Logical Structure and Case Marking in Japanese

by

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Abstract

Logical structures and case marking systems in Japanese are investigated in the framework of Role and Reference Grammar.

Chapter one summarizes theoretical backgrounds. In chapter two, transitive, ditransitive, inversion, possessor-raising, causative, direct passive, and indirect passive constructions are discussed. In chapter three, syntactic behaviors such as so-called 'subject'-honorific predicates, a reflexive *zibun*, and gaps of *nagara*- 'while' clauses are investigated.

Based on the observations of those structures and syntactic behaviors, it is concluded that case marking systems in Japanese are accounted for by referring to logical structures and the notion of 'pragmatic peak'. Instead of grammatical relations, the combination of semantic argument status in logical structures, syntactic argument/adjunct status, and pragmatics is appropriate to describe case marking systems and syntactic behaviors in Japanese. The 'biclausal' characteristics of causative sentences and indirect passive sentences are also accounted for by logical structures. The construction of possessor-raising passives is also investigated and demonstrated that it is a type of direct passives rather than indirect passives, contrary to the predominant view in the literature.

Abbreviations

pragmatically anomalous

ACC accusative ACH achievement ACM accomplishment

ACT activity

ACT-ACH active-achievement active-accomplishment

ASP aspect

AUX-V auxiliary-verb causative COMP complementizer conjunction

DCA direct core argument

DEC declarative
DEF definite
DO direct object
H honorific
IND indicative
INF infinitive
int. intended
IO indirect object

L linker LOC locative

LS logical structure macrorole MR negation NEG nominative NOM **NPST** nonpast NUC nucleus passive **PASS** plural pl present PRES past participle **PSTP PURP** purposive

RSLT resultative
sg singular
SUBJ subject
TNS tense
TOP topic marker

UND undergoer

PP pre/postpositional phrase

Notes on Transcriptions

Glosses, morpheme-boundaries, and translations in cited examples may be modified for the sake of consistency.

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Introduction

Grammatical relations, especially the notion of 'subject', have been one of the central notions in many theories in syntax. In the following examples of inversion constructions, it is not easy to determine which argument is the 'subject'. The example (1) is from Japanese, the example (2) is from Italian, and the example (3) is from Korean.

(1) Japanese

Sensei-ni furansugo-ga o-wakari ni nar-u. teacher-DAT French-NOM H-understand become-NPST 'The teacher understands French.'

(2) Italian

Gli piacciono le sinfonie di Beethoven him.DAT like.3pl the symphonies of Beethoven. 'He likes Beethoven's symphonies.' (Perlmutter 1984:293)

(3) Korean

Sensaengninm-eykey casin-iy yunyensicel-i saengkakn-at-ta. teacher- DAT self- GEN childhood -NOM remember-PAST-IND 'The teacher remembered his own childhood days.' (Gerdts 1987:194)

Japanese, an accusative language, usually encodes a 'subject' by a nominative case, however in (1), instead of the subject, the theme NP *furansugo* 'French' is encoded by the nominative *ga*. The so called logical subject *sensei* 'teacher', which is the subject from the semantic point of view, is encoded by the dative case *ni*. This case encoding suggests that the theme NP is the syntactic subject. On the other hand, the dative coded NP triggers *o...ni naru* honorification. As we will see later in details, it has been pointed out (Harada 1976, Shibatani 1978) that the NP which triggers *o...ni naru* honorification is the subject. The example (1) shows mismatch of the logical subject and the syntactic subject in semantics, case coding, and syntactic behaviors such as the so-called subject honorification. Examples from other languages show the same contradiction. In (2), the logical and semantic subject is dative, while the theme NP is nominative, and the verb agrees with the nominative NP. Perlmutter (1984) provides five

syntactic phenomena indicating indirect object-hood and four phenomena indicating subject-hood of the same dative NP *Gli*. In Korean, the controller of a reflexive is either subject or direct object (Kozinsky and Polinsky 1993:187). The reflexive controller in (3) suggests the dative NP *sensaengninm-eykey* 'teacher-dative' is the subject, while the dative case suggests it is not the subject.

It is evident from these examples that a single term 'subject' is not sufficient to refer to a NP whose 'subject'-hood is not consistent in terms of semantics, morphology, and syntax. 'Subject'-hood also varies between constructions as we will see elsewhere in this paper.

The framework I use to tackle these problems is Role and Reference Grammar (henceforth RRG) of Van Valin and Lapolla 1997 (henceforth VV & LP). RRG claims semantic structures (i.e. logical structures) but not grammatical relations are primitives. In this theory, the trigger (i.e. controller) of the honorification in the Japanese example, the controller of the verb agreement in the Italian example, and the controller of the reflexive in the Korean example are structure-specific. In other words, a controller is not necessarily the same among different structures within a language, nor does RRG claim that a nominative case is a 'subject' marker. In this paper, I will discuss how these claims can shed new light on some case marking patterns in Japanese.

Chapter 1

Theoretical Background

1.1. Logical structures and macroroles

In RRG, semantic decomposition of predicates and their semantic argument structures are represented as logical structures (henceforth LS). A similar notion called 'argument structure' or 'semantic structure' is found in other literature.

- **(1)**
- (a) 'The mouse died.'
 BECOME **dead**'(mouse)

[accomplishment]

- (b) 'The cat killed the mouse.'

 [do'(cat, Ø)]CAUSE [BECOME dead'(mouse)] [causative accomplishment]
- (c) 'John made the cat kill the mouse.'
 [do'(John, Ø)] CAUSE[[do'(cat, Ø)]CAUSE [BECOME dead'(mouse)]]
 [causative accomplishment]
- (d) 'John ran.'
 do'(John, [run'(John)]) [activity]
- (e) 'John is at the store.'

 be-at'(store, John) [state]
- (f) 'John ran to the store.'
 [do'(John, [run'(John)])] & [BECOME be-at'(store, John)] [active accomplishment]
- (g) 'The window shattered.'
 INGR **shattered**' (window) [achievement]
- (h) 'John gave the book to Mary.' [do'(John, Ø)] CAUSE [BECOME have' (Mary, book)] [causative accomplishment]

In RRG, there are four basic classes of predicates: states, activities, accomplishments, achievements (cf. Dowty 1979, Vendler 1957). In addition, accomplishment with activity, i.e. active accomplishments, is recognized. As we will see in the following chapter, there are also active achievement predicates in Japanese. The classes are determined by Aktionsart tests such

as whether the predicate may occur with *for one hour, in one hour,* and *slowly*; and whether the predicate occurs in the progressive or not (see VV & LP for details). The characteristics of the basic four classes are summarized in terms of three features, [static], [punctual] and [telic]. The last feature [telic] refers to the presence of an inherent temporal terminal point.

(2) State [+static][-telic] [-punctual]
Activity [-static] [-telic] [-punctual]
Accomplishment [-static] [+telic] [-punctual]
Achievement [-static] [+telic] [+punctual]

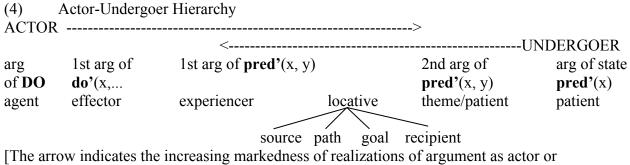
The notation **do'** denotes an activity predicate as in (1d). The example (1e) without **do'** denotes a stative predicate. The notation BECOME in example (1a) denotes an accomplishment predicate. The notation INGR in (1g) denotes an achievement predicate. It is interesting to note that in English, *die* is an accomplishment since it can be used in the progressive e.g., 'he is dying.' On the other hand, *sinu* 'die' in Japanese is an achievement. (cf. VV & LP 106.)

