Korean Nominalizer kes and Its Information Structure Properties

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1 Introduction

The formal noun *kes* in Korean has a variety of uses, but in terms of its morphosyntactic properties, it can be classified either as a pure nominalizer, nominalizing a VP or S, or as a noun meaning 'fact' or 'thing'. Here we look at some uses of *kes* in copular constructions, aiming to show that the properties of the constructions follow primarily from the meaning of the copula interacting with information-structure constraints on syntax.

First of all, *kes* can nominalize a whole preceding S, highlighting an event, as in (1). We simply indicate *kes* as KES in the glosses (cf. Jhang 1995, Sohn 2004):

(1) a. ku ttay sako-ka na-n kes-i-ya that moment accident-NOM happen-PAST KES-COP-DECL 'The fact is that at that moment, an accident happened.'

^{*}An earlier version of this paper was presented that Harvard International Symposium on Korean Linguistics, August 2007, and appeared as Kim and Sells (2007). The present paper is significantly revised in all aspects, though it preserves the basic notions of information structure update of the earlier paper.

b. ku yeca-ka John-ul manna-n kes-i-ya that woman-NOM John-ACC meet-PAST KES-COP-DECL 'The fact is that [that woman met John].'

The clausal focus of *kes* here is all presented as new information, as can be attested by the fact that these examples can be an appropriate answer to the question in (2):¹

(2) mwusun il-i-ni? what thing-COP-Q 'What happened?

In terms of the file card semantics approach in Engdahl and Vallduví (1996), the *kes*-phrase here in (1) introduces a new file card with (new) information on it.

Similarly, kes may present new information relative to a topic which is already given in the context:

- (3) Today is a holiday, so why did Chelsoo go to school?
 - a. chelwsu-nun [onul hyuil-i-nci moll-ass-ta]
 Chelsoo-TOP [today holiday-COP-COMP not.know-PAST-DECL]
 'Chelsoo did not know that today is a holiday.'
 - b. chelwsu-nun [onul hyuil-i-nci moll-ass-ten kes]-i-ess-ta
 Chelsoo-TOP [today holiday-COP-COMP not.know-PAST-RETR KES]-COP-PAST-DECL
 'The fact is that Chelsoo did not know that today is a holiday.'

It is possible to present the new information as a canonical VP, as in (3)a, or with a bit more drama using the *kes*-form in (3)b. Intuitively, these are VP-focus examples which present a noteworthy fact, about a given individual. Typically, it is possible to present the whole content as new, e.g., a nominative marker is also possible on *chelswu* in (3)b.

Other uses of *kes* have uses that look more like English clefts, pseudo-clefts, or perhaps inversions of these. However, it seems to us to be only misleading to assume that Korean has anything like a true cleft or pseudo-cleft construction: it simply has copular clauses. We will show that no special constructional assumptions need to be made, once the properties of copular clauses are more properly considered. This is our main goal in this paper.

A representative example that looks cleft-like in some way is (4), from Lee and Ramsey (2000, 103), where a PP is related to a backgrounded clause:

(4) [ilpon-i hanca-lul tuli-e ka-n kes]-un [Japan-NOM character-ACC take.in-COMP go-PAST KES]-TOP hankwuk-ulo-pwuthe-i-ess-ta Korea-direction-from-COP-PAST-DECL 'Japan taking in Chinese characters was from (the direction of) Korea.'

Examples like this are routinely accepted as clefts in the syntactic literature on Korean. For instance, Sohn (2004) presents these examples as clefts:²

¹See Hiraiwa and Ishihara (2002) for discussion of similar Japanese examples.

²While examples like (5)a appear to be acceptable to all speakers, not all speakers find examples like (5)b with a 'subject focus', so to speak, so readily acceptable.

- (5) a. [Mary-ka cengmallo cohaha-nun kes]-un chizukheyk-i-ta [Mary-NOM really like-PRES KES]-TOP cheesecake-COP-DECL 'What Mary really likes is cheesecake.'
 - b. [chizukheyk-ul cengmallo cohaha-nun kes]-un Mary-i-ta [cheesecake-ACC really like-PRES KES]-TOP Mary-COP-DECL 'Who really likes cheesecake is Mary.'

Such examples all have the form shown in (6), which actually looks more like an English pseudo-cleft than a cleft:

(6)
$$[_{NP}[_{S} \text{ 'clause' }] \text{ kes}]$$
-TOP XP-copula

Here the XP in precopular position is somehow semantically related to the content of the clause-like modifier of *kes* in subject position. In our discussion below we will also refer to the precopular position as the 'predicate' position, and in some instances as the 'focus' of the construction.

