrew are allowed within free relatives, but not within interrogatives or MECs, as shown in (28).

(28) a. Mi she Miriam katva lo mixtav] hofi'a po MH-FREE

who that Miriam wrote him letter showed-up here *ha-boker*.
this morning
'(The one) Miriam wrote a letter to showed up here this morning.'

- b. Eyneni yode'a [le mi lixtov (*lo) mixtav]. MH-INTER not.1Sg know to who write.Inf him letter 'I don't know who to write a letter to.'
- c. *Eyn li [le mi lixtov (*lo) mixtav]*. MH-MEC is-not to-me to who write.Inf him letter 'I have no one to whom I can write a letter.'

A third language-specific phenomenon with comparable import, also pointed out by Izvorski, is that in Bulgarian free relatives, subjects may intervene between the whelement and the verb, but in embedded interrogatives and in MECs, they may not:

(29)	a.	[Kakvo-to Paulina risuva] mi haresva. what-that Paulina draws me.Dat pleases 'I like what Paulina is drawing.'	Bu-FREE
	b.	??Čudja se kakvo Paulina risuva. wonder.1Sg Refl what Paulina draws 'I wonder what Paulina is drawing.'	Bu-INTER
	b.'	Čudja se kakvo risuva Paulina.	
	c.	 ? Ima kakvo Paulina da jade. has.Impers what Paulina Subj eats 'There is something that Paulina can eat.' 	Bu-MEC

c.' Ima kakvo da jade Paulina.'

We now turn to phenomena that distinguish MECs from interrogatives at the morphosyntactic level. A first distinction is that while in Romanian and Hungarian, MECs may occur in either the infinitive or the subjunctive mood when the wh-element is not the MEC's subject, in non-indicative interrogatives, the infinitive is disallowed in general, the subjunctive being the only option. Illustrations from Romanian and Hungarian are provided in (30)-(31).

1.	(Nu) avem [cui {trimite/ să trimitem} marfă]. not have.1Pl who.Dat send.Inf Subj send.1Pl goods	Ro-MEC				
'We have {someone, no one} to whom we can send some goods.'						
Э.	(Nu) știm [cui {*trimite/ să trimitem} marfă].	Ro-INTER				
	, e					
		not have.1Pl who.Dat send.Inf Subj send.1Pl goods 'We have {someone, no one} to whom we can send some g				

- (31) a. *Nincs ki-nek {irnunk/ irjunk}*. Hu-MEC is-not who-to write.Inf.1Sg write.Subj.1Pl 'We have no one we can write to.'
 - b. *Tudom, (hogy) ki t {*látni/ lássak}* Hu-INTER know.1Sg that who-Acc see.Inf.1Sg see.Subj.1Sg 'I know who to see.'

In Hungarian, there is also a second difference between the two kinds of construction: While subjunctive interrogatives may optionally be initiated by the complementizer hogy (as illustrated in (31b)), neither subjunctive nor infinitival MECs may be initiated by it, as illustrated in (32a-b). Hogy is actually ruled out in every kind of relative clause of Hungarian, including free relatives (as illustrated in (32c)), and this state of affairs has generally been analyzed in the generative literature by assuming (i) that relative pronouns move to [Spec, CP], (ii) that Hungarian obeys the "doublyfilled COMP" constraint, and (iii) that interrogative phrases move to a position lower than [Spec, CP], e.g., the position of adjunction to IP (see Kenesei 1994 and references therein). Thus, with respect to the hierarchical position of the wh-element, Hungarian MECs pattern with relatives of all types, not with interrogatives. At the same time, the wh-elements of MECs exhibit the morphology of interrogatives, not of free relatives or other relatives, which include a pronominal affix, much as in Modern Greek and Bulgarian (see (27) and (32c)). Thus, Hungarian MECs exhibit a mixed pattern, their wh-elements patterning with interrogatives - morphologically, and with relatives - configurationally. I am most grateful to Julia Horvath for bringing this array of facts to my attention and for pointing out their implications.

(32)	a.	<i>Van (*hogy) ki segítsen nekem.</i> is that who.Nom help.Subj.3Sg me.Dat 'There is someone who can help me.'	Hu-MEC
	b.	<i>Nincs ki-nek (*hogy) {írnunk/ írjunk}.</i> is-not who-to that write.Inf.1Pl write.Subj.1Pl 'We have no one we can write to.'	Hu-MEC
	c.	<i>Elek látt-a (*hogy) a-mi Anna elött volt.</i> Alec saw-do that it-what.Nom Anna before was 'Alec saw what was before Anna.'	Hu-FREE

Hungarian in fact provides further evidence against collapsing MECs with interrogatives: when the verb has a pre-verb and is in the subjunctive mood, the pre-verb must follow the verbal stem in interrogatives, but may (and sometimes must) precede it in MECs, as shown in (33).