(3) Kare-wa sin-de-i-ru.
he-TOP die-L-RESL-be.
'He is in the state of being dead.' = 'He is dead.'
INGR dead'(he)

The notation \mathcal{O} in (1b, c, h) denotes unspecified activity. All clauses may have causative counterparts indicated by the notation CAUSE as in (1b,c,h). The notation & in (1f) denotes temporarily sequenced state of affairs without causation.

RRG posits two macroroles, actor and undergoer. The actor subsumes agent-like thematic roles (e.g. an agent, an experiencer) while the undergoer subsumes patient-like thematic roles (e.g. a theme, a patient). In (4) below, the argument at the left end of the actor-undergoer hierarchy is the most typical actor, namely an animate agent that acts upon and affects an undergoer argument. The argument at the right end is the most typical undergoer, namely an inanimate patient that is acted upon and affected by an actor argument. Moving toward the center

of the scale, actor-hood and undergoer-hood become less typical. An 'agent' is the x argument preceded by the notation **DO'**, for example, as in the verb *murder* as represented by **DO'**(x, [do'(x, [kill'(x, y)]) CAUSE [BECOME be-dead'(y)]. Usually, the notation **DO'**(x is usually omitted in the representation, because agentivity is an implicature for most verbs. (Holisky 1987, Van Valin and Wilkins 1996; but see Hasegawa (1996: 60) who argues that many Japanese verbs, unlike English, are lexically agentive.)



[The arrow indicates the increasing markedness of realizations of argument as actor or undergoer]

When a **pred**' is preceded by **do**', it denotes an activity predicate; the **pred**' which is not preceded by **do**' denotes a stative predicate. This diagram is a combination of the one in Van Valin (1993) and the one in VV & LP. Thematic roles in RRG are primarily determined in terms of the Aktionsart of a predicate and the position of arguments within a LS. RRG has no commitment to their labels.

Using the hierarchy, *John* in (1h) repeated below is the actor, while between *Mary* and *book*, the lower ranking argument, *book*, is chosen as the undergoer. The remaining argument, namely *Mary*, is called a 'non-macrorole core argument'.

(1h) 'John gave the book to Mary.' [do'(John, Ø)] CAUSE [BECOME have' (Mary, book)]

The term 'argument' is used in two senses. In one sense, it refers to semantic argument(s) that a predicate requires semantically. *Kill*, for example, takes two semantic arguments and *give*

takes three semantic arguments. The other sense of argument refers to syntactic argument(s). We can see these two senses in the following example:

(5) The mouse was killed by the cat.

Here, *mouse* is a semantic argument as well as a syntactic core argument while *cat* is a semantic argument but not a syntactic core argument ('core' refers to a syntactic but not a semantic property). *Cat* is syntactically an adjunct, i.e., peripheral element in RRG terminology. *At six* in (6), a modifier of the phrase *John got up*, is also an adjunct.

(6) John got up at six.

To the station in (7) and on the desk in (8),

- (7) John ran to the station
- (8) John put the book on the desk

are called a 'semantic/syntactic argument-adjunct'. An argument-adjunct is like an adjunct since neither of them is completely predictable from their LS. Note that *John ran* and *John put the book down* without an argument-adjunct are complete sentences. On the other hand, if they appear in sentences, they are construed as semantic/syntactic arguments of predicates rather than adjuncts.

1.2. Case

VV and LP propose case assignment rules for German and Icelandic as follows. I added 'core' in the definition as they note that 'these rules apply within the core direct arguments only.'
(p.359)

- (9) Case assignment rules for German and Icelandic
 - a. Assign nominative case to the highest-ranking macrorole core argument.

- b. Assign accusative case to the other macrorole core argument.
- c. Assign dative case to non-macrorole core argument (default).

The rules are a semantics-based formulation with syntactic constraints incorporated. Interaction between semantics and syntax is most evident in a passive construction.

(10) He was hit by Mary. LS: **do'**(Mary [**hit'**(Mary, 3sg.m)])

Mary would be the actor and a syntactic argument if the sentence were active, but in the passive sentence, *Mary* is an adjunct syntactically (i.e. actor-adjunct). Consequently, the other macrorole, namely the undergoer is the highest macrorole argument syntactically and receives nominative case. I will use the above formulation as a starting point to formulate the case assignment rules of Japanese.

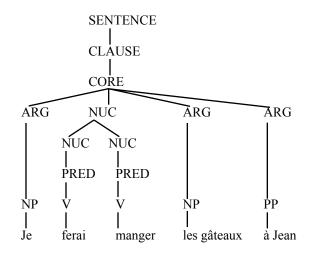
1.3. Nexus and Juncture

In RRG, syntactic structures are represented as layered structures by using two notions, juncture and nexus. Juncture refers to the three levels of syntactic units, viz. clause, core, and nucleus. Each level is determined in terms of 'operators' that modify different levels. For example, aspect is a nuclear operator, which modifies a nuclear level unit. Deontic/root modality is a core operator; tense is a clause operator. Nexus indicates how these units are combined. There are three kinds of nexus, viz. subordination, cosubordination, and coordination. If one unit is embedded within another unit, it is subordination. If one of two units is not embedded under the other, but obligatorily share the same operator at the level in question, it is cosubordination. If two units are coordinated and each unit may have its own operator at the level, it is coordination. My main concern in this paper is nuclear junctures. The sentence (11) is an example of nuclear cosubordination and the sentence (12) is an example of core coordination in

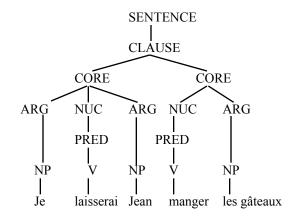
French from VV & LP (p.443-444).

- (11) Je ferai manger les gâteaux à Jean I will.make eat the cakes to Jean 'I will make Jean eat cakes.'
- (12) Jelaisserai Jean manger les gâteaux. I will.let Jean eat the cakes 'I will let Jean eat the cakes.'

(11') Nuclear cosubordination



(12') Core coordination



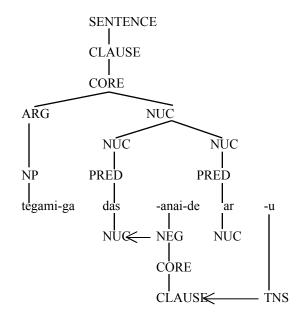
Nuclei must be adjacent to each other in linear order in nuclear juncture as in (11), while nuclei may be separated by an argument in core juncture as in (12). This is a characteristic to distinguish nuclear juncture from core juncture in French. Hasegawa (1996) argues that, in

Japanese, nuclear predicates in nuclear junctures cannot be separated by an element except by some particles such as a topic marker or nuclear-level operators. (See Hasegawa 1996: 67-70 for diagnostic tests of nuclear juncture in Japanese.)

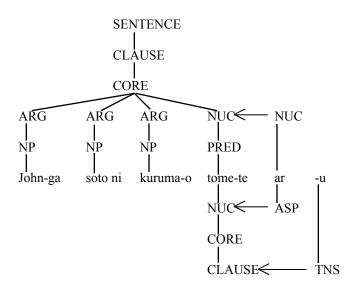
- (13a) Tegami-ga das -anai-de ar-u. (Hasegawa 1996: 88) letter-NOM send -NEG-L be-NPST 'There is a letter which hasn't been sent out.'
- (13b) Tegami-ga mada das -anai-de ar-u. (modified from Hasegawa 1996: 88) letter-NOM still send -NEG-L be-NPST 'There is still a letter which hasn't been sent out.'
- (13c) * Tegami-ga das -anai-de mada ar-u. letter-NOM send -NEG-L still be-NPST '(int.) There is still a letter which hasn't been sent out.'

The sentence (13) is an example of nuclear coordination and (14) is an example of nuclear subordination in Japanese. (Hasegawa 1996: 87-88).