The *kes* phrase typically hosts the topic marker, and so describes given information against which the precopular XP presents new information:

We will investigate the information stucture properties of such constructions more below, having first laid out some more of the relevant syntactic properties.

2 Further Properties of kes-Constructions

Korean and Japanese also famously allow 'multiple clefts' (Hiraiwa and Ishihara 2002, Kim and Lee 2008, Cho et al. 2008) where multiple elements appear in the pre-copular position:

(8) [yumi-ka ku chayk-ul sa-n kes]-un cak.nyen L.A.-eyse-i-ta [Yumi-NOM that book-ACC buy-PAST KES]-TOP last.year L.A.-LOC-COP-DECL 'Where/when Yumi bought that book is last year in L.A.'

Cho et al. (2008) argue that these have an analysis as 'amalgam clefts', and we follow their view. They show that amalgam clefts at the matrix level are not derived by movement – either of multiple constituents out of the host *kes*-clause, or by movement of a larger consituent containing the apparently clefted phrases – but from ellipsis in a copular clause taking the *kes*-clause as background (in the information structure sense). In their proposal, the example in (8) is derived by ellipsis of the greyed-out parts of the larger structure in (9):

[Yumi-NOM that book-ACC buy-PAST KES]-TOP
[yumi-ka ku chayk-ul cak.nyen L.A.-eyse sa-ss-ta] -i-ta
[Yumi-NOM that book-ACC last.year L.A.-LOC buy-PAST-DECL]-COP-DECL
'Where/when Yumi bought that book is Yumi bought that book last year in L.A.'

Even though multiple clefts might not have syntactic derivation in which some focal part(s) must be moved out of a backgrounded clause, the multiple cleft examples still clearly have a simple givennew linear organization.³

If the syntactic account just sketched is correct, the question arises as to how the information structure of such amalgam clauses is determined. We will take the position below – hardly a controversial one – that the KES-part provides background information and the precopular part(s) provide an informational update (new information).

A second interesting property of Korean is that it is possible to have a *wh*-word or -phrase in the precopular position, as in (10) from Kim and Lee (2008):

(10) [Sue-ka Bonn-eyse palphyoha-nun kes]-un encey-ya? [Sue-NOM Bonn-LOC present-PRES KES]-TOP when-COP-Q 'When is it that Sue is presenting in Bonn?'

What is important about such examples, and what is implicit in the English translation, is that the acceptability of *wh*-phrases implies a kind of cleft structure, rather than pseudocleft structure:

- (11) a. When is it [that Sue is presenting in Bonn]?
 - b. ??When is [when Sue is presenting in Bonn]?
 - c. Who is it [that met Sue]?
 - d. ??Who is [who met Sue]?

This may give a clue as to subtle details of the information structure properties, which we take up in the last section(s) of the paper.

Thirdly, one aspect of the construction that has implicitly guided previous analyses is the formal status of *kes*. The word *kes* is an inanimate noun and is usually translated as 'fact' or 'thing'; yet in these copular constructions the predicate XP can be an animate-denoting NP (also see (5)b above), apparently substitutable for a noun like *salam* ('person'):

- (12) a. [John-i sa-n kes]-un mwues-i-ni? [John-NOM buy-PAST KES]-TOP what-COP-Q 'What is it that John bought?'
 - b. [John-i manna-n kes]-un nwukwu-i-ni? [John-NOM meet-PAST KES]-TOP who-COP-Q 'Who is it that John met?'
- (13) a. [i seysang-eyse ceyil alumtaw-un salam]-un nwukwu-ci? [this world-LOC most beautiful-PRES person]-TOP who-Q 'Who is the most beautiful person in the world?'
 - b. [i seysang-eyse ceyil alumtaw-un kes]-un nwukwu-ci? [this world-LOC most beautiful-PRES KES]-TOP who-Q 'Who is the most beautiful in the world?'

³CWY allow that "movement within the presupposition" of an empty operator could take place in amalgam clefts – presumably one operator per XP, for all the XPs that are overtly realized in the precopular position.