(33)	a.	Nincs [kit öss	1	2		Hu-MEC
		is-not who.Acc up	-match.Subj.1Sg	Mary-with		
		'There is no one I c	an match with M	lary.'		
		T 1 D .	, , , ,		. 17	

b. Tudom [kit párosítsak össze Marival] Hu-INTER

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know.1Sg who.Acc	match.Subj.1Sg up	Mary-with
'I know who to match	up with Mary.'	

Finally, Hebrew provides an illustration of MECs patterning with free relatives all the way. This occurs when the wh-element is the subject of the wh-clause. Thus, consider (34).

(34)	a.	Eyn li [mi {*la-azor, *(she) yuxal la'azor} li].	MH-MEC				
		not to-me who to-help that will-can to-help me					
		'I have no one who will be able help me.'					

b. *Tagid li mi {*la-azor, (*she) yuxal la'azor } li.* MH-INTER tell me who to-help that will-can to-help me 'Tell me who will be able to help me.'

Hebrew free relatives contrast with interrogatives of all types (in fact, with every other clausal construction of the language, including MECs) in exhibiting a doubly filled COMP, in particular, a morphologically interrogative pronoun and a non-interrogative complementizer. Just like Hungarian and Romanian, Hebrew disallows infinitival wh-clauses whose subject is a wh-element, as illustrated with respect to interrogatives in (34b). Note that this example also illustrates the impossibility of a doubly-filled COMP in interrogatives, while the impossibility of an infinitival MEC with a wh-subject is illustrated in (34a). At the same time, Hebrew contrasts with Hungarian and Romanian in having no explicit subjunctive distinct from the indicative, the typical senses of this mood being rendered by a future finite form, by a lexical modal verb, or by the combination of the two. As can be seen in (34a), the Hebrew counterpart of constructions like (1a') and (5a') has the precise superficial appearance of a free relative (note the finite mood), but cannot be considered a genuine free relative, since such constructions are typically definite, as noted by Jacobson (1988, 1995)⁸, while the bracketed well-formed expression in (34a) is a narrow-scope indefinite, just like MECs in general. This conclusion is supported by the observation that extraction out of the subordinate clause in (34a) has the essential acceptability of (14b), not of (14a), as illustrated in (35a), which forms a minimal pair with (35b).

(35)	a.	?Al ma	eyn	l xa	[mi	she yuxal	ledaber t]?	MH
		on what	is-no	t to-you	ı who	that will-be-	able to-talk	
		'What is	such t	hat you	ı have	e no one who	can talk about it?'	

b. **Al ma pagashta etmol (et) [mi she yuxal* MH on what met.2Sg yesterday Acc who that will-be-able

⁸ More exactly, their semantics involves a MAX operator (see Grosu and Landman 1998; Grosu 2002, To appear a, To appear b).

ledaber t]? to-talk 'What is such that you met yesterday someone who can talk about it?'

The conclusion that emerges from what has been said so far is that MECs share with interrogatives the property of being bare CPs, and often, but not always, exhibit the overt internal syntax of interrogatives. Since the latter property is not exceptionless, it can at most reflect a tendency, not a necessary state of affairs, and cannot form a basis for an analysis of MECs as a sub-instance of interrogatives.

4. **Properties of MECs and their analysis**

In this section, I list and discuss the properties of MECs known to me,⁹ proposing an analysis.

4.1. Properties of MECs

[A] MECs share with bare CP constructions a number of syntactic properties that distinguish such structures from complex XPs, and are thus optimally analyzable as bare CPs, as argued in some detail in section 2.

[B] Although MECs are (in some languages) superficially similar with interrogatives, this similarity is not a necessary universal property, and that fact, in conjunction with semantic differences (see below), points to the conclusion that MECs are not interrogatives in any sense whatsoever.¹⁰

[C] As noted in section 1, MECs have the semantics of a narrow-scope existential GQ, a denotatum that is usually expressed by nominal constructions (i.e., NPs or DPs, depending on one's theory). For example, the MEC in (1a) has the essential semantics of the complex nominal in the English translation. The GQ designated by the MEC has short scope in the sense that existential quantification necessarily falls within the scope of matrix sentential operators, such as modals, temporal operators, and intensional selecting predicates. Moreover, the member-property of the GQ which is expressed by the MEC's IP necessarily includes a possibility/ability modal operator, which, as far as I can tell, is invariably expressed by (explicit or concealed) non-indicative mood, something which, in conjunction with existential quantification, coerces narrow-scope (I return to this last point below).