- (14) John-ga soto ni kuruma-o tome-te ar-u John-NOM outside LOC car-ACC stop-L be-NPST 'John has parked the car outside.'
- (13a') Nuclear coordination



(14') Nuclear subordination



(14) is an example of nuclear subordination because 'the valence of the complex nucleus "V-te ar-" is identical with that of the TE-predicate (i.e. *tome-te*) itself...*ar*- makes no contribution to the argument structure' (Hasegawa 1996: 87). The representation of the layered structure is modified in accordance with VV & LP. By contrast, nuclear coordination and nuclear cosubordination may change the valence of the (first) predicate, which is the case in (13a). *Das-u* 'send' is a transitive verb, but when it is followed by *te-ar-* as in *das-i-te-ar-*, the valence is reduced by one and *das-i-te-ar-u* as a whole becomes an intransitive predicate. *Ar-* in (14) is an aspectual operator, while *ar-* in (13a) is a nuclear predicate. Note that *ar-* in (13a) is not an operator. If it were, *das-* 'send' would remain as transitive and *tegami* 'letter' would be marked by accusative. Thus, (13a) is either nuclear coordination or nuclear cosubordination but not subordination. In order to determine the nexus between the two possibilities, we look at nuclear operator sharing. Since the first predicate *das-* 'send' takes its own nuclear operator in (13a'), it is coordination.

Chapter 2

Logical Structures and Case

2.0. Introduction

In this chapter, I will discuss LSs and the application of case assignment rules to several constructions. I will begin with transitive verb constructions, which provide a good starting point for the illustration of LSs and case assignment rules. In the following section, in order to account for ditransitive verb constructions, I will modify the case assignment rules of VV & LP and introduce the notion of 'pragmatic peak'. Section 2.3 discusses inversion (nominative-dative) construction, where so called 'subject' is coded by dative case and 'object' is marked by nominative case. I will also argue that 'double nominative' constructions are the result of the application of two case-marking rules. Section 2.4 illustrates constructions of nominative-ni postposition, which are superficially identical to nominative-dative constructions in section 2.3, since both constructions take ni, as a postposition. Section 2.5 deals with a possessor-raising construction which is another double nominative construction. In section 2.6, causative constructions will be discussed. In the last section 2.7, passive constructions will be discussed with an emphasis on the indirect passive construction and the possessor-raising passive. The latter is a kind of 'direct passive' but has been confused with an 'indirect passive' in the literature.

2.1. Transitive Construction

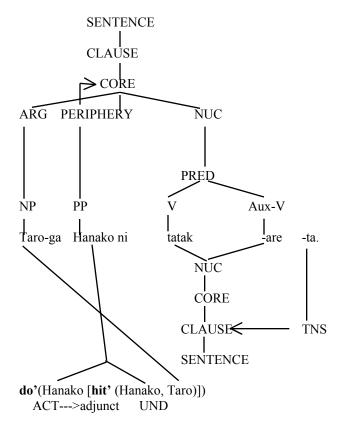
Typical examples with transitive verbs are (1) in the active voice and (2) in the passive voice.

(1) Hanako-ga Taro-o tatai-ta.
Hanako-NOM Taro-ACC hit-PAST

'Hanako hit Taro.'

(2) Taro-ga (Hanako ni) tatak-are-ta.
Taro-NOM (Hanako by hit-PASS-PAST
'Taro was hit by Hanako.'
do'(Hanako [hit'(Hanako, Taro)])
ACT--->adjunct UND

Hanako-ni is an actor-adjunct. The presence of the passive morpheme -(r)are- reduces the number of core arguments, since an argument is 'demoted' to the periphery or may be totally deleted from the clause. The passive morpheme -(r)are- is within a nucleus, but it is not predicative by itself since it does not have its own meaning besides reducing the number of arguments in direct passives. It is labeled as an auxiliary verb since it becomes inflected by tense like verbs. The layered structure, the logical structure, and their linking for (2) are as follows: (2'')



VV & LP's case assignment rules for Icelandic and German account for these Japanese

examples as well. The rules are repeated below.

- (3) Case assignment rules for German and Icelandic (VV &LP: 359)
 - (a) Assign nominative case to the highest-ranking macrorole core argument.
 - (b) Assign accusative case to the other macrorole core argument
 - (c) Assign dative case to non-macrorole core argument (default)

For example, in (2), the higher macrorole, which is the undergoer since the actor is 'demoted' to an adjunct, receives nominative case. Strictly speaking, the actor is not 'demoted' as Relational Grammar puts it. Non-derivational RRG regards the superficial 'demotion' as an alternative linking between the LS and syntax. The actor is linked to an adjunct whereas the undergoer is linked to the 'subject'. The former was called backgrounding, the latter was called foregrounding in Foley and Van Valin (1984). In order to avoid the confusion with terminology referring to pragmatic saliency in cognitive linguistics, VV&LP: 294 refer to them as 'Privileged Syntactic Argument Modulation' and 'Argument Modulation' respectively. I simply adopt 'demotion' and 'promotion' without a commitment to the derivational view of Relational Grammar.

2.2. Ditransitive Construction

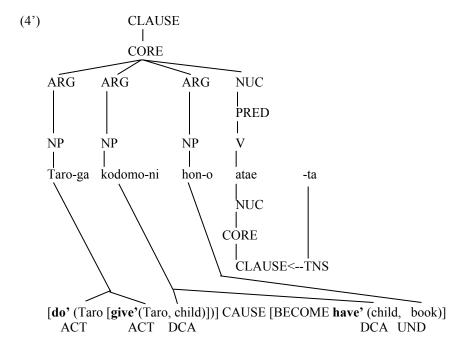
An example of ditransitive sentence is:

(4) Taro-ga kodomo-ni hon-o atae-ta.

Taro-NOM child- DAT book-ACC give-PAST

'Taro gave a book to the child.'

The layered structure of (4) is:



The identically represented semantic arguments in the LS (the first and the second *Taro*; the first and the second *kodomo* 'child' in the LS respectively) receive the same syntactic-semantic value.

Case marking of ditransitive sentences in the active voice follows the case assignment rule introduced above. The actor *Taro*, the higher macrorole, takes nominative according to the rule (3a). The undergoer *hon* 'book', the other macrorole, takes accusative according to (3b). By the rule (3c), the remaining core argument, the recipient, takes dative by default.

However, the rules fail to account for case marking of passive sentences with a ditransitive in Japanese. In Japanese, not only the theme, as in (5), but also the recipient may be passivized as in (6). Note that the recipient is a non-macrorole core argument and there is no dative shift in

Japanese.

- (5) Hon-ga Kodomo-ni (Taro ni-yotte) atae-rare-ta book-NOMchild-DAT (Taro by give-PASS-PAST 'The book was given to the child (by Taro).'
- (6) Kodomo-ga (Taro ni) hon-o atae-rare-ta . child-NOM (Taro by) book-ACC give-PASS-PAST 'The child was given the book (by Taro).'

The actor-adjunct is coded by *ni-yotte* rather than *ni* in (5) in order to avoid the ambiguity of homophones (i.e. the recipient and actor-adjunct).

For the sake of comparison, let us examine related English constructions. In English, verbs such as *present* and *give* alternate undergoer assignment between the theme and the recipient. (VV & LP: 338-360)

- (7b) They were presented to Mary (by him).
 UND OCA (actor-adjunct)
- (8a) He presented her with the books.

 [do' (he [present'(he, her)])]CAUSE [BECOME have'(her, the books)]

 ACT UND OCA
- (8b) She was presented with the books (by him).
 UND OCA (actor-adjunct)

Case assignment rules introduced above apply to these English examples. In passive sentences (7b) and (8b), the highest macrorole core argument, receiving nominative case, is the undergoer since the actor is an adjunct. The remaining syntactic core argument, which is called an 'oblique core argument', receives dative case as default in (7b). It is marked by the *with* preposition in (8b). Alternation of the undergoer with the verb *give* is known as a 'dative shift'.

(9a) John gave them to her.

- (9b) John gave her the books.
- (9c) * John gave her them.