- (14) a. [ku il-ul ha-l swu iss-nun salam]-un ne-ppwun-i-ta [that work-ACC do-can-PRES person]-TOP you-just-COP-DECL 'The person who can do the work is just (=only) you.'
 - b. [ku il-ul ha-l swu iss-nun kes]-un ne-ppwun-i-ta [that work-ACC do-can-PRES KES]-TOP you-just-COP-DECL 'The one who can do the work is just (=only) you.'

In all these examples with *kes*, it appears that the precopular XP is formally syntactically removed from the clause modifying *kes*, where *kes* itself is a formal marker of the construction, as a kind of cleft. The reason for this analysis is that *kes* shows no sensitivity to animacy, which it otherwise does, in other contexts.

For example, Kang (2006) notes the asymmetry shown in (16)a–(16)b (relative to the lack of asymmetry in the by-now familiar examples in (15)):

- (15) a. [John-i sa-n kes]-un i chayk-i-ta [John-NOM buy-PAST KES]-TOP this book-COP-DECL 'What John bought is this book.'
 - b. [John-i manna-n kes]-un ku yeca-i-ta
 [John-NOM meet-PAST KES]-TOP that woman-COP-DECL
 'Who John met is this woman.'
- (16) a. i chayk-un [John-i sa-n kes]-i-ta (inanimate topic) this book-TOP [John-NOM buy-PAST KES]-COP-DECL 'This book is the one that John bought.'
 - b. *ku yeca-nun [John-i manna-n kes]-i-ta (animate topic) that woman-TOP [John-NOM meet-PAST KES]-COP-DECL 'That woman is the one who John met.'

Although (16)b is unacceptable, an acceptable example can be created, simply by putting the animate head noun *salam* in the predicate position, as in (17):⁴

i yeca-nun [John-i manna-n salam]-i-ta this woman-TOP [John-NOM meet-PAST person]-COP-DECL 'This woman is the person who John met.'

The acceptability of (17) shows that *kes* in (16)b must also be used as a true noun, with a referential interpretation, and hence it is incompatible with the meaning of *yeca* due to the clash in (in)animacy. If this is so, then why does *kes* in (15)b not have the same analysis?—Why is there no animacy clash in that example?

The explanation for this contrast lies in the fact that there are a variety of *kes*-constructions, which superficially look the same but which are distinguishable in terms of more subtle properties, as we investigate below.

⁴The string in (16)b can be acceptable as focusing the whole event (cf. (1)), with the interpretation of *ku yeca-nun* 'that woman' as contrastive information – "the news is that John met *that woman*".

3 Copular constructions

All of the *kes*-constructions that we are interested in have the copula as the matrix verb. Hence, it is important to understand the (information structure) properties of the copula as part of a study of *kes*. It is familiar from works such as Heycock and Kroch (2002) or Mikkelsen (2005) that there are a variety of copular constructions. At least at a descriptive level, there are 3 types in Korean, all involving *kes*: predicative, equative, and specificational

We describe copular sentences as having a subject position and a predicate position, both filled by XPs. These are syntactic positions which are somewhat orthogonal to the information types of the examples.⁵ In most of the examples we present, the XP which we call 'subject' is actually marked by the topic marker -(n)un.

3.1 Predicative uses of copula

In a summary paper, Mikkelsen (2008) describes several properties of predicative uses of the copula – the most important being that the subject is referential, and the predicate is non-referential.⁶ The predicate part describes a property of the entity denoted by the subject.

An example like (18)a might look like a cleft of some kind, but in fact it is a predicative use of the copula – the predicate NP *kacca* is not referential. Due to this property, the construction cannot be inverted as in (18)b:

- (18) a. [John-i ceyil cohaha-nun kes]-un sasil(-un) kacca-i-ta [John-NOM most like-PRES KES]-TOP really fake-COP-DECL 'What John likes most is in reality a fake.'
 - b. ??kacca-un/ka [John-i ceyil cohaha-nun kes]-i-ta fake-TOP/NOM [John-NOM most like-PRES KES]-COP-DECL

The distribution of referential properties indicates that (19)a-b are not predicative constructions, due to the unacceptability of (19)c. When the *kes*-phrase is forced to refer, as in (19)c, it cannot have an animate referent. From this, it follows that the *kes*-phrases in (19)a-b do not refer (to an animate individual) – the English 'translations' are not reliable guides.

