FEATURES OF QUESTIONS AND INTERROGATIVES

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1. Introduction

The central purpose of this study is to develop a well-founded classification of complementizer projection (CP) layers, based primarily on Korean facts concerning the behaviour of ForceP and TypeP. Morphologically distinct Korean complementizers (henceforth COMP) correspond to these syntactic heads, as in (1) and (2).¹

(1)	a.	ku	salamtul-un	mwues-ul	cohaha-ni?	(QUESTION)
		that	people-TOP	what-ACC	like- C^2	
		ʻWha	at do they like?	?'		
	b. *	ku	salamtul-un	mwues-ul	cohaha-nun-ci	?
		that	people-TOP	what-ACC	like-C-C	
		ʻWha	t do they like?	,,		
(2)	a.	ku	salamtul-i	mwues-ul	cohaha-nun-ci	mwul.ess-ta.
		that	people-NOM	what-ACC	like-C-C	asked-C
		'pro a	asked [what th	ey like]'.		
	b. *	ku	salamtul-i	mwues-ul	cohaha- ni	mwul.ess-ta.
		that	people-NOM	what-ACC	like-C	asked-C
		'pro a	asked [what th	ey like]'.		

The question COMP *ni* appears in main clauses, but is unavailable in embedded clauses; conversely, the complex COMP *nun-ci* (or *l-ci*) occurs only in embedded clauses. We propose that *ni* is inserted in the head of ForceP, while *ci* in (2a) is spelled out in the head of TypeP. These morphologically distinct COMPs align with the asymmetric question COMPs in English, as shown in (3).

(3) [MAIN] ø [EMBEDDED] *if, whether*

¹ The Korean data are from the first author.

² The following abbreviations are used in the glosses: ACC: accusative marker; AQ: alternative question; C: complementizer; DAT: dative; DQT: direct quotative; EXHO: exhortative; LOC; locative; MOD: mood; NOM; nominative; PQ: polar question; PAQ: polar alternative question; PRES: non-past realis tense; PST: past tense; PSP: past participle; TAGQ: tag question; TOP: topic marker.

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1.1 Theoretical background

No conceptual or syntactic explanation exists in the literature for the asymmetrical syntactic behaviour of 'embedded questions' and direct questions. Aside from a few very recent papers (see Aelbrecht et al. (2012)), the contrast between main and embedded questions has not been central to mainstream syntactic theorizing since the work on root transformations and main clause phenomena published in Emonds (1970) or Baker (1970). Baker distinguishes two WH-COMP types in English: 'questions' and relative clauses. Although Baker points out morpho-syntactic dissimilarities between 'direct' and 'indirect' questions (the absence of *whether* or *if* in direct questions; inversion in direct questions are relatively minor compared to dissimilarities between 'embedded' questions and relative clauses. Thus, Baker proposes that the category Q appears in both main (4) and embedded clauses (5), identifying direct and 'embedded' questions.

(4)	Q What do they like?	(QUESTION)
(5)	I wonder [Q what they like].	(EMBEDDED QUESTION)
(6)	I like [what they like].	(RELATIVE)

However, the fact that the WH-phrase in (5) is not a relative clause does not imply that this is, syntactically, an 'embedded question'; significant asymmetry still exists between main and embedded COMPs in English as Baker (1970) observed. Before Baker (1970) introduced the claim that both direct and indirect questions contain an initial question morpheme, there were debates about whether or not embedded clauses could be considered to be truly interrogative (Curme 1931, Jespersen 1965, Long 1961, cited in Baker 1970). Recently, some researchers have observed that complement clauses possess distinct properties. Bayer (2004) claims that root clauses interface with discourse, and are therefore licensed differently from dependent clauses. The terms question and *interrogative* have been used interchangeably in syntax, although sometimes a distinction is made between *interrogative* as a syntactic term and *question* as a semantic or pragmatic term (Jespersen 1924; Lyons 1981; Sperber and Wilson 1986; Huddleston 1994). The observations we make in this paper suggest that the notion of 'question' is necessarily distinct from the notion of 'interrogative' in syntax. This study proposes that Force₀ features sit in the Spec of ForceP (Rizzi 2001), while Type_{INT} features sit in the Spec of TypeP (cf. Cheng 1997).