In (9a), *them* is the undergoer, whereas in (9b), *her* is the undergoer. The case of *the books* in (9b) is not overtly marked. Both *her* and *the books* in (9b) must be accusative, given that they are not nominative. (9a) and (9b) can be passivized. Many American English speakers (but not British English speakers) find passivization of the theme in (9b) ungrammatical. It indicates American English has the constraint that only an undergoer may be passivized.

- (9a') They were given to her by John.
- (9b') She was given the books by John.
- (9b") *?The books were given her by John.

Acceptability of passivization in the dative shift sentences is controlled by the interaction of foregrounding versus backgrounding (in the sense of a cognititive operation), topicality, and speaker's perspective. (9b) indicates *her* is relatively foregrounded compared to *the books*. Topicalization of the foregrounded *her* as in (9b') is pragmatically natural, however topicalization of *the book* is odd because the dative shift in (9b) is the operation of backgrounding *the books*, while topicalization of *the books* in (9c) is foregrounding *the books*. Two operations contradict each other in terms of pragmatics, which leads to the oddity.

Load/spray verbs also show undergoer assignment alternation.

- (10a) John loaded the hay on the wagon.

 [do'(John [load'(John, wagon)]] CAUSE [be-on'(wagon, hay)]

 ACT OCA UND
- (10b) John loaded the wagon with the hay.

 [do'(John [load'(John, wagon)]] CAUSE [be-on'(wagon, hay)]

 ACT UND OCA
- (11a) They loaded a box onto the truck. (Yasui 1987: 147)

- (11b) * They loaded the truck with a box. (Yasui 1987: 147)
- (11c) They loaded the truck with a single, enormous box.

(10a) is considered to be the unmarked undergoer assignment, whereas (10b) is considerd to be the marked undergoer assignment in RRG. Marked assignment of macroroles is motivated by pragmatics and/or semantics. In (10a), the undergoer *the hay* receives a holistic interpretation, whereas *the wagon* receives a partitive interpretation. This holistic-partitive relation reverses in (10b) in accordance with undergoer assignment alternation. (11b) is ungrammatical because the holistic interpretation of *the truck* is not possible with a single box. However, Van Valin (p.c.) pointed out that (11c) is grammatical since a holistic interpretation is possible, even with a single box.

Not all verbs taking a goal allow the undergoer shift. *Put*, for instance, taking a typical goal, does not.

- (12a) John put the hay on the wagon.

 do'(John [put'(John, wagon)] CAUSE [be-on'(wagon, hay)]

 ACT AAJ, UND
- (12b) * John put the wagon with the hay.

Japanese lacks the undergoer assignment alternation. How then can we account for a sentence like (6) repeated below, which assigns nominative case to a non-macrorole core argument?

(6) Kodomo-ga (Taro ni) hon-o atae-rare-ta . child -NOM (Taro by) book-ACC give-PASS-PAST 'The child was given the book (by Taro).'

I propose that 'pragmatic peak' is another motivation to assign nominative case in Japanese. 'Pragmatic peak' refers to the most salient argument in a simple clause. The terminology is adopted from early RRG. Van Valin and Foley (1980:338-339) say:

Pragmatic salience is established by two interacting factors, discourse prominence (i.e., definiteness, specificity, and givenness), on the one hand, and what Zubin (1979) calls the speaker's "focus of interest," on the other, that is, that participant which the speaker treats as most salient in the situation under consideration. The pragmatically most salient NP in a clause is called PRAGMATIC PEAK....According to Zubin (1979), the speaker's focus of interest plays the primary role in German in determining which NP will occur as the pragmatic peak in the nominative case,...These two sets of pragmatic factors can be characterized as 'speaker related' and 'hearer related'. The speaker-related factors are those discussed by Zubin and reflect the speaker's judgment about the relative importance of the participants in a situation. ... The hearer-related factors, on the other hand, are those of definiteness, specificity, and givenness, which are tied up with speaker's assumption about hearer's ability to identify the referents of NPs and about what has been established in the discourse context.

What I refer to as 'pragmatic peak' is similar to Zubin's 'focus of interest'. Both are speaker-related factors. Hearer-related factors are usually called 'topic'. The pragmatic peak and discourse topic are distinct notions, therefore the pragmatic peak may actually be manifested as either a discourse focus (coded by the nominative ga) as in (13a), a discourse topic (the nominative ga is replaced by a topic particle wa) as in (13b), or a deleted topic (i.e. zero anaphor) as in (13c). If the pragmatic peak takes a surface case, it is nominative.

- (13a) <u>Taro-ga</u> daigaku e it-ta. Taro-NOM college to go-past 'Taro went to college.'
- (13b) Taro-ga daigaku e it-ta. <u>Taro-wa</u> keizaigaku -o benkyoo-si-ta. Taro-NOM college to go-past. Taro-TOP economics-ACC study-do-past.

'Taro went to college. Taro studied economics.'

(13c) Taro-ga daigaku e it-ta. Sosite, keizaigaku-o benkyoo-si-ta. Taro-NOM college to go-past. and economics-ACC study-do-past. 'Taro went to college. And (he) studied economics.'

Discourse focus is subsumed under the pragmatic peak, thus exhaustive *ga* (Kuno 1973) is one manifestation of a pragmatic peak (cf. section 2.3 for examples). The pragmatic peak may be best defined as a sum of various factors. The following are candidates to determine the pragmatic peak. They are not meant to be exhaustive or hierarchically ordered.

- (14)(a) A figure is more likely to be the pragmatic peak than the ground --- [Figure-ground hierarchy].
 - (b) Discourse focus is more likely to be the pragmatic peak.
 - (c) An animate nominal is more likely to be the pragmatic peak than an inanimate nominal---- [Animacy hierarchy].
- (d) A higher argument is more likely to be the pragmatic peak than a lower argument in the LS --- [Argument hierarchy]. (An argument that appears toward the left in the LS is higher than an argument that appears toward the right. For instance, in a schematic LS [pred'(x, y) CAUSE pred'(y, z)], x is higher than y, in turn, y is higher than z.)
 - (e1) The actor is more likely to be the pragmatic peak than the undergoer.
 - (e2) A macrorole is more likely to be the pragmatic peak than a non-macrorole core argument --- [Macrorole hierarchy].
 - (f) The pragmatic peak must be a core argument.

A pragmatic peak is manifested as nominative in Japanese (the same is true of German, as stated by Zubin) but the reverse is not necessarily true. There are nominative NPs which are not pragmatic peaks as we will see later. A pragmatic peak may interact with syntax but not

necessarily determine a controller, a pivot, or a subject. In chapter three, as we will see constructions whose dative NP, but not its nominative NP (i.e. a pragmatic peak), is a controller. Case and postposition assignment rules for Japanese, with the notion of pragmatic peak incorporated, are formulated as follows:

- (15) Case/postposition assignment rules (Japanese)
 - (P) Assign nominative case to the pragmatic peak.
 - (A) Assign nominative case to the higher-ranking macrorole core argument.
 - (B) Assign accusative case to the other macrorole core argument.
 - (C) Assign dative case to the other core argument as default (Direct Core Argument)
 - (C') The other core argument may take a postposition (Oblique Core Argument)
- (16) Nature of macrorole ranking

A 'demoted' macrorole is respected in terms of macrorole ranking even if it is not assigned case.

The rules apply in the order listed above. The rule (15P) is added to the former rules. In many instances, addition of (15P) is trivial because the higher-ranking macrorole core argument and the pragmatic peak are expressed by the same NP. I will discuss the nature of macrorole ranking, shortly.

Let us examine how the new rules handle the ditransitive sentences repeated below.

- (17) Taro-ga Kodomo-ni hon-o atae-ta
 Taro-NOM child-DAT book-ACC give-PAST

 'Taro gave a book to the child.'