- (19) a. [John-i kyelhon ha-n kes]-un Mina-i-ta
 [John-NOM marry-PAST KES]-TOP Mina-COP-DECL

 'The one who John married is Mina.'
 - b. [John-i kyelhon ha-n kes]-un alumtaw-un yeca-i-ta [John-NOM marry-PAST KES]-TOP beautiful-PRES woman-COP-DECL 'The one who John married is a beautiful woman.'
 - c. *[John-i kyelhon ha-n kes]-un alumtap-ta
 [John-NOM marry-PAST KES]-TOP beautiful-DECL
 'The one who John married is beautiful.'

⁵See Yoon (2003) and Kim et al. (2007) for discussion of some of the syntactic properties of canonical and inverse copula constructions in Korean.

⁶Some tests for determining the predicative or referential status of the an XP in predicate position, in Japanese, can be found in Komagata (1996).

(20) [John-i sa-n kes]-un acwu pissa-yo [John-NOM buy-PAST KES]-TOP very expensive-LEVEL 'What John bought is very expensive.'

Mikkelsen (2008) also notes that in a predicative use, the copula can be replaced by the verb *become*. While (21)a and especially (21)b might taken to be predicative cleft-like uses, the total unacceptability of (21)d shows that the *kes*-phrase in these constructions does not refer.

- (21) a. [John-i kyelhon ha-n kes]-un Mina-i-ta [John-NOM marry-PAST KES]-TOP Mina-COP-DECL 'The one who John married is Mina.'
 - b. [John-i kyelhon ha-n kes]-un uysa-i-ta
 [John-NOM marry-PAST KES]-TOP doctor-COP-DECL
 'The one who John married is a doctor.'
 - c. Mina-nun uysa-ka toy-ess-ta
 Mina-TOP doctor-NOM become-PAST-DECL
 'Mina became a doctor.'
 - d. *[John-i kyelhon ha-n kes]-un uysa-ka toy(-ess)-ta
 [John-NOM marry-PAST KES]-TOP doctor-NOM become(-PAST)-DECL
 'The one who John married became a doctor.'

3.2 Equative

We take the equative use of the copula to be one that identifies two expressions of the same semantic type, regardless of whether they are referring (nominal) expressions or not (Heycock and Kroch 2002, Mikkelsen 2008). In the equative use both subject and predicate describe the same object. Due to this property, the construction is reversible:

- (22) a. [John-i ceyil cohaha-nun hoysa tonglyo]-nun i salam-i-ta [John-NOM most like-PRES company employee]-TOP this person-COP-DECL 'John's favorite employee is this person.'
 - i salam-i [John-i ceyil cohaha-nun hoysa tonglyo]-i-ta
 this person-NOM [John-NOM most like-PRES company employee]-COP-DECL
 'This person is John's favorite employee.'

In (22)b the expression *i salam* ('this person') bears the nominative marker rather than the topic marker, as it is intended to be the new information of the clause.

It is also possible to create equative uses with *kes*:

- (23) a. [John-i sa-n kes]-un i chayk-i-ta [John-NOM buy-PAST KES]-TOP this book-COP-DECL 'What John bought is this book.'
 - b. i chayk-i [John-i sa-n kes]-i-ta this book-NOM [John-NOM buy-PAST KES]-COP-DECL 'This book is what John bought.'

And a similar pattern can be seen in the pair of equative examples in (24):

(24) a. [ney-ka hay-ya ha-nun kes]-un [software-lul mence cwumwunha-nun [you-NOM do-COMP must-PRES KES]-TOP [software-ACC first order-PRES kes]-i-ta

KES]-COP-DECL

'What you must do (to solve your problem) is buy the software first.'

b. [software-lul mence cwumwunha-nun kes]-i [ney-ka hay-ya ha-nun [software-ACC first order-PRES KES]-NOM [you-NOM do-COMP must-PRES kes]-i-ta
 KES]-COP-DECL
 'Buy the software first is what you must do.'

3.3 Specificational

In specificational copular clauses the predicate XP is referential while the subject is not: it describes a property. As Mikkelsen (2008) summarizes, the classic specificational use is providing a list of items which answer a question described by the subject of the construction.

Perhaps the simplest specificational use can be found in the question 'Who are you?'

- (25) Who are you?
 - a. Na-nun John-i-ta. 'I am John.'
 - b. *John-i na-ta. 'John is I.'

English behaves just like Korean here -(26)a is interpreted as 'The answer to the question "Who am I?" is "John". The example is not equative, as it is not reversible, as shown by the unacceptability of (25)b.