Narrow-scope coercion by non-indicative clauses is not an exclusive property of MECs, and is also found with overtly headed relative constructions, as demonstrated with English and Romanian data in (36) and (36') respectively.

- (36) a. I am looking for someone to whom I will/can give a prize.
 - b. I am looking for someone to whom to give a prize.

⁹ Some of these properties were noted and illustrated in the preceding sections.

¹⁰ This was demonstrated in detail in section 3.

(36') a. *Caut o secretară care {va, poate} folosi internetul.* Ro look-for-I a secretary who will.Indic.3Sg can.Indic.3SG use internet-the

'I am looking for a secretary who {will, can} use the internet.'

b. *Caut* o secretară care să poată folosi internetul. look-for.1Sg a secretary who Subj can.3Sg use internet-the 'I am looking for a secretary (any secretary) who would be able to use the internet.'

(36a) is compatible with a situation where I have already decided that a specific individual, e.g., John, is the one to whom I will/can give the prize, but (36b) is not. Similarly, (36'a) is compatible with a situation where I already know that Mary is the secretary who will/can use the internet, but (36'b) is not. This shows that in the (b) subcases, but not in the (a) subcases, the matrix object necessarily has narrow scope with respect to the matrix verb. That MECs also have narrow scope can be appreciated in relation to adapted versions of (1a) and (1b), in particular, (1') and (1'') below.

- (1') Vom avea [cui trimite marfă]. Ro will.1Pl have who.Dat send.Inf goods
 'There will be someone to whom we will be able to send merchandise.'
- (1") *Trimite-mi [cu ce să spăl rufele]*. send.Imp-me.Dat with what Subj wash.1Sg clothes.the 'Send me something with which to wash the clothes.'

Thus, (1') cannot mean 'there is some specific individual, say, John, and at some future time, we will be able to send merchandise to him', and (1") cannot mean "there is a particular piece of soap, and send it to me.'

The informal semantic characterization of MECs just provided, coupled with the inappropriateness of viewing them as a kind interrogatives (see [B] above), suggests that MECs are most appropriately viewed as a special kind of relative construction, in particular, one where the wh-phrase plays the essential semantic role of the external NP in externally headed restrictive constructions, and where quantification is achieved without benefit of a CP-external D(eterminer). In other words, MECs may be viewed as relatives without an external 'pivot', and thus – importantly for what follows – a non-core (peripheral, 'marked', etc.) variety (for additional discussion of this point, see Grosu 2002, 2003).

The narrow-scope existential force of MECs and their necessarily nonindicative mood will be analytically addressed below, after we have considered a number of additional properties that they possess.

[D] As noted in section 1, MECs are distributionally confined to the internal argument position of a number of verbs and predicates that have an "existential component" in their meaning, in the sense that they are (or may be) construed as asserting the existence of some entity, or, alternatively, as implying (the causation of) its emergence into existence, availability, or view, and in any event, as a 'novel' entity

Ro

in the universe of discourse (from an informational perspective). Such predicates have been abundantly discussed in the literature (especially in relation to constructions that assert existence; but see Szabolcsi 1986 for a discussion of the entire class), and it has been widely recognized that the existential assertion/implication has narrow scope with respect to intensional and other sentential operators (see, e.g., Heim (1987).

The fact that MECs have existential force and that their possible matrix predicates appear to have an existential component in their meaning points to the possibility that these two facts may be related, and earlier writers have proposed a way of relating them analytically. In particular, Izvorski proposes that MECs are marked for abstraction at the CP level, for example, by the kind of featural characterization proposed in Rizzi (1990) with respect to restrictives,¹¹ and are thus construed as properties at this level. Their quantificational force, according to Izvorski, comes from the existential quantifier implicit in the meaning of the matrix predicate.¹² On the assumption that the predicates studied by Szabolcsi include such a quantifier in their meaning and that no other predicates include quantifiers of any kind in their lexical meaning, both the particular semantic force of MECs and the fact that they are not licensed by predicates outside Szabolcsi's class are predicted. The adequacy of this proposal will be evaluated below.