To account for asymmetries between direct questions and embedded "questions" (which we identify as 'interrogatives'), we explore the Korean COMP system, paying particular attention to spoken Korean, a language variety which exhibits morphologically rich COMPs. We explore the morpho-syntactic asymmetries found between main and embedded COMPs in Korean: main COMPs differ from embedded COMPs in terms of morphological form, interaction with speech act participants, and co-occurrence and recursion of the COMP. For instance, COMPs can be paired with distinct moods (e.g. *lay, kka*,

or *e*) in Korean main clauses, but only the neutralized interrogative COMP *ci* occurs in embedded clauses. In addition, the tag question (*ci*) and echo question (*tako*) COMPs can only be embedded when a direct quotation (*lako* or *hako*) marker is employed. Based on these facts, we claim that question is strictly a category of main clauses, contra the conclusions of Baker (1970). To justify the use of distinct sets of syntactic features for questions and interrogatives, we present our analysis within a Rizzian cartography, although we modify the distinct projections posited within the CP domain: ForceP (for main clause phenomena) and TypeP (used for clauses lacking illocutionary force).

The general assumptions we employ here pertain to illocutionary force. In particular, we limit our attention to canonical uses of clause types. For instance, the English question *Can you open the door?* may be pragmatically used as a command, but we will focus exclusively on its question use. By assuming that the utterance exclusively denotes a question, we can concentrate on the interface between morpho-syntax and semantics. We also use "embedded clause" in a narrow sense, excluding non-canonical instances such as direct quotation and parentheticals, although we are aware of the difficulty in identifying the boundary between direct quotation and embedded clauses. Subordination or insubordination phenomena are ubiquitous in Korean. We observe that Korean COMPs show these three stages of subordination:

(7)	chinkwu-ka	[nay-ka	encey	wa.ss-nun-ci]	mwule.ss-ta.
	friend-NOM	I- NOM	when	came-C-C	asked-C
	'A friend asked	when I cam	ie.'		
(8)	chinkwu-ka	[ne-(nun)	encey	wa.ss-ni] la(ha)ko	mwule.ss-ta.
	friend-NOM	you-(TOP)) when	came-C DQT	asked-C
	'A friend asked	, "When did	you cor	ne?"'	
(9)	chinkwu-ka	[na-eykey	encey	wa.ss-nya.ko]	mwule.ss-ta.
	friend-NOM	I- DAT	when	came-C.C	asked-C
	'A friend asked	when I cam	ie.'		

The sentence in (7) contains a subordinator *nun* and an irrealis interrogative COMP *ci* (opposed to the realis COMP *kes* (cf. Mithun 1999)). A main clause is embedded by the direct quotation COMP *lako* in (8). The example in (9), which contains a complex COMP *nya.ko* composed of *ni* and the quotation COMP *la* (*ha*)*ko*, represents what appears to be the intermediate stage between (7) and (8). In this paper, we restrict the domain of embedded clauses and consider only sentences like (7) to contain such an embedding.

The most important assumption we make here is the hypothesis that a sentence can impart only one illocutionary force: sentence (10) contains a WH-question force, while (11) contains a polar alternative question force (PAQ); the sentences in (12) and (13) are ungrammatical because two illocutionary forces are in conflict in each sentence:WH and PAQ in (12) and WH and ASSERT in (13).

(10)	nwu-ka <i>who-NOM</i>	hakkyo-ey <i>school-LOC</i>	mos <i>can.not</i>	ka.ss-ni ? went-C	? (WH-Q)
	'Who couldn'	t go to school?			
(11)	hakkyo-ey	ka.ss-ni	mos	ka.ss-ni 🛙	? (PAQ)
	school-LOC	went-COMP	can.not	went-C	
	'Could (you)	go to school or	not ?'		
(12)	* nwu-ka	hakkyo-ey	ka.ss-ni	mos k	ka.ss-ni ? (WH-PAQ)
	who-NOM	school-LOC	went-C	can.not	went-C
	*Who could o	r couldn't go to	school?	(Who could	d go to school or not)
(13)	* nwu-ka	hakkyo-ey	mos	ka.ss-ta. ((WH-ASSERT)
	who-NOM	school-LOC	can.not	went-C	
	*Who couldn't	t go to school.			