Earlier, we mentioned that wh-phrases can appear in the predicate position of kes-constructions:

- (26) a. [John-i sa-n kes]-un mwues-i-ni? [John-NOM buy-PAST KES]-TOP what-COP-Q 'What is it that John bought?'
 - b. [John-i manna-n kes]-un nwukwu-i-ni? [John-NOM meet-PAST KES]-TOP who-COP-Q 'Who is it that John met?'

Note that the animate use in (26)b is acceptable, which shows that the *kes*-phrase does not refer; so these are actually formally specificational constructions. As such, we expect them to be non-reversible, which is correct, as (27)a shows:

(27) a. ??mwues-i [John-i sa-n kes]-i-ni?
what-NOM [John-NOM buy-PAST KES]-COP-Q
'What is the thing that John bought?' (Cf. (26)a below)

- b. ?i kes-tul-cwung mwues-i [John-i sa-n kes]-i-ni? this thing-PLU-among what-NOM [John-NOM buy-PAST KES]-COP-Q 'Among these things, what is the thing that John bought?'
- c. enu kes-i [John-i sa-n kes]-i-ni? which thing-NOM [John-NOM buy-PAST KES]-COP-Q 'Which thing is the thing that John bought?'

The use of *mwues* 'what' typically asks for a property, while *enu kes* 'which one' looks to identify one member of a given set. The improvement in (28)b over (28)a shows that the question is supposed to be about the value of an index (an equative use). FIX THIS TEXT, BUT I CAN MAKE IT MAKE SENSE ONCE WE'VE GOT MORE ON INFO STR.

The role of the copula in the amalgam cleft is as a place holder for the main predicate of the clause, and we hypothesize that the function of the construction is to update the background information from the *kes*-phrase with the new information in pre-copular position. Hence this is formally rather like a specificational reading.

4 Further Tests for Referentiality

The properties of copular constructions that we focussed on above are summarized here:

(28)		subject is referential	construction is reversible
	predicational	yes	no
	equational	optionally	yes
	specificational	no	no

Our interest will be mainly with specificational uses, with *kes*. It is therefore useful to have further diagnostic tests for true specificational structures, and we focus here on tests which indicate whether the subject is referential or not; the joint properties of non-referentiality and non-reversibility characterize specificational structure in Korean. What we show here are particular variants of the *kes*-constructions which force the subject to be interpreted referentially.

4.1 Conjoined kes-phrases

It is also possible to conjoin *kes*-phrases if they are used referentially:

- (29) a. [John-i sa-n kes]-kwa [Mary-ka ilk-un kes]-un motwu [John-NOM buy-PAST KES]-CONJ [Mary-NOM read-PAST KES]-TOP all kacca-i-ta fake-COP-DECL 'What John bought and what Mary read are all fake.'
 - b. i chayk-tul-i [John-i sa-n kes]-kwa [Mary-ka ilk-un this book-PL-NOM [John-NOM buy-PAST KES]-CONJ [Mary-NOM read-PAST kes]-tul-i-ta KES]-COP-DECL

'These books are what John bought and what Mary read.'

As expected, such a coordinated phrase cannot have an animate referent:

(30) a. *[John-i cohaha-nun kes]-kwa [Mary-ka chotayha-n kes]-un [John-NOM like-PRES KES]-CONJ [Mary-nom invite-PAST KES]-TOP nay tongsayng-i-ta I brother-COP-DECL 'The one that John likes and that Mary invited is my brother.'

4.2 Future tense inside the *kes*-phrase

- (31) a. What is it that you want to do?
 - b. What do you want to do?

In English, there is a clear asymmetry in the acceptability of the following examples, for any V:

- (32) a. ?*What is it that you will V tomorrow?
 - b. What will you V tomorrow?

A search for the string in (32)a with a wild-card for 'V' on Google in July 2008 yielded 1 hit, while a search at the same time for (32)b yielded 416,000 hits. While there is a large amount of unusable data in simple string searches, the massive difference in these numbers can be taken as an indicator of the degraded status of the future cleft construction in (32)a.

In Korean, a *kes*-construction with a future form inside the modifying clause also yields a diagnostic about the construction types.