[E] As also noted in section 1, the class of predicates discussed in Szabolcsi (1986) defines an upper bound on MEC distribution, and thus constitute a necessary condition for their acceptability. They do not, however, constitute a sufficient condition by any means, and this state of affairs is not addressed by Izvorski. In fact, there is no language known to me where all the members of this class felicitously allow MECs, but languages that do not allow MECs with any predicates at all certainly exist.¹³ Actually, there is a great deal of cross-linguistic and cross-idiolectal variation, which seems moreover to have a systematic, one-way implicational character. Thus, some languages disallow MECs entirely, as just noted. Next, there are languages that seem to allow MECs only with predicates that assert existence,¹⁴ and languages that allow MECs with the foregoing as well as with (the counterparts of) find, seek.¹⁵ Finally, there are languages that allow MECs with all of the foregoing, and also with additional predicates, such as buy, wangle, build, send. At the same time, no language known to me seems to easily allow MECs with arrive. An important observation is that relatively 'inaccessible' predicates sometimes require, and benefit from, 'help' from the larger pragmatic context. To illustrate this last point,

¹¹ This proposal says in effect that CP carries the feature [PRED], and no operator feature.

¹² This last assumption was also made by Grosu and Landman 1998.

¹³ E.g., the major Germanic languages. Yiddish allows MECs, possibly under Slavic influence.

¹⁴ According to Barbara Citko and Maria Bittner, Polish is a case in point (see (7)).

¹⁵ According to Evangelia Vlachou and Jairo Nunes (p.c.), Modern Greek and Brazilian Portuguese are such languages. Julia Horvath and Aniko Liptak (p.c.) inform me that Hungarian lies between the foregoing and Polish, allowing MECs with *find*, but not with *seek*.

constructions with *buy* may well be marginal even in the most 'liberal' languages, as illustrated by the Romanian example in (37), but can achieve full acceptability if, for example, the event described in the matrix is transparently understood to be or to have been aimed at precisely the goal specified in the MEC, as illustrated with Romanian, Modern Hebrew and French data in (38). Conversely, even the most recalcitrant kinds of predicates, in particular, *arrive*, can be rendered more 'friendly' under contextual manipulations that imply goal-directed activity. I illustrate this last point with Romanian data in (39).¹⁶

- (37) ?? *Am cumpărat [cu ce să tai pâine]*. Ro have.1SG cut with what Subj cut.1SG bread 'I bought something with which to cut bread.'
- (38)Mi-am Ro a. cumpărat [cu ce să scot ochii me.Dat-have.1Sg bought with what Subj put-out eyes-the tatele din cartier]. la toate fishwives-the from neighbourhood to all 'I bought myself something with which to make all the fishwives in the neighbourhood burst with envy.'
 - b. Kaniti li [be- le-naker et ha-eynayim le-k MH bought.1Sg me.Dat in-what put-out.Inf Acc the-eyes to-all ol ha-xaverot sheli]. the-friends.F my
 'I bought myself something with which to make all my girlfriends burst with envy.'
 - c. Je viens de m 'acheter [de quoi faire crever d' envie Fr I come of me buy.Inf of what make.Inf burst of envy toutes mes copines].
 all my girl-friends 'I have just bought myself something with which to make all my girlfriend burst with envy.'
- (39) a. ?*A sosit [cu ce să curățăm podeaua]. Ro has arrived with what Subj clean.1Pl floor-the Purported sense: 'Something with which we can clean the floor has arrived.'
 - b. *?Datorită eforturilor lui Ion, ne-a sosit în fine [cu* thanks efforts-the the.Dat Ion us.Dat-has arrived in end what

¹⁶ I return to the circumstances under which pragmatic help is needed below.

ce să curățăm podeaua]. with Subj clean.1Pl floor-the 'Thanks to Ion's efforts, something with which to clean the floor has finally reached us.'

Before turning to other properties of MECs, I wish to note, for the sake of completeness, a Hungarian construction kindly pointed out to me by an anonymous referee, which *prima facie* seems to fall outside the range of licensing options noted with respect to Hungarian in fn. 16 (assertion of existence, plus *find*):

(40) *A viz nem tudott [hova folyni]*. Hu the water not could where flow.Inf 'There is no place fort the water to flow to/the water has nowhere to flow.'

However, as the referee also observes, the verb *tud*, which means 'know' elsewhere and 'can' in this context conveys a denial (i.e., a negative assertion) of existence, and thus in effect falls within the proposed range of licensing predicates.

[F] A property of MECs, which, as far as I can tell, has not been detected so far, is that they seem to be entirely unable to function as predicates, whether of the post-copular, small-clause, or adnominal variety. I illustrate the impossibility of post-copular use with Romanian and Modern Hebrew data in (41a-b) respectively; (41a) also shows that the intended meaning can be expressed with an overtly headed complex nominal.