Recently, the syntax-semantics interface and the syntax-pragmatics interface have garnered great interest among researchers (Speas 2004; Van Valin 2008). This article explores these phenomena through the lens of Korean COMPs. We hypothesize that ForceP is a main clause phenomenon, and advocate the use of the syntactic terms "question" versus "interrogative" in place of "direct question" versus "embedded question". The article is organized as follows. Section 2 presents the properties of Korean COMPs in detail, focusing in particular on the contrasting forms and meanings of COMPs in main versus embedded clauses. In section 3, evidence pertaining to the interaction between COMPs and speech act participants will be presented. Section 4 discusses the compatibility of COMPs in main and embedded clauses. The proposed properties of ForceP and TypeP are presented in section 5. Section 6 concludes.

2. Properties of Korean complementizers: clause types and complementizers

Previous research into complementizers has led to discussions about Clausal Type (Cheng 1997; Chomsky 1995), also known as Force Projection (Rizzi 1997; 2001). The complementizer domain, which is sometimes referred to as the "left periphery" (Rizzi 1997), is traditionally viewed as consisting of clause-introducing elements in head-initial languages. Researchers have employed many different terms for "right periphery" elements in Korean.³ Although

³ The right-periphery elements in Korean have been referred to as both mood markers (Cho 1996; Cha 1999; Pak 2004; Kim 2011), and sentence enders (Sohn1996; Lee and Ramsey 2000). *Ci* has been analyzed as both a yes-no question particle and a WH-question particle (Cheng 1997), and *ni* has been argued to be either the realization of an interrogative operator (Beck and Kim 1997), or a question marker or interrogative sentence-type suffix (Sohn 1999; Ko 2005; Kwon & Zribi-Hertz 2008). Pak (2006) proposes that the sentence markers *la*, *ca* and *ma* are not force markers, but markers of the jussive clause type. Pak (2008) argues that sentence enders are not markers of sentential force, but can be categorized into special mood particles, speech act particles, and clause typing particles. Han and Lee (2008) propose two separate projections: ModP and the imperative illocutionary force projection (CP). The investigation of Korean COMPs undertaken by Hahn (2003) shows that each COMP has a wider distribution than

lexical items that appear in the right periphery in Korean interact with modals, we argue that these items belong syntactically and functionally within the framework of a Rizzi-style C system, and should be treated as phonological realizations of an abstract COMP in Force⁰ or Type⁰.

2.1 Question force and complementizers in main clauses

The first morpho-syntactic asymmetry between main and embedded question COMPs is their distinct morphological forms. The grammatically possible correspondences between main clause speech act type and COMP are listed in Table 1 (cf. Yoon 1999). Each speech act type actually has more variants than the ones that appear in this table, however. Some COMPs show one-to-one correspondence to a particular speech act (*ko*, *la*, *ca*, and *ta*), while others show multiple correspondences (*e*, *lay*, *ni*, *tay*, *ci*, and *kka*). Some COMPs can appear in both assertion and questions (*e*, *lay*, *tay*). These COMPs are not in free variation, since they interact with distinct subjects, as discussed in section 3.

COMP	e	lay	ni	kka	tay	ci	ko	la	ca	ta
SPEECH ACT Type										
WH-Q	\checkmark	\checkmark	\checkmark			\checkmark				
PQ	\checkmark		\checkmark		\checkmark					
AQ	\checkmark	\checkmark	\checkmark		\checkmark					
PAQ	\checkmark		\checkmark		\checkmark					
TAGQ						\checkmark				
ECHOQ										
EXCLAIM			\checkmark							
COMMAND								\checkmark		
EXHO						\checkmark			\checkmark	
ASSERTION		\checkmark			\checkmark					

Table 1 Korean speech act types and possible correspondences with main-clause complementizers

The most common COMPs that appear in intimate speech are ni (and e/a) in main clauses. In the example in (15), the clause containing ni expresses a polar question. In (16), ci marks the utterance as a tag question when no argument in a clause is a WH-word. The double occurrence of the COMP kka in (17) marks this sentence as a PAQ.

(15)	ne-nun	nayil	hakkyo-ey	ka-ni?	(POLAR)
	you-TOP	tomorrow	school-LOC	go-C	
	'Are you go	oing to schoo			

is indicated by the facts discussed in this article. For reasons of length, we are not able to account here for the entire range of behaviour of each COMP in all different contexts.