 [do'(Taro [give'(Taro, child)])]& [have'(child, book)]

 ACT=peak DCA UND
- (18) Hon-ga kodomo-ni (Taro ni-yotte) atae-rare-ta book-NOM child-DAT (Taro by) give-PASS-PAST 'The book was given to the child (by Taro).'
 [do'(Taro [give'(Taro, child)])]& [have'(child, book)]

ACT--->adjunct

DCA UND=Peak

(19) Kodomo-ga Taro ni hon-o atae-rare-ta .
child -NOM Taro by book-ACC give-PASS-PAST
'The child was given the book by Taro.'
[do'(Taro [give'(Taro, child)])]& [have'(child, book)]
ACT--->adjunct DCA=peak UND

Case marking in (17) is straightforward and requires no explanation. Between (18) and (19), the choice of the pragmatic peak alternates. In (18), hon 'book' is chosen as the pragmatic peak because the undergoer outranks a non-macrorole for the choice of pragmatic peak. In (19), on the other hand, different criteria apply. The animate kodomo 'child' outranks the inanimate hon 'book', furthermore, the higher argument kodomo 'child' outranks the lower argument hon 'book'. Note that, in neither sentence, the actor-adjunct *Taro* cannot be the pragmatic peak. In (18), hon 'book' takes nominative by the rule (15P); kodomo 'child' takes dative by the rule (15C). In (19), kodomo 'child' takes nominative by (15P). Hon 'book' in (19) would be the highest macrorole receiving nominative if the actor-adjunct were not counted which would be true in Icelandic and German but not in Japanese. In order to account for the fact that the undergoer takes accusative but not nominative, I proposed the 'nature of macrorole ranking' in (16). The actor-adjunct or the implicit actor after ellipsis at syntax level is still counted as the higher macrorole at semantics. Thus, the undergoer hon 'book' is counted as the lower (i.e. the other) macrorole. The rule (15A) fails to apply to the actor-adjunct or the implicit actor since they are not syntactic core arguments. The rule (15B) applies to hon 'book' and assigns it accusative. Thus, both (18) and (19) are potential passive counterparts of (17). One of the two forms is chosen based on the context. (18) is used when the context requires hon 'book' to be the focus, while (19) indicates kodomo 'child' is the focus, such as an answer to wh-question sentences. (18) is used when there is a presupposition that something was given to the child,

whereas (19) is used when there is a presupposition that somebody was given the book.

An example of an oblique core argument is the goal of the verb *okuru* 'to send'. *Okuru* is ambiguous in the meaning between 'to send' and 'to present, give'. They are homophones but orthography differentiates them by different characters. *Okuru* 'to send' in (20) takes a goal nominal, whereas *okuru* 'to present or to give' in (21) takes a recipient.

- (20) Taro-ga afurika kara Hanako ni kozutumi-o okut-ta.

 Taro-NOM Africa from Hanako to parcel-ACC send-PAST

 'Taro sent a parcel to Hanako from Africa.'

 do'(Taro, [send'(Taro, Hanako)]) CAUSE [[NOT be-at'(Africa, parcel)] & [be-at'(Hanako, parcel)]]

 ACT

 AAJ

 OCA UND
- (21) Taro-ga Hanako-ni yubiwa-o okut-ta.

 Taro-NOM Hanako-DAT letter-ACC present-PAST

 'Taro presented a ring to Hanako.'

 do'(Taro, [present'(Taro, Hanako)]) CAUSE [have'(Hanako, ring)]

 ACT

 DCA UND

Although *Hanako* is a human in (20), it is construed as a goal, but not a recipient. We can argue for this view based on the facts that 1) *Hanako* is paired with the source of geographic location *afurika* 'Africa', 2) *Hanako* may be replaced by an explicitly 'localized' NP *Hanako no tokoro* 'Hanako's place' or *Hanako no moto* 'the place where Hanako stays at', 3) *Hanako* may be replaced by a goal of geographic location such as *Tokyo*. None of these three applies to the recipient of (21). The recipient may be replaced by *Tokyo*, but only if *Tokyo* is interpreted as an organization. It is noteworthy that the passivization of a recipient is perfectly fine while the passivization of a goal is anomalous. The interpretation I get from (20') is an adversative passive reading, where Taro sent a parcel to somebody else from Africa, and Hanako was affected.

- (20') ?? Hanako-ga afurika kara Taro ni kozutumi-o okur-are-ta. Hanako-NOM Africa from Taro by parcel-ACC send-PASS-PAST '(int.) Hanako was sent a parcel from Africa by Taro.'
- (21') Hanako-ga Taro ni yubiwa-o okur-are-ta. Hanako-NOM Taro by ring-ACC present-PASS-PAST 'Hanako was presented a ring by Taro.'

2.3. Inversion construction (Nominative-dative construction)

Inversion is the construction in which the so-called subject is coded by dative and the so-called object is coded by nominative.

- (22) Taro-ni sono imi-ga wakat-ta.

 Taro-DAT that meaning-NOM understand-PAST
 'Taro understood the meaning.'

 BECOME know'(Taro, meaning)

 DCA UND=peak
- (23) Taro-ni Hanako-ga mie-ta.
 Taro-DAT Hanako-NOM visible-PAST
 'Taro saw Hanako. (lit.) Hanako was visible to Taro.'
 visible'(Taro, Hanako)
 DCA UND=peak

The pragmatic peak *Hanako* in (23) receives nominative case by the case assignment rule (15P). The higher macrorole argument is the undergoer because there is no actor. The rule (15A) says to assign nominative to the higher macrorole, namely *Hanako*. However it has been already assigned nominative case by the rule (15P), therefore the rule (15A) does not apply. The

remaining non-macrorole core argument is assigned dative by the rule (15C). In Japanese, a single macrorole is the default for predicates containing no [+activity] (i.e. state, achievement, and accomplishment without **do'...** predicate). I propose the principle of M(acrorole)-transitivity for Japanese (and other languages with many inversion verbs) as follows:

(24)M-Transitivity Principle for Japanese

If a predicate has no activity predicate in its LS, the predicate is M-intransitive as default (i.e. it takes a single macrorole).

Van Valin (1993:47)'s Default Macrorole Assignment Principles state that '[f]or verbs which take one macrorole,...[and] [i]f the verb has no activity predicate in the LS, the macrorole is undergoer.' The principle (24) with the Default Macrorole Assignment Principles predict that a stative predicate has an undergoer but not an actor.

Other examples of inversion verbs are:

- 'to be audible' (25) kikoe-ru audible'(x, y) deki-ru 'can do' able'(x, y)*i-ru/hituyoo-da* 'to need' need'(x, y)'to have' ar-u have'(x, y)nai 'not have' NOT.**have'**(x, y)kowai 'be afraid of' afraid'(x, y)
- (26) Ningen-ni wa 50 herutsu ika-no oto-ga kikoe-nai. human.beings-DAT TOP 50 Hz under-GEN sound-NOM audible-not 'Human beings can not hear the sound under 50 Hz.'

Potential verbs derived by adding -(ar)e-r- to a verb stem are productive.