- (41) a. Săpunul ăsta este [{ceva cu care/ *cu ce}] să Ro soap-the this is something with which with what Subj te speli pe față]. Refl.2Sg wash on face 'This piece of soap is something with which to wash your face.'
 - b. **Ha-sabon ha-ze (hu) [be ma lirxoc et ha-panim].* MH the-soap the this is with what to-wash Acc the-face Purported meaning analogous to (38a)

As far as adnominal modification is concerned, it seems to be unavailable to MECs whenever they are superficially distinguishable from restrictive relatives. For example, Romanian restrictive relatives use the relative pronoun *care* 'which' when the CP-internal relativized element is a subject or object, but *cine* (for animates) in MECs; the impossibilility of MECs as restrictive modifiers is illustrated with Romanian data in (42).

(42) *Cineva {care/*cine} să ne ocrotească nu poate fi găsit.* Ro someone which who Subj us protect.Subj.3Sg not can be found 'Someone who would protect us cannot be found.'

[G] A final intriguing property of MECs, which seems to be entirely exceptionless, is that they are completely incompatibility with free-choice items that modify whelements, such as the wh+ever forms of English (which are found in free relatives and concessive adverbials). This point is illustrated with Romanian data in (43)-(44), but comparable effects are found in every other language I have been able to check (in particular, in Hungarian, Modern Greek and the South Slavic languages). A remarkable fact, indicated in the (b) subcases, is that the kind of data at issue are not merely deviant, but in fact completely uninterpretable.

- (43) a. Ion poate avea [{ceva/ orice} cu care să ne atace] Ro Ion may have something anything with which Subj us attack.3Sg în buzunar.
 in pocket
 'Ion may have something/anything with which to attack us in his pocket.'
 - b. Ion poate avea [cu (*ori)ce să ne atace] în buzunar.
 Ion can have with (ever)what Subj us attack.3Sg in pocket
 Reduced version: 'Ion may have something with which to attack us in his pocket.'
 Full version: uninterpretable.
- (44) a. *Trimite-mi [{ceva/ orice} cu care să curăț podeaua]*.Ro send-me something anything with which Subj clean.1Sg floor-the 'Send me something/anything with which I can clean the floor.'
 - b. Trimite-mi [cu (*ori)ce să curăț podeaua].
 send-me with (ever)what Subj clean.1Sg floor-the
 Reduced version: 'Send me something with which to clean the floor.'
 Full version: uninterpretable.

Note that the effect at issue cannot be (entirely) blamed on the semantics of the matrix predicates, since such predicates do allow expressions with free-choice import that are not MECs (under conditions that need not concern us here), as illustrated in the (a) subcases of (43)-(44).

This concludes our presentation of the properties of MECs. We now turn to a presentation and evaluation of the analytical proposals made in Izvorski (1998), and then, to my own analysis of MECs. As noted already, Izvorsky proposes that MECs are CPs construed as properties, which get existentially bound by a quantifier implicit in the matrix verb; this part of her proposal purports to account for the existential force and the distribution of MECs. In addition, she proposes to account for property [G] (the impossibility of free-choice wh-phrases) on the grounds that such phrases are also disallowed in questions (with one exception she notes), and that MECs are (underspecified) questions. Since MECs were shown in section 3 not to be questions in any sense, her account rests on an invalid premise, and is thus untenable. Finally, Izvorsky attempts to explain the non-indicative status of MECs as follows: certain

clausal boundaries, in particular, indicative ones, block a variety of processes, such as Subject Raising, Obligatory Control, and Clitic Climbing, and may thus be assumed to also block quantificational binding from the matrix into the subordinate clause; such boundaries are thus excluded, in her view, because they prevent existential binding into MECs, and thus an argumental construal of MECs in argument position.

I view this proposal as untenable for (at least) two reasons. First, a tight correlation between the grammatical moods of MECs and the transparency of those moods to Raising, Control or Clitic Climbing is not found in every language. For example, the subjunctive is usually transparent to the latter three processes in the Balkan languages, but not, for example, in Spanish, and more generally in Western Romance; Spanish constructions like (8a') are thus problematic for Izvorski's proposal. Second, and far more seriously, the very assumption that variable binding by a quantifier is inhibited by indicative clausal boundaries appears to be incorrect. To see this, contrast the two sub-cases of (45).