(16)	ne-nun	nayil	hakkyo-ey	ka-ci?	(TAG)			
	you-TOP	tomorrow	school-LOC	go-C				
	'You are go	ing to school	l tomorrow, aren	i't you?'				
(17)	tayhak-ey	ka-l- kka	mal -kka ?		(PAQ)			
	college-LOC go-MOD-C not.MOD-C							
'Should I go to college, or not?'								

These utterances can be embedded, in which case the COMP ci is used, as in (18)-(20).

(18)	nay-ka	nayil	hakkyo-ey	ka- nun-ci	mwul.ess-ta.
	I-NOM	tomorrow	school-LOC	go-C-C	asked-C
	'pro asked	if I am going	to school tomor	rrow.'	
(19)	nay-ka	nayil	hakkyo-ey	ka- nun-ci	hwakinhay.ss-ta.
	I-NOM	tomorrow	school-LOC	go-C-C	confirmed-C
	'pro ascert	ained whether	r I will be going	to school tome	orrow.'
(20)	na-nun	tayhak-ey	ka-l -ci	mal-ci	komini-ta.
	I-TOP	college-LO	C go- C - C	not.MOD-C	agonized-C
	'I agonize	over whether	I should go to c	ollege or not.'	

The systematic morphological realization of ci in embedded clauses, corresponding to various COMPs in main clauses, has not previously been fully analyzed in the literature. The Korean lexical items ni and ci are both glossed as [+Q] by most scholars (Cheng 1997; Beck & Kim 1997, 2006; Han & Romero 2004a; Ko 2005; Kwon & Zribi-Hertz 2008; Ginsburg 2009; Hwang 2010). However, the ni and ci are not in free variation when they appear in the right periphery of questions.

The fact that distinct COMPs in the head of ForceP convey distinct question forces implies that these COMPs must contain more features than [+Q]. The data in Table 1 suggest that, in the case of main clauses, we need to identify specific features on each COMP that are not shared by other question force COMPs. Korean lexical items that occur in the right periphery not only express sentence types such as declarative, interrogative, imperative and exhortative, but may also express a specific subcategory of question. Questions can be subcategorized into polar (yes-no), constituent (WH), alternative, polar alternative, echo, and tag questions. The COMPs of all these different question types are interpreted in the same Force Projection in Korean. In embedded clauses, on the other hand, the COMP *ci* does not indicate any specific subcategories of question illocutionary force. This contrast strongly suggests that *ni* and *ci* belong to the distinct functional heads.

3. Evidence for agreement in ForceP: interaction with speech act participants

Some Korean COMPs, including *e* and *lay*, appear in both questions and declarative sentences. We claim that these COMPs have an underspecified [FORCE] feature instead of the feature $[Q]^4$. They also carry a PERSON specification. The derivation converges at PF and LF when the ϕ -feature (PERSON) of the force operator matches the ϕ -feature (PERSON) of a local subject. The COMP *ni*, in the polar question (21), is complementary with *lay* in the context of reflecting the subject's point of view (cf. Speas 2003). In the question in (21), the speaker (not the subject of the root verb *ka* 'go') wants to know the truth of the event, but in (22) the speaker asks for the subject (addressee) to share his/her plan or opinion about the event.⁵

(21)	ne-nun	nayil	pathi-ey	ka-ni?
	you-TOP	tomorrow	party-LOC	go-C
	'Are you g	joing to the p	party tomorrow	v?'
(22)	ne-nun	nayil	pathi-ey	ka-l-lay?

you-TOP tomorrow party-LOC go-MOD-C 'Would you like to go to the party tomorrow?'

The COMPs *ni* and *lay* are not in free variation, as shown in (23).

(23) a. * ne-nun nayil pathi-ey ka-lay? you-TOP tomorrow party-LOC go-C
'Are you going to the party tomorrow?'
b. * ne-nun nayil pathi-ey ka-l-ni? you-TOP tomorrow party-LOC go-MOD-C
'Would you like to go to the party tomorrow?'

Unlike the clause with *lay* in (22), which is interpreted as a question with a second person subject, the sentence in (24) is interpreted as a declarative when the subject is in the first person. It is not the case that rising or falling intonation changes the force of the sentence. The COMP *lay* occurs with subject and Force agreement for <1st, DECL> and <2nd, QUES>.

(24) na-nun nayil pathi-ey ka-l-lay. *I-TOP tomorrow party-LOC go-MOD-C* 'I would like to go to the party tomorrow.'