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tsuka-e-ru 'can use' use.able'(x, y) cf. tsuka-u 'to use' taber-are-ru 'can eat' eat.able'(x, y) cf. taber-u 'to eat' kir-are-ru 'can wear' wear.able'(x, y) cf. kir-u 'to wear'
```

(28) Kumon kaado de benkyoo sure-ba, 3 sai -no kodomo-ni mo kanji-ga Kumon cards by study do-if, 3 years.old -GEN child-DAT also kanji-NOM yomeru-yoo ni naru. read.able-nominalizer to become

'If he/she studies by using Kumon cards, even a three-year-old child becomes to be able to read kanji (chinese characters).'

The majority of inversion verbs have an alternative case marking pattern. Both arguments may be coded by nominative.

- (29a) Taro-ni okane-ga hituyooda Taro-DAT money-NOM need 'Taro needs money.' need'(Taro, money) DCA UND=peak
- (29b) Taro-ga okane-ga hituyooda Taro-NOM money-NOM need 'Taro needs money.' need'(Taro, money) DCA=peak UND

The two arguments in the inversion construction are equally good candidates for the pragmatic peak. On the one hand, *Taro*, a human nominal, is more likely the pragmatic peak than the inanimate *okane* 'money' according the animacy hierarchy. In addition, *Taro*, the higher argument is more likely to be the pragmatic peak than the lower argument *okane* 'money', according to the argument hierarchy. On the other hand, a macrorole argument, namely the undergoer *okane* 'money', is more likely to be the pragmatic peak than non-macrorole *Taro*. In (29b), the case marking rule (15P) assigns the pragmatic peak *Taro* nominative. The undergoer is the higher macrorole because there is no actor even in the periphery. The rule (15A) assigns

nominative to the undergoer. The result is a double nominative construction. When a speaker pays more attention to the non-macrorole direct core argument than the undergoer, the pragmatic peak shifts to the non-macrorole argument. It is the context that helps choose one of the two alternatives. In (29'b), *Taro* is the focus, i.e. pragmatic peak, since *Taro* is compared with others. Example (29'b) is more natural than (29'a) since *Taro* is coded by nominative in (29'). As the result, the sentence becomes a double nominative construction. In (29"a), *okane* 'money' is the focus, i.e. pragmatic peak, since *okane* is compared with others. Example (29"a) is more natural than (29"b) since not *Taro* but *okane* is marked by nominative in (29"a).

- (29'a)? Dare-yorimo Taro-ni okane-ga hituyooda anybody-than Taro-DAT money-NOM need 'Taro needs money more than anybody else.'
- (29'b)Dare-yorimo Taro-ga okane-ga hituyooda anybody-than Taro-NOM money-NOM need 'Taro needs money more than anybody else.'
- (29"a) Taro-ni nani-yorimo okane-ga hituyooda Taro-DAT anything-than money-NOM need 'Taro needs money more than anything else.'
- (29"b) ?Taro-ga nani-yorimo okane-ga hituyooda Taro-NOM anything-than money-NOM need 'Taro needs money more than anything else.'

(One question mark shows the sentence is less natural.)

Voice morphology affects the number and linking of macroroles as we saw in the transitive and ditransitive constructions in Japanese. The inversion construction, however, is not coded morphologically on the verb. Therefore we can safely say that the macrorole value is intact in inversion sentences, which consequently guarantees the occurrence of double nominatives by following the case assignment rules.

There are a handful of predicates whose x argument as well as y argument must take

nominative case.

Tentative explanations for the contrast between (30) versus (25, 27) are as follows. Predicates of (25, 27) but not (30) allow the undergoer to be construed as being the pragmatic peak. Ability, possession, and necessity in (25, 27) are construed as being located at animate nominals. Locatives are cognitively the ground, rather than the figure. In perception predicates, such as *mieru* 'can see, be visible' and *kikoeru* 'can hear, or be audible', the percept figuratively moves from its origin to the perceiver (cf. fictive motion in Talmy 1995). The percept is the figure, and the end point or the perceiver, is the ground. The former is construed as the pragmatic peak. Such interpretation is not available for (30). The animate nominal x, rather than the locative y, is more likely to become the pragmatic peak according to the animacy hierarchy.

Wakaru 'understand' may take an adverbial 5-fun-de 'in five minutes' indicating [+telic].

(31) Taro-ni/-ga sono kotae-ga 5-fun de wakat -ta Taro-DAT/-NOM that answer-NOM 5-minutes in understand-PAST 'Taro understood the answer in five minutes.'

It shows that wakaru 'understand' in this sentence is an accomplishment and the LS for (31) is:

(31') BECOME **know'**(Taro, answer) DCA UND

Wakaru 'understand' in the next sentence is a state as it is evident from simple present. The non-

past form, i.e. -u ending verbs, denotes simple present if the predicate is state. Other verbs in non-past denote future in Japanese, e.g. *taberu* 'to eat or will eat'.

(32) Taro-ga/ni Furansugo-ga wakar -u.
Taro-NOM/DAT French-NOM understand-NPST
'Taro understands French.'
know'(Taro, French)

When wakaru is embedded in a causative phrase, the theme must be coded by accusative.

(33) Boku-wa Mary-ni kore-o /*-ga wakara -se -ru. (Kuno 1973: 139) I -TOP Mary-DAT this-ACC/*-NOM understand-CAUSE -NPST 'I will make Mary understand this.'

Kuno argues as follows:

'[W]akar 'to understand' is [+stative] and thus takes ga for making its object. When it is followed by the causative -(s)ase, however, the whole form wakar-(s)ase 'to make (someone) understand' becomes [-stative] because of the [-stative] feature of -(s)ase.

Thus ga cannot be used to mark the object or this derived form. (1973: 139)

In our account, case marking of (33) falls out naturally from its LS.

Kore 'this', the undergoer, takes accusative, whereas *Mary*, the non-macrorole core argument, takes dative as default.

Kuno cites another example which does not alter case marking even though the right most element is [-stative].

(34) John-wa nihongo-ga wakari hazime-ta. (ibid.143) John-TOP Japanese-NOM understand begin-PAST 'John began to understand Japanese.'

He argues that:

Affixes seem to influence the case marking of the object of the derived forms only when

they are bound forms (such as the causative -(s)ase)....*Hazime-ru* is an independent verb that means 'to begin' ...Since *hazime-ru* in itself implies an action, derived compound verbs are also [-stative]. However, it does not influence the case marking of the object of the verbs to which it is added. (ibid.142-143)

Kuno stipulates that bound morphemes influence case marking, while free morphemes do not. Matsumoto (1992) criticizes Kuno's stipulation and proposes that *wakara-seru* 'cause to understand' is a single predicate and therefore mono-clausal in f-structure (in LFG), while *wakari-hajimeru* 'begin to understand' is bi-clausal in f-structure. In a single predicate clause, the whole predicate namely non-stative *wakara-seru*, governs the object and assigns accusative. Whereas in a bi-clausal sentence, only the head, namely the stative *wakaru* 'understand' but not non-stative *hajimeru* 'to begin', governs the object and assigns nominative case. Contrary to Matsumoto's claim, it has been agreed in the literature that causative sentences are bi-clausal-like to some extent, while aspectual elements (i.e. a partial verb of a compound verb or a serial verb which indicates some aspectuality) are not usually considered to contribute to bi-clausal structures. In our account, the reason that *hazimeru* 'to begin' does not influence the case marking falls out naturally by referring to the LS. *Hazimeru* 'to begin' is not a predicate but an aspectual verb, thus it does not appear in the LS. The LS of (34) is [BECOME know'(John, Japanese)]. When *nihongo* 'Japanese' is chosen as the pragmatic peak, we get dative-