- (45) a. Every actress feels [that flattering her too much would be a bad idea].
 - b. At least one fan of every actress feels [that flattering her too much would be a bad idea].
- (46) Some girl believes [that every man loves her]. $\rightarrow \exists \forall, *\forall \exists$

(46) shows that the universal quantifier within the finite complement clause cannot take scope over the existential in the matrix, presumably because QR is inhibited by finite clausal boundaries. In (45), however, the universal quantifier, which covertly takes matrix scope out of its containing DP in (45b), is able to bind the pronominal variable within the object complement clause, despite the finite status of the latter's boundaries. (45b) has been provided, in addition to (45a), to ensure that binding at LF is by the quantified expression, rather than by its trace, as is the case in (45a).

The heart of Izvorski' proposal, i.e., property status for CP and binding by the matrix verb, is also open to a number of objections. A first objection is that it provides no obvious account of [F] above, that is, of the fact that MECs not only CAN, but rather MUST, function as arguments (something that Izvorski was apparently unaware of). Under a property analysis, one would expect them to be able, at least sometimes, to (also) serve as predicates, or as nominal modifiers. This expectation is, however, apparently not fulfilled.

A second objection to Izvorski's account is that it does not address, and does not seem to be well equipped for addressing, property [E] above, i.e., the fact that Szabolcsi's predicates do not constitute a sufficient condition for MECs, and that languages exhibit extensive, and at the same time systematic, variation with respect to their distribution. Under the view that MECs are properties that get bound by the matrix predicates just as NPs get bound by Ds, it is unclear why MECs should not be licensed as arguments of all of Szabolcsi's predicates in any language.

Having noted a number of inadequacies in Izvorski's account, I now put forward an alternative analysis. The heart of my proposal is that MECs are internally

marked not merely for abstraction, but also for existential GQ status and for nonindicative mood. For concreteness, let us assume that their C node, and by percolation, their CP node, bear the features $[GQ_{\exists}]$ and [-INDIC]. The feature $[GQ_{\exists}]$ is an instruction for the semantics to necessarily interpret CP as an existential GQ, with the wh-phrase playing essentially the role of the external NP in headed constructions; the feature [-INDIC] ensures that the GQ has narrow scope, as noted in the discussion under [C] above, so that there is thus no need to stipulate narrow-scope *per se*. These two features thus constitute typing features, on a par with [Q] in interrogatives, [EXCL] in exclamatives, and [DECL] in declaratives. On the need to include [-INDIC] in the set of defining features of MECs, see below.

The feature $[GQ_{\exists}]$ makes possible a fairly straightforward account of properties [F] and [G]. Concerning [F], i.e., the fact that MECs cannot serve as predicates or adjectival modifiers of nouns (as illustrated, for example, by the contrast between the two versions of (41a), it follows if we understand $[GQ_{\exists}]$ to require MECs to be construed as GQs in the position where they are interpreted. In (41a), the MEC cannot be applied to the subject, because a GQ is not applicable to an individual. This state of affairs is different from cases like (47a), which are apparently construed in terms of quantification over properties that apply to the subject, as informally shown in (47b).

- (47) a. John is {everything/ all things/ most things} that Mary ever dreamt of in a man.
 - b. For all P such that Mary ever dreamt of P in a man, P(John).

Concerning [G], i.e., the uninterpretability of MECs with free-choice wh-phrases, it follows if we view existential quantification as different in kind from the quantificational force of free-choice expressions, since the GQ contains, under this view, two incompatible instructions for quantification (one from the typing feature on C, and one from the wh-phrase in [Spec, CP]). The exact quantificational force of freechoice expressions has been subject to much debate in the literature, some writers seeking to bring it together with universal quantification, and others, with existential quantification, but all admitting that it is not exactly like either of them (for extensive discussion of this vexed issue, see, for example, Dayal 1998, Giannakidou 2001, and references therein). To bring up just one of the differences between 'straightforward' existential quantification and free-choice quantification, note that the former possess the property of symmetry, while the latter do not. To illustrate, two books in this shop are expensive implies two expensive items are books in this shop, and viceversa, but any book in this shop is expensive does not imply any expensive item is a book in this shop. In short, we have good grounds for attributing the impossibility of MECs with free-choice wh-phrases to conflicting quantificational properties.

We still need to account for the distributional properties of MECs, i.e., for their occurrence only with predicates from Szabolcsi's class, for the existence of cross-linguistic variation, for the systematic character of this variation, i.e., for its sensitivity to a one-way implicational hierarchy of (potentially) licensing predicates, and for the (occasional) sensitivity of MECs to pragmatic properties of the larger context. To this end, I begin by drawing attention to a number of points.