⁴ The semantic interpretation of a feature - [Q] versus \emptyset or [+Q] versus [-Q] - is not well defined. What semantic interpretation results when the head of C lacks [Q] or [-Q]? Both declarative and imperative COMPs can be \emptyset or [-Q] in Korean.

⁵ According to Hahn (1991), the morpheme l is an allomorph of *keyss* or li, which expresses an unconfirmed event. Hahn considers *l-lay* to be a complex sentence ender. According to Ceong's intuition, *ni* is used when a speaker asks about the truth value of a proposition, whereas *l-lay* is used when a speaker asks about the addressee's plan or opinion. The Standard Korean Language Dictionary (NIKL) defines *l-lay* as an ender, which is a suffix attached to a verb stem, used to express the speaker's willingness or to ask for the addressee's opinion.

If a first-person subject occurs in the context of the question in (22), *kka* is the appropriate complementizer, as shown in (25).

(25)	na-nun	nayil	pathi-ey	ka-l-kka?
	I-TOP	tomorrow	party-LOC	go-MOD-C
	'Should I g	o to the party	tomorrow?'	

l-kka is a complex question COMP which expresses the speaker's intention or assumption (Hahn 1991). *kka* is incompatible with a second-person subject, as shown in (26).

(26) * ne-nun nayil pathi-ey ka-l-kka? *you-TOP tomorrow party-LOC go-MOD-C* 'Would you like to go to the party tomorrow?'

To sum up, the complementizer *kka* occurs with subject and Force agreement for <1st, QUES>.

The empirical data illustrated above suggest that the clauses with different COMPs in (21)-(25) are interpreted as polar questions that have different "points of views" – i.e., they differ in terms of both subject/speaker and Mood, in the sense of Cinque (1999). The COMP *l-lay* inquires about the volition of a subject in addition to indicating question force, while ni inquires about the truth of a proposition only. However, *l-lay* cannot express the volition of a third-person subject. The data above imply that COMPs in main clauses converge at PF and LF through agreement between Force and the phi-feature (PERSON) of a subject.

We have shown that the specification of Force in Korean is expressed in the right periphery via COMPs in the head of Force. However, the interpretation of Force on a clause is interpreted differently depending on the subject; the fact that certain subjects are compatible with certain COMPs in the environment of certain forces implies that main-clause COMPs contain not only the feature [FORCE] but also the uninterpretable ϕ -feature [PERSON].

3.1 Lack of agreement in TypeP: no interaction with speech act participants

The structure of the embedded clause is different from the structure of the main clause in terms of: i) the occurrence of the subordinator *nun* (un/n); and ii) the co-occurrence with the neutralized complementizer *ci* with concomitant lack of subject/force agreement phenomena; and iii) the illegitimacy of the topic marker *nun* on the embedded clause subject (cf. Ceong 2011).

(27) ciwu-nun ca-ni an ca-ni? Jiwoo-TOP sleep-C not sleep-C 'Is Jiwoo sleeping or not?' The root utterance in (27) cannot serve as a direct complement to the verb *kwngkumha* 'wonder'; that is, (27) cannot be embedded without the use of the quotation COMP *la/ha-ko* 'that' or the subordinator *nun* (or *l*). On the other hand, the utterances in (21) and (22) can be embedded using the COMP *ci*, as in (28a). Since the COMP *ci* is neutralized in embedded clauses, subject/force agreement disappears in this context. Any subject can co-occur with *ci*, as shown in (28b-c); the use of *ci* signifies the proposition entails irrealis mood or uncertainty.

- (28) a. nay-ka nayil pathi-ey ka-nun-ci mwul.ess-ta *I-NOM tomorrow party-LOC go-C-C asked-C* '*pro* asked if I am going to the party tomorrow.'
 b. na-nun ciwu-ka ca-nun-ci an ca-nun-ci kwungkumha-ta.
 - *I-TOP Jiwoo-NOM sleep-C-C not sleep-C-C wonder-C* 'I am wondering whether or not Jiwoo is sleeping.'
 - c. nay-ka yeyppu-n-ci ciwu-eykey mwuless-ta. *I-NOM pretty-C-C Jiwoo-DAT asked-C*'(I) asked Jiwoo if I am pretty.'
 - d. ne-ka cal sal-ko iss-nun-ci ciwu-eykey mwuless-ta. you-NOM well being-C-C Jiwoo-DAT asked-C
 '(I) asked Jiwoo if you were doing well.'