The examples in (33) and (34) are all acceptable:

- (33) a. ne-nun nayil mwues-ul ha-keyss-ni? you-TOP tomorrow what-ACC do-FUT-Q 'What do you want to do tomorrow?'
 - b. [ney-ka nayil ha-l kes]-un mwues-i-ni? [you-NOM tomorrow do-FUT KES-TOP what-COP-Q 'What is it/the thing that you will do tomorrow?'
- (34) a. [John-i tayhak-eyse kongpwu ha-l kes]-un mwues-i-ni? [John-NOM university-at study-FUT KES]-TOP what-COP-Q 'What will John study at university?'
 - b. [John-i tayhak-eyse kongpwu ha-l kes]-un enu kwamok-i-ni? [John-NOM university-at study-FUT KES]-TOP which subject-COP-Q 'Which subject will John study at university?'

However, a *kes*-construction containing a future form cannot be used if the target referent is animate, as in (35)–(36), while present or past forms are generally acceptable:

(35) a. *[ku mwuncey-lul phwu-l kes]-un John-i-ta [that problem-ACC solve-FUT KES]-TOP John-COP-DECL 'Who will solve that problem is John.'

- b. [ku mwuncey-lul phwu-eya ha-nun kes]-un John-i-ta [that problem-ACC solve-must-PRES KES]-TOP John-COP-DECL 'Who must solve that problem is John.'
- (36) a. ?[John-i pangmwun ha-n kes]-un Mary-i-ta
 [John-NOM visit-PAST KES]-TOP Mary-COP-DECL
 'Who John visited is Mary.'
 - b. ?*[John-i pangmwun ha-l kes]-un Mary-i-ta
 [John-NOM visit-FUT KES]-TOP Mary-COP-DECL
 'Who John will visit is Mary.'

We do not understand the reason for this behaviour with the future tense; yet clearly the effect is that the future form in the *kes*-clause forces *kes* to be interpreted in its true nominal form, meaning 'fact' or 'thing', and therefore incompatible with an animate focal referent.

5 Syntax or Information Structure?

Kang (2006) presents a syntactic account of the contrast in the examples in (15–16), repeated below. She frames her proposal in terms of the category of *kes*, claiming that *kes* is either C or N, and therefore heads a CP in some cases and an NP in others:

- (37) a. [John-i sa-n kes]_{CP}-un i chayk-i-ta [John-NOM buy-PAST KES]-TOP this book-COP-DECL 'What John bought is this book.'
 - b. i chayk-un [John-i sa-n kes] $_{
 m NP}$ -i-ta (inanimate topic) this book-TOP [John-NOM buy-PAST KES]-COP-DECL 'This book is what John bought.'
- (38) a. [John-i manna-n kes]_{CP}-un i yeca-i-ta
 [John-NOM meet-PAST KES]-TOP this woman-COP-DECL
 'Who John met is this woman.'
 - b. *i yeca-nun [John-i manna-n kes] $_{
 m NP}$ -i-ta (animate topic) this woman-TOP [John-NOM meet-PAST KES]-COP-DECL 'This woman is who John met.'

Her idea is very simple: as a complementizer, *kes* creates a CP structure within which animacy is not represented, and hence such a *kes*-phrase can be compatible with an inanimate or an animate referent in the predicate position. In its other category, *kes* creates an NP with the feature [-animate], coming from the lexical specification of *kes*, and hence this is incompatible with an animate subject, as in (38)b.

Now, if the two possibilities of CP or NP exist in the grammar, we can also see that (39)b will be ungrammatical on the analysis shown, but not (39)a, due once again to a clash in animacy in the latter example:

- (39) a. [John-i sa-n kes]_{NP}-un i chayk-i-ta 'What John bought is this book.' (predicted to be acceptable)
 - b. *[John-i manna-n kes]_{NP}-un i yeca-i-ta
 'What John met is this woman.' (predicted to be unacceptable)

Yet the existence of these alternatives raises more questions: What is the difference between (37)a and (39)a? And, more tellingly, why can there not be an analysis of (38)b with the animacy-free CP in the predicate position? This would be the analysis in (40):

(40) *i yeca-nun [John-i manna-n kes]_{CP}-i-ta (animate topic) this woman-TOP [John-NOM meet-PAST KES]-COP-DECL 'This woman is who John met.'

The example is unacceptable on the intended interpretation (cf. footnote 4), yet the syntactic analysis shown in (40) should be fully grammatical.

On the syntactic side, we note that there is no evidence for the categorial ambiguity of kes as N or C – it shows no evidence of being a C, syntactically. For example, canonical CPs in Korean headed by ko may not host case markers, while all phrases headed by kes host a case marker (unless it is supplanted by the topic marker -nun).