First, there are grounds for assuming that Szabolcsi's predicates do not really PROVIDE an existential quantifier, but are merely CONGENIAL to narrow-scope existentially quantified expressions in pragmatically implying that their denotata are "novel" in the universe of discourse. One reason for adopting this position is that non-existentially quantified expressions are sometimes possible in what are commonly viewed as 'existential contexts', as, for example, in *there is everybody you ever wanted to meet in this room*. Note that if we assume that the matrix predicate actually CONTAINS an existential quantifier, we also need to assume that the quantifier binds no variable in the example just given, a state of affairs, which, while tolerated in artificial languages, has widely been viewed as not occurring in natural languages.

Second, MECs are arguably atypical GQs, that is to say, non-core grammatical constructions. Note that clauses typically denote propositions or sets of propositions, and GQs are typically denoted by nominal expressions. Furthermore, in nominal GQs, quantificational binding is typically provided by a D (which is null in existential nominals, according to some views). In MECs, on the other hand, it is not provided by a D (since MECs are bare CPs), and neither does it seem to be provided by an alternative syntactic constituent (see preceding paragraph). Rather, it is triggered solely by a MEC-internal feature. On these grounds, I submit it is reasonable to view MECs as non-core constructions.

Marked constructions are typically more sensitive to a variety of factors than unmarked ones, and the distributional patterns of MECs are arguably a reflection of such sensitivity. One such factor is, I propose, categorial selection (subcategorization). On the assumption that Szabolcsi's predicates typically subcategorize for nominals, but not for CPs, typical subcategorization options need to be extended from nominals to CPs in order for MECs to be licensed, and there seem to be no obvious factors that can COERCE such an extension. If so, it is possible, but by no means necessary, for languages to extend their basic subcategorization options, and the fact that some languages disallow MECs entirely is thus in no way surprising.

A second plausible source of sensitivity is the lack of a structurally supported quantificational binder, which require, I suggest, especially 'propitious' conditions for felicity. One such requirement appears to be a matrix predicate that pragmatically implies novelty in the universe of discourse, thereby making salient the kind of quantification required by the features borne by MECs. The upper bound on distribution imposed by Szabolcsi's predicates is thus an arguable reflection of this requirement.

Another 'propitiousness' requirement seems to arise in relation to what we called predicates of type (ii) in the Introduction. With predicates of type (i), which are stative, there is no necessary directional relation between the time of the assertion/denial of existence and the time of the eventuality in the scope of modality. In the (a) subcases of (1)-(13), the temporal orientation happens to be non-past, but past orientation is possible, as illustrated in (48).

- (48) a. *N'are [cine să fi încercat să te omoare]*. Ro Neg-has who Subj be tried Subj you.Acc kill 'There is no one who could have tried to kill you.'
 - b. *Maria n'are [cu cine să fi plecat].* Maria Neg-has with whom Subj be left 'There is no one that Maria could have left with.'

In contrast, predicates of type (ii) denote events that bring about the emergence of the denotatum of the MEC into existence, availability, and/or the universe of discourse, and the eventuality in the scope of modality has a non-past orientation, apparently with purpose import, as illustrated by the contrast in (49).

- (49) a. Caut [cu cine să las copiii]. Ro look-for.1Sg with who Subj leave.1Sg children-the 'I am looking for someone with whom to leave the children.'
 b. *Caut [cu cine să fi lăsat copiii]. Ro look-for.1Sg with who Subj be left children-the
 - *I am looking for someone with whom to have left the children.'

Felicity thus depends not only on the possibility of a narrow-scope existential construal of the MEC (which must exist both for predicates of type (i) and for predicates of type (ii)), but also on the extent to which the content of the matrix coheres with the purpose import of the MEC. Arguably, not all predicates of type (ii) imply purpose orientation with equal salience, and this seems to be an important factor in determining the hierarchy of preferences that was noted earlier in this paper. Thus, look for (in its intensional use) clearly implies purpose orientation with exclusive focusing on the properties made explicit by the MEC, and is correspondingly among the most highly preferred predicate of type (ii). The predicate find appears to be at least as highly preferred (see fn. 16), presumably because it is easily construable as implying a previous intensional search of the kind described in the preceding sentence. The events denoted by predicates like buy or send are not necessarily focused on a unique goal, although they may be. Correlatively, there is a contrast in felicity between data in which such focusing is not transparently indicated and data in which it is, as illustrated by (37) and (38) respectively. Next, I note that a goal-directed construal of arrive is probably not a salient one out of context, and data like (40a) have low acceptability; at the same time, some improvement may be brought about by contextual indications of goal-directed activity, as illustrated by (40b). I note that (40b) improves further for some speakers if sosit 'arrived' is replaced by *parvenit*, a verb that implies arrival in someone's possession by overcoming obstacles. Finally, I wish to note that inchoative predicates like be born may felicitously embed MECs in circumstances where a hoped-for goal is contextually salient, as illustrated in (50) (the context being, for example, the long expected birth of a king's son, or of the Messiah).