In contrast with the wide variety of distinct COMPs available in the right periphery in main clauses, the COMP in embedded Korean questions is neutralized to *ci*. Thus, the domain of embedded clauses shows a reduced and neutralized range of COMPs in comparison with main clauses. Based on these findings, we conclude that the main clause COMPs *ni*, *e*, *kka*, and *lay* are spelled out in a distinct environment from the neutralized embedded COMP *ci*. In particular, the ϕ -feature (PERSON), which is relevant for COMPs in main clauses, does not enter into an Agree relationship with embedded COMPs. This contrast constitutes strong evidence for our proposed distinction between ForceP and TypeP.

4. Incompatibility of two forces in main clauses

In addition to the appearance of different functional items in main and embedded Korean PAQs, further evidence exists that the two clause types differ in essence. This section discusses the incompatibility of the Korean PAQ COMP [C-not-C] with constituent question force in main clauses, as in (29).

(29)	a. *nwu-ka	hakkyo-ey	ka.ss-e/ni	mos	ka.ss-e/ni?				
	who-NOM	school-LOC	went-C	cannot	went-C				
	*'Who could go to school or not?'								
	b. *na-nun	mwes-ul	sal-l-kka	mal-kka	?				
	I-TOP	what-ACC	buy-MOD-C	not.MO	D-C				
*'What should I buy or not?'									

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c. *ne-nun mwes-ul sal-l-lay mal-lay?

you-TOP what-ACC buy-MOD-C not.MOD-C

*'What would you buy or not?'
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Whereas ungrammaticality results for (29), in which PAQ COMPs such as *e*-mos-e, ni-mos-ni, kka-mal-kka, and lay-mal-lay co-occur with WH-words, WH-words can appear grammatically in embedded clauses (30) having the PAQ marking COMP *ci-not-ci*. This asymmetric behaviour contrasts with the symmetric behaviour between main PAQ (27) and its embedded form (28b). The English counterparts to (29) and (30) show the same contrast as well.

(30) a. [nwu-ka hakkyo-ey ka.ss-nun-ci kass-nun-ci] mos who-NOM school-LOC went-C-C went-C-C cannot kwungkumha-ta/alko-sip-ta/molun/mwuless-ta. wonder/want to know/don't know/asked-C '(I) wonder/want to know/don't know/asked who could or couldn't go to school.' kyelcenghay.ss-ta. b. [mwes-ul sa-l-ci mal-ci] ppali what-ACC buy-MOD-C not.MOD-C quickly decided-C

(I) quickly decided what I should or shouldn't buy.'

We account for the distinct behaviour of COMPs in the two types of clauses by proposing an analysis which addresses the interface between speech act theory and syntax. We propose that Korean PAQs are incompatible with constituent questions in main clauses because main clauses are associated with illocutionary force (Austin 1975; Degand 2006; Allan 2006). We further claim that a main clause has just a single illocutionary force. As a result, a main clause COMP can contain only one feature of question force, such as [POLAR], [WH]⁶, [POLARITY ALTERNATIVE], [CONFIRM], and so on. The examples in (29) are ungrammatical because they contain two force features.

The sentences in (30) are statements: the main clauses possess assertive illocutionary force. The embedded clauses contain no illocutionary force of any kind. Rather, the embedded clauses correspond to facts. For example, if I know who came, I know something—a fact. On our terminology, this 'something' is interpreted as an interrogative rather than an embedded "question". In these examples, we claim that the Type head has a feature cognate with the feature of PAQs and, following Rizzi (1997), that FocusP houses the *wh* operator. The structure of the sentences in (30) therefore arises not from the co-occurrence of two different question forces, but from the **lack** of illocutionary force within the embedding, combined with syntactically compatible TypeP and FocusP (cf. Cristofaro 2003).

More generally, the head of an embedded clause cannot have the feature [FORCE] regardless of whether it is declarative or interrogative. We argue that

⁶ A question with multiple WH-words is possible because the sentence still has only a single kind of illocutionary question force.

the interpretations of the Korean embedded COMPs ci 'if; whether' and *kes* 'that', and their English counterparts are determined based on the fact that the head of TypeP lacks the feature [FORCE]. If Type⁰ hosts a COMP carrying an [INT] feature, we shall refer to this as 'interrogative', to distinguish this property from the property of being a 'question', which only pertains to main clauses on our account.