(41) Mina-ka [John-i uysa-ka toy-ess-ta]-ko(*-ka/*-lul)
Mina-NOM [John-NOM doctor-NOM become-PAST-DECL]-COMP(*-NOM/*-ACC)
sayngkakha-n-ta
think-PRES-DECL
'Mina thinks that John became a doctor.'

More tellingly, verbs in Korean do not take a prenominal ending form before true complementizers, as seen in (41), while a verb immediately preceding *kes*, in any of its uses, must necessarily be in the prenominal form. That is to say, replacing the verb inflection in (41) by the prenominal form leads to total ungrammaticality *toy-n-ko, while replacing a true prenominal form before *kes* with the regular declarative form in (41) also leads to total ungrammaticality, *toy-n kes* vs. *toy-ess-ta kes.

In summary, the C analysis of *kes* can work descriptively, as we do not expect C to be categorized for animacy. But there is no morpho-syntactic support for such a syntactic analysis – quite the opposite in fact – and, in addition, such a proposal appears to generate (40), incorrectly.

The answers to these questions and problems surely involve information structure. Unless there is a pure and unexplained formal restriction that CP cannot occupy the predicate position, the analysis in (40) has to be ruled out by consideration of what the example would mean, and what goes wrong with the interpretation.

6 Information Structure in kes Constructions

JB - I need to rewrite this section, but basically along the lines of what we had before, but redone in terms of equational (index identity) or specificational (file card update).

The analysis will be given informally, but in terms of file card semantics (see e.g., Engdahl and Vallduví 1996), which provides a useful view of the information structure properties that we consider to be crucial.

Kuboň (1999) – there are some useful ideas here about how to update one card with information, and how other cards become 'secondary'

Kruijff-Korbayová and Steedman (2003) – this might be relevant, it's about having two sets of info-str partitions – so you can have something that looks like this

Following an initial observation by Fry and Kaufmann (1998), it is important to note that the file card in (42) which is updated is that for John, even though the focus of the construction is 'Mina'.

(42) [John-i manna-n kes]-un Mina-i-ta
[John-NOM meet-PAST KES]-TOP Mina-COP-DECL

The construction updates descriptive information on the file card for John.

As long as constraints on copular clauses can be satisfied, any kind of descriptive update can be provided. In (43) a PP is providing the new information:

(43) [John-i Mary-lul manna-n kes]-un kongwen-eyse-i-ta [John-NOM Mary-ACC meet-PAST KES]-TOP park-at-COP-DECL 'It was at the park that John met Mary.'

For many speakers, an adverbial element also can be focused, as long as it is categorically a nominal, like *ecey* as in (44)a, but not *chenchenhi* as in (44)b.

- (44) a. [John-i Mary-eykey senmwul-ul cwu-n kes]-un [NPecey]-i-ta [John-NOM Mary-DAT present-ACC give-PRES KES]-TOP yesterday-COP-DECL 'It is yesterday when John gave Mary a present.'
 - b. *[John-i talli-n kes]-un [Adv chenchenhi]-i-ta [John-NOM run-PRES KES]-TOP slowly-COP-DECL '(lit.) The way John ran is slowly.'

Some speakers (cf. Cho et al. 2008) show a broader pattern of acceptance in the pre-copular position, allowing any clause-level constituent. Parts of such constituents are, as far as we know, not acceptable:

- (45) a. *[John-i chayk-ul sa-n kes]-un [sey kwen]-i-ta
 [John-NOM book-ACC buy-PAST KES]-TOP [four volume]-COP-DECL
 'What John bought books was four.'
 - b. *[John-i salam-ul manna-n kes]-un [sey myeng]-i-ta [John-NOM person-ACC meet-PAST KES]-TOP [four person]-COP-DECL 'What John met people was four.'

The fact that this is predicative use of the PP is confirmed by the unacceptability of variant examples which force an equative interpretation:⁷

⁷(46)a is acceptable when it is interpreted as predicative.

- (46) a. *[John-i Mary-lul manna-n kes]-i kongwen-eyse-i-ta [John-NOM Mary-ACC meet-PAST KES]-NOM park-at-COP-DECL
 - b. *kongwen-eyse-ka [John-i Mary-lul manna-n kes]-i-ta park-at-NOM [John-NOM Mary-ACC meet-PAST KES]-COP-DECL

In other words, (43) does not have any analysis which is parallel to an English cleft structure like 'It is in the park where John met Mary' or 'Where John met Mary is in the park'.

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