¹⁾ Note that BECOME is due to *wakaru* '(to become to) understand' in the same vein as in (31) but not due to *hajimeru* 'to begin or to start'. It is also worthy to point out that *hajimeru* 'to begin' is a transitive verb if it is used as a full verb, whereas it does not affect case marking when it is used as an aspectual operator.

a) Taro-ga benkyoo-o hajime-ta. (hajimeru as a transitive verb)
Taro-NOM study-ACC begin-PAST
'Taro started his study.'

b) Akanboo-ga naki-hajime-ta. (hajimeru as an aspectual operator)

nominative, when *John* is chosen as the pragmatic peak, we get nominative-nominative.

Potential predicates have three alternatives in case marking. (35c) is a new form gaining popularity among new generations.

- (35a) John-ni furansugo-ga hanas-e -ru
 John-DAT French- NOM speak-POTENTIAL -NPST
 DCA UND=peak
- (35b) John-ga furansugo-ga hanas-e -ru.

 John-NOM French-NOM speak-POTENTIAL -NPST

 DCA=peak UND
- (35c) John-ga furansugo-o hanas-e -ru.
 John-NOM French-ACC speak-POTENTIAL-NPST
 ACT=peak UND
 'John can speak French.'

Potential predicates in (35a) and (35b) are [+static]. However, case marking of (35c) indicates the predicate is [+activity]. The potential morpheme -e- is affecting the meaning of the whole sentence, namely making the whole sentence [+static]. Nevertheless, the morpheme does not affect case marking in (35c). Furthermore, even though the predicate in sentence (35c) must be an activity in terms of case marking, it is not compatible with a volitional or a progressive form which we expect to be compatible with activity predicates.

- (35c') *John-ga furansugo-o hanas-e te-i -ru.

 John-NOM French-ACC speak-POTENTIAL-L-PROG-NPST

 ACT=peak UND

 '*John is being able to speak French.'
- (35c") *John-ga furansugo-o hanas -e -yoo to si-ta.

 John-NOM French-ACC speak-POTENTIAL-VOLITIONAL COMP do-PAST

 '*John tried to be able to speak French.'

It suggests that there is an on-going transition from a stative to an activity.

2.4. Nominative-ni postposition construction

2.4.1. Motion verbs

Some examples of this class are: *iku* 'to go', *kuru* 'to come', *hairu* 'to enter', *noru* 'to get on, *atumaru* 'to congregate', *chikazuku* 'to come close', *kaeru* 'to return or to go back', *modoru* 'to return or to go back', *hiromaru* 'to disperse', *utsuru* 'to move to another place' (many of these examples are from Teramura 1982)

- (36a) Taro-ga heya ni/e hait-ta
 Taro-NOM room to/to enter-PAST
 'Taro entered the room.'
 do'(Taro, [move'(Taro)]) & [INGR be-in'(room, Taro)]
 ACT ACT OCA ACT
- (37) Taro-ga gakkoo ni/e it-ta.

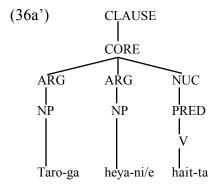
 Taro-NOM school to/to go-PAST

 'Taro went to school.'

 do' (Taro, [move.away.from.ref.point (Taro)] & [INGR be-at'(school, Taro)]

 ACT ACT OCA ACT

The highest argument and the lowest argument in the LS are identical, namely *Taro*, thus, there are two possibilities to assign a macrorole to this argument, either actor or undergoer. In such a case, the higher macrorole on the actor-undergoer hierarchy is chosen. Therefore, *Taro* is an actor and receives nominative case by the rule (15P) and by the rule (15A). The remaining *heya* 'room' is the oblique core argument in the same vein as a goal of ditransitive verbs. It is followed by a directional postposition *ni* which should be distinguished from dative *ni*. The layered structure is:



The verbs in this class have an alternative LS, for example, the verb *hairu* 'enter', when it is followed by *te-iru* form, manifests another LS as in (38a):

(38a) Taro-ga heya ni/e hait-te i-ru.

Taro-NOM room to/to enter-L-RSLT-NPST

'Taro has entered the room.' or 'Taro is in the room.' '* Taro is entering the room.'

INGR be-in'(room, Taro)

OCA UND

The morpheme -i-, otherwise glossed as progressive, is glossed as RSLT (resultative) in (38a). It denotes resulting state of an event but not the continuation of motion. When a verb is used in a sense of resultative meaning, it lacks internal temporal continuity. They are construed as perfective (i.e. achievement) and perfect. (cf. definition by Comrie 1976.) Thus (36b) allows the co-occurrence of a pace adverb but (38b) does not. The grammaticality of (36b) is attributed to an activity LS component. The sentence is an active-achievement. The ungrammaticality of (38b) is due to the lack of an activity component

- (36b) Taro-ga yukkuri heya ni/e hait-ta
 Taro-NOM slowly room to enter-PAST
 'Taro entered the room slowly.'
 do'(Taro, [move'(Taro)]) & [INGR be-in'(room, Taro)]
- (38b) * Taro-ga yukkuri heya ni hait -te -i -ru.

 Taro-NOM slowly room in enter -L-RSLT-NPST

 * 'Taro has slowly entered the room.'

 INGR be-in'(room, Taro)
- (38b) becomes acceptable when a speaker is reporting the activity on the spot. The speaker pays

more attention to the internal structure of the event rather than taking the event as a single whole (cf. Comrie 1976). In such an imperfective reading, the LS gains the activity component as in (36). Motion verbs in this section are traditionally categorized as punctual verbs. (cf. *shunkan-dooshi* 'i.e. punctual verb' in Kindaichi 1954). The claim is based on the fact that those verbs in *te-iru* 'linker-be' form denote the result state but not progression. This interpretation, however, should not be taken as an indication of punctuality, perfective or achievement of a verb per se. The interpretation of the result of an event becomes salient only when the *te-iru* form is used. In this case, the LS is constituted by a single achievement component. As long as a verb contains an achievement component, its *te-iru* form may denote the resulting state regardless of whether the verb is inherently an achievement (e.g. verbs of arriving in the next section). The verb may alternate between an achievement and an active-achievement as in motion verbs. To sum up, co-occurrence with a pace verb observed in (36b) on the one hand, is attributed to the activity component of the LS. The perfective interpretation of (38b) or indication of telicity, on the other hand, is attributed to the achievement component of the LS.

2.4.2. Verbs of arriving

Tsuku 'arrive', tassuru 'reach', and todoku 'reach' do not denote motion, at least syntactically. Such verbs are inherently perfective or achievement because they do not allow a durational expression as in (39b), a pace adverb as in (39c), nor mean progression or continuation of an action in the te-iru 'linker-be' form as in (39d). -Te-iru form denotes the result state of a telic event.

(39a) Taro-ga mise ni/e tsui-ta.

Taro-NOM store to/to arrive-PAST

'Taro arrived at the store.'

INGR be-at'(store, Taro)

OCA UND

- (39b) * Taro-ga mise ni iti-jikan tsui-ta. one-hour
 - * 'Taro arrived at the store for one hour.'
- (39c) * Taro ga mise ni yukkuri tsui-ta. slowly
 - * 'Taro arrived at the store slowly.'
- (39d) Taro ga mise ni ui -te-i -ru.
 -L-RSLT-NPST
 'Taro has arrived at the store.' * 'Taro is arriving at the store (now).'

The macrorole NP receives nominative case. The goal is marked by the postposition *ni* 'to' but not dative *ni*, as indicated by the fact that it is interchangeable with a directional postposition *e* 'to'.

2.5. Possessor raising (double nominative) construction

Possessive is coded by the genitive.

(40a) Mary-no me-ga aoi Mary-GEN eye-NOM blue 'Mary's EYES are blue.' (Speaker's attention is on eyes as parts of Mary.)

If the possessor is 'raised', the sentence 'becomes' a double nominative construction.

(40b) Mary-ga me-ga aoi
Mary-NOM eye-NOM blue
'MARY's eyes are blue.' (Speaker's attention is on Mary as a whole.)

The adjective *aoi* '(be) blue' is a one-place predicate, however, the sentence has two nominative nominals. This construction was called multi-subject construction by Kuno (1973). The syntactic status of two 'subjects' has been a challenge to many syntactic theories. Kuno (1973:68-71) and Tateishi (1994:179-207) from the perspective of Generative Grammar allow multiple 'subject' assignments. Other theories, such as Lexical Functional Grammar, Relational Grammar and