The asymmetrical illocutionary force properties of main versus embedded clauses are supported by two empirical facts: a) a number of different force complementizers can appear in main clauses, but only the neutralized finite complementizer *ci* occurs in embedded clauses; b) the honorific marker *yo* can occur in main clauses but not embedded (cf. Ceong 2011). Data relating to (a) have been extensively discussed in this article; the implications of (b) will be left for future study.

5. The structure of ForceP and TypeP

In the preceding sections, we have shown that asymmetries between main and embedded clauses are not merely alternations between overt and null forms of the same $[\pm Q]$ complementizers. In this section, we follow this observation up by developing a distinction between ForceP and TypeP. We advocate the replacement of the syntactic terms "direct question" and "embedded question" with "question" and "interrogative."

5.1 ForceP: Main-clause complementizers and features

Following Baker (1970) and others, Rizzi (1997) does not distinguish between main and embedded clauses in terms to ForceP (or other CP-type categories).

"Complementizers express the fact that a sentence is a question, a declarative, an exclamative, a relative, a comparative, an adverbial of a certain kind, etc., and can be selected as such by a higher selector." (Rizzi 1997:283)

Rizzi (1997) argues that [Spec, FocusP], rather than [Spec, ForceP] is the landing site of WH-movement drawing evidence from the complementarity of WH and focus. In a later paper (2001), Rizzi goes on to propose that the Italian embedded polar interrogative head *se* 'if' occupies a position higher than FocusP but lower than ForceP and TopicP. Based on the distinct positions of Italian *che* 'that' (Force) and *se* 'if', Rizzi introduces the projection IntP where *se* belongs. Concerning operators, in the literature outside of Rizzi, WH*op* is typically the only peripheral operator discussed. We propose to extend this approaches are possible to account for the existence of COMPs with distinct forces: i) we might postulate a specific question force operator for each question type such as POLAR*op*, WH*op*, PAQ*op*, ECHO*op*, TAG*op*, etc.; or ii) we might adopt the notion of feature bundles in the head of ForceP. Such bundles would consist of hierarchical features such as a first-order feature [Q (UESTION)] and a second-order feature in the sense of Adger and Svenonius (2011). For instance,

the question force feature [Q] might combine with additional features to produce a polar {[Q], [POLAR]}, a constituent question {[Q], [WH]}, a polar alternative question {[Q], [PA]}, a tag question {[Q], [CONFIRM]}, or an echo question {[Q], [QUOT]}. These kinds of hierarchical feature bundles are employed by Ceong (2011). However, we also argue that the presence of a question operator in the Spec of ForceP in Korean is necessary in order to account for the data in (31) and (32). Here, two morphologically identical utterances receive alternative interpretations according to their specific intonational contours.

(31)	eti	ka-ss-ess-ni?	(WH-Q)
	where	go-PST-PSP-C	
	'Where	have (you) been?'	
(32)	eti	ka-ss-ess-ni?	(POLAR)
	where	go-PST-PSP-C	
	'Have (y	you) been somewhere?'	

In (31), WHop occupies [Spec, ForceP], yielding a constituent question, while in (32), PQop occupies [Spec, ForceP], yielding a polar question and an indefinite interpretation for *eti* 'where; somewhere'. Based on the various illocutionary force possibilities, we argue that Forceop can be subcategorized to POLARop, WHop, PAQop, ECHOop, or TAGop.

The distinct force and interpretation of the morphologically identical COMPs illustrated in (33) and (34) is strong evidence for the existence of distinct force operators in ForceP.⁷

(33)	a.	ku chinkwu.tul-un mwues-ul cohaha- ci ?							
		the friends-TOP what-ACC like-C							
		'(I am wondering) what the guys like.'							
	b.	ku chinkwu-nun ne-lul cohaha- ci ?	(TAG)						
		the friend-TOP you-ACC like-C							
'The guy likes you, doesn't he?'									
(34)	a.	ku chinkwu.tul-i ne-lul cohaha-n-ta- ko ?	(ECHO)						
		the friends-NOM you-ACC like-PRES-C-C							
		'(Are you saying that) they like you?'							
	b.	ku chinkwu-nun ne-lul cohaha-y.	(ASSERT)						
		the friend-NOM you-ACC like-C							
		'He likes you.'							