(50) *S-a născut în fine [cine să ne {conducă țara, răscumpere păcatele}].* Refl-has born at last who Subj us rule country-the redeem sins-the 'There has finally been born someone who can {rule our country, redeem our sins}.'

As noted earlier in the paper, the hierarchy of preferences just discussed determines not only relative acceptability under contextual manipulations in liberal languages, but absolute acceptability/grammaticality in less liberal languages. The reason for this state of affairs is, I suggest, that the extension of subcategorization options proposed above is not haphazard, but sensitive to the hierarchy of preferences. What is arbitrary, as far as I can determine at the moment, is only the cut-off point chosen by individual languages, but given some cut-off point, all the hierarchically more accessible options are ruled in.

The need for highly propitious conditions is also responsible for three additional effects (two of which were noted in section 2). One that has not been pointed out so far, but which was noted in most earlier studies of MECs, is that many informants (although not all) allow MECs only in internal-argument positions, but not in subject or topic position, even though minimally different headed relatives in such positions are allowed. This is illustrated with Romanian data in (51).

- (51) Îti voi trimite mâine [cu ce să speli Ro a. you.Sg.Dat will.1Sg send tomorrow with what Subj wash.2Sg rufele]. clothes.the 'I will send you tomorrow something with which to wash the clothes.' b. [{Ceva care, *cu ce} să speli rufele] си
 - something with which, with what Subj wash.2Sg clothes.the *îţi* va *fi trimis mâine*. you.Sg.Dat will.3Sg be sent tomorrow 'Something with which to wash the clothes will be sent to you tomorrow.'

I conjecture that the cause of these effects may lie in the fact that the subject/topic positions are in general less 'congenial' to narrow-scope existentials than the internal argument position, as illustrated by the contrast between (52a), where *three cats* may have wide scope over *believe*, and (52b), where it may not (this was pointed out, for example, in Heim 1987).

- (52) a. John believes that three cats are hiding in the bushes.
 - b. John believes that there are three cats hiding in the bushes.

A second effect is that, as pointed out in section 2, some informants (although not all) need a 'priming' context to accept data alike the (b') subcases of (15)-(16), even though this is not necessary for data like the corresponding (c') subcases. The reason for this may lie in the fact that in MECs, but not in interrogatives, the wh-pronoun needs to be construed as external to the abstract formed over its clause (much like the

CP-external NP in minimally different headed relatives), and embedding of the whpronoun within another nominal may render this construal less perspicuous.

The third effect, illustrated by the contrast between the primed and non-primed subcases of (22), i.e., the need for multiple wh-phrases to all undergo fronting, may have the same source. That is to say, multiple fronting may increase the perspicuousness of the kind of reading that wh-pronouns need to receive, i.e., as external to the abstract formed over their clause.

5. Summary and conclusions

This paper has been concerned with the analysis of MECs, a type of construction that is prominently found in Balkan languages, as well as in non-Balkan Romance and Slavic and a few additional languages. I have argued, building on and modifying earlier work, that MECs are bare wh CPs marked with the features $[GQ_{\exists}]$ and [-INDIC]. These features jointly capture the necessarily narrow-scope existential construal of MECs, and make possible a straightforward account of the fact that MECs may not function as predicates, and that they invariably disallow wh forms combined with free-choice items.

The generally restricted distribution of MECs, the cross-linguistic variation in distributional properties, and the systematic character of this variation has been traced to the non-core status of MECs in conjunction with differences in the pragmatic requirements associated with subclasses of potentially licensing matrix predicates, these differences determining a one-way implicational hierarchy of 'propitious' environments for MECs. In particular, the fact that MECs may be partly or wholly missing in certain languages was traced to the fact that they require an extension of core subcategorization options from nominals to CPs, in conjunction with the fact that this extension is not automatic. With respect to the fact that Szabolcsi's predicates define an upper bound on MEC distribution, it was proposed that only these predicates pragmatically imply a narrow-scope existential construal of their internal arguments. Finally, with respect to the systematic character of the cross-linguistic variation, it was proposed that the extension of subcategorization options (in effect, a grammatization of favourable pragmatic conditions) is not haphazard, but rather sensitive to the pragmatic hierarchy alluded to above.

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