The COMPs ci and ko have different interpretations depending on whether they appear in main clauses or embedded clauses; ko marks echo questions in main clauses, but it can serve as a direct quotative marker in embedded clauses, as shown earlier in (8). Constituent questions with the complementizer ci (33a) are not interpreted the same way as confirmative questions (33b), and a hearer/addressee is less engaged in constituent questions with ci than in those

⁷ In (33)-(35), *chinkwu*, literally 'friend', translates as colloquial 'guy' or a third person pronoun.

with ni (cf. (10) and (31)). This implies an interaction between FocusP, the projection associated with constituent questions, and ForceP (cf. Ceong 2011). Question force in the head of ForceP requests a hearer to respond verbally to what is asked, thus making this clause type distinct from an assertion or command. This illocutionary intention is absent from embedded interrogatives, as will be discussed in the next section.

5.2 TypeP: Embedded-clause complementizers and features

We claim that what has been assumed to be ForceP in embedded clauses is actually TypeP. The data we have shown in this article require a major rethinking of the received analysis of ForceP and IntP as expressed in Rizzi (2001). Our analysis shows that the pragmatic categories of illocutionary force are highly significant for syntactic analysis in ways that have not been treated consistently in theoretical discussions of questions, particularly regarding the very distinct roles of questions and 'interrogatives'.

We assume that Korean *ci* in embedded contexts occupies the position that Rizzi (2001) terms Interrogative Projection (IntP). However, use of this projection does not appear to be restricted to interrogatives in Korean: the embedded realis COMP *kes*, distinct from the COMPs *ta*, *e*, *lay* and *tay* in main clause non-questions, appears in the same position as *ci*.

(35)	a.	nay-ka	ku	chinkwu-lul	cohaha-nun- ci	mw	ul.ess-ta		
		I-NOM	the	friend-ACC	like-C-C	ask	xed-C		
	<i>pro</i> asked if I like the guy.								
	b.	nay-ka	ku	chinkwu-lul	cohaha-nun-kes-	-ul	an-ta.		
		I-NOM	the	friend-ACC	like-C-C-ACC		know-C		
'pro know that I like the guy.'									

We propose therefore to replace the term IntP with TypeP, as this projection can select either declarative clauses or interrogatives without illocutionary force.⁸

6. Conclusions

We have pursued the idea that the heads of CP layers determine the superficial morphological forms of COMPs in a language like Korean. We have argue that COMPs which are spelled out in the head of ForceP are interpreted as carrying illocutionary force at LF, while complementizers which are spelled out in the head of TypeP are interpreted as lacking illocutionary force at LF. The discussion in this article suggests that the distinct properties of the heads of main and embedded clauses may provide a rich area for further study. When

⁸ To clarify, Ginsburg (2009) uses the terms TypeP and ForceP in a manner opposite to the way in which they are used in this paper. He considers TypeP to contain clausal typing elements, and ForceP to contain an element that indicates that a clause is embedded (p.38). In this article, we follow Rizzi's C system, except we replace his IntP with TypeP. Cheng (1997) and Denham (2000) use the notion 'Clausal Typing'.

researchers discuss clause types in terms of the C system, the generally accepted distinction is between declarative, interrogative, and imperative. However, it is also possible to draw a distinction between main and embedded clauses in terms of the C system. This type of argument seems not to have been much in vogue in recent years.

This article recalls some early arguments by researchers who doubt whether embedded clauses can be considered to be truly "questions." We propose that there is a need to consistently separate the term 'question' and 'interrogative' in syntax.

In the latter part of this article, we discussed some consequences and theoretical implications of our analysis. Firstly, we observed that the asymmetry found in Korean between main and embedded clauses in terms of illocutionary force occurs in English as well. This raises the question of whether the distinction between ForceP and TypeP might be shared across all languages.

In distinguishing ForceP as an exclusively main clause projection, we join in the task of accounting for the significant asymmetries between main and embedded clauses in languages of the world, such as main clause-only complementizers in Mandarin, embedded clause-only complementizers in Japanese, English embedded "question inversion" (McCloskey 2006), and the syntactic nature of "insubordination" and COMPs that can serve in either main or embedded clauses. In future studies, we hope to extend the work done here by exploring ways to accommodate Speech ActP (Cinque 1999, Speas & Tenny 2003, Speas 2004) into an analysis where ForceP is the highest projection in main clauses.

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