RRG, do not allow 'multiple subjects'. Relational Grammar has analyzed 'multiple objects' construction in Korean as follows. Two constructions (i.e. "double-subject" construction and "double-object" construction) are parallel because both involve possessor raising.

- (41a) Kay-ka haksyang-uy tali-lul mwul-ess-ta. (Chun 1986: 72 via O'Grady1991: 67) dog-NOM student-GEN leg-ACC bite-PAST-IND 'The dog bit the student's leg.'
- (41b) Kay-ka haksyang-ultali-lul mwul-ess-ta. (O'Grady1991: 71) dog-NOM student-ACC leg-ACC bite-PAST-IND

 2 chômeur

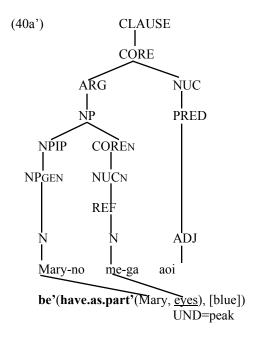
 'The dog bit the student on the leg.'

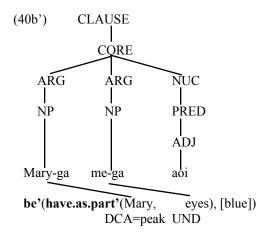
In Relational Grammar, the ascended possessor is an argument and the remaining possesee nominal is a chômeur. (cf. Gerdts 1987, Chun1986, Perlmutter and Postal 1983). This analysis was supported by the facts that only the raised possessor but not the remaining possessee nominal may undergo *hi*-passivization (Korean has another passive which does not work for this construction), plain topicalization, and clefting in Korean. This approach, however, does not provide an explanation for the case marking. The fact that the remaining possessee is still marked by accusative is an open question.

Nakamura (1997) posits that both the raised possessor and the remaining possessee share the same macrorole value. He extends this notion of sharing to non-macrorole arguments to account for instances such as case spreading among adjuncts. He argues that the same case is shared by the raised possessor and the remaining possessee because they share the same semantic value. His claim is based on the observation that a possessee as well as a possessor may launch QF. He assumes this fact indicates two nominals are identical in terms of macrorole value. This approach, however, ignores all other syntactic asymmetries between the raised possessor and the remaining possessee investigated in Relational Grammar. Another problem seems to be the notion of entailment which he supposes to be true of all the instances of whole-part relation. For

example, in (41), the fact that a dog bit the student's leg entails that the dog bit the student. In his theory, this entailment guarantees the sharing of the same semantic value. However, whole-part relation does not necessarily evoke entailment. In (40), the fact that 'Mary's eyes are blue' does not entail 'Mary is blue.'

I propose an analysis of possessor raising construction as follows:





In (40a'), the underlined part of the LS indicates a head. The modifier *Mary* is linked to NP initial position in the layered structure and appears in the genitive (cf. VV & LP: 61). The undergoer is assigned to the lowest core argument in the LS by default, namely *me* 'eyes'. [*Mary*

no me] 'Mary's eyes' is a single NP. Nominative case is assigned to [Mary no me]. In (40b'), both Mary and me 'eyes' are NP arguments as the result of possessor-raising, in spite of the fact that aoi 'blue' is a one-place predicate. An element, for instance, an adverb modifying the predicate, may be inserted between the two arguments in (40b), while it is not the case in (40a).

- (40a") *Mary-no totemo me-ga aoi Mary-GEN really eye-NOM blue
- (40b") Mary-ga totemo me-ga aoi Mary-NOM really eye-NOM blue 'Mary's eyes are really blue.'

The undergoer is assigned to the lowest semantic argument *me. Mary* is the pragmatic peak.

Mary receives nominative case by the case assignment rule (15P). The undergoer Mary receives nominative case by the rule (15A). The shift of the pragmatic peak reflects foregrounding of Mary. The speaker's attention changes from the body part me 'eyes' to Mary as a whole.

Figuratively, the sight of the speaker zooms in on Mary's eyes in (40a), while the sight zooms out and now is on Mary as a whole in (40b). In the Korean examples, I hypothesize that possessor raising is the foregrounding of the possessor, whereas the passivization and clefting of the possessed is the foregrounding of the possessed. The two operations on the same clause are not valid together since they contradict each other.

A constraint called 'double-o constraint' blocks possessor raising from the accusative host in Japanese. The double-o constraint says that a clause may not have more than one nominal coded by accusative (Harada 1973). This constraint may be evaded if accusative is replaced by other particles. (cf. Kuno 1983:218)

- (42a) John-ga Tom-no kao-o nagut-ta John-NOM Tom-GEN face-ACC hit-PAST 'John hit Tom's face.'
- (42b) * John-ga Tom-o kao-o nagut-ta

John-NOM Tom-ACC face-ACC hit-PAST 'John hit Tom on his face.'

(43) John-ga Tom-o atama-**mo** kao-**mo** nagut-ta. (modified from Kuno:1983: 218) John-NOM Tom-ACC head-too face-too hit-PAST 'John hit Tom both on the head and on the face.'

2.6. Causative Construction

In the rest of the sections in this chapter, I will investigate causative and indirect passive constructions, whose LSs are complex. In the last section, I will investigate the possessor raising passive construction which is often confused with the indirect passive. I will point out that the construction is actually a kind of direct passive in terms of LSs and case marking. This view will be further supported by some observations in the next chapter.

The causative suffix -(s)ase- has been called jodoosi 'auxiliary verb' in traditional Japanese grammar.

- (44) Hanako-ga Taro-ni hon-o yon-de-simaw -ase -ta Hanako-NOM Taro-DAT book-ACC read-L-complete- CAUS-PAST 'Hanako made/let Taro finish reading the book.' [do'(Hanako, Ø)] CAUSE [do'(Taro[read'(Taro, book)])] ACT DCA UND
- (45a) Hanako-ga Taro-o utaw-ase -ta.

 Hanako-NOM Taro -ACC sing-CAUS-PAST

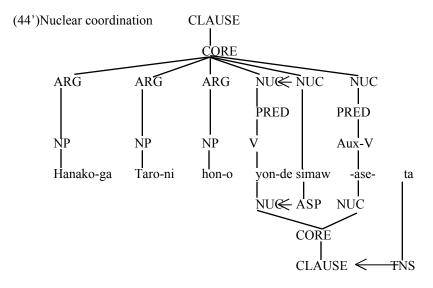
 'Hanako made Taro sing.'

 [do'(Hanako, Ø)] CAUSE [do'(Taro[sing'(Taro)])]

 ACT UND
- (45b) Hanako-ga Taro-ni utaw-ase -ta.
 Hanako-NOM Taro-DAT sing-CAUS-PAST
 'Hanako let Taro sing.'
 [do'(Hanako, Ø)] CAUSE [do'(Taro[sing'(Taro)])]

 ACT DCA
- (46) Hanako-wa kodomotachi-ni yoru osoku made oki -te- i- sase- ta. Hanako-TOP children -DAT night late until stay.up-L- PROG-CAUSE-PAST 'Hanako let the children stay up late.'

The layered structure of (44) is:



-(s)ase- is a nucleus which must be cliticized to the stem (with an aspect marker subordinated to it). It affects the LS of the verb stem by increasing the number of arguments by one. It indicates that the nexus between the causative morpheme and the verb is either coordination or cosubordination. The example (44) shows that the stem and -(s)ase- may be separated by an aspectual element simau modifying only the verb stem independently. Therefore, the nexus is coordination. The level of juncture is nuclear because no syntactic argument may intervene between the two nuclei. Simau 'to complete' which follows the te linker is a verb but it does not determine nor affect the number of arguments, therefore the nexus type between yomu 'read' and simau 'to complete' is subordination. Simau 'to complete' functions as an operator at the same time, thus it is double duty. (See Hasegawa (1996) for an RRG analysis of te-simau construction.)

In (44) with a transitive verb, the actor is assigned nominative case by the rule (15A), and also by (15P) as an actor is the default choice for the pragmatic peak. The undergoer receives accusative by the rule (15B). The remaining non-macrorole core argument receives dative. In the coercive causative (45a), *Taro* is the undergoer receiving accusative by the rule (15B), whereas

in the permissive causative (45b), *Taro* is the non-macrorole core argument receiving dative by the rule (15C). (45b) shows a marked linking between semantics and syntax. The lowest semantic argument is not assigned undergoer. An undergoer argument is a more patient-like argument than a non-macrorole core argument. Choosing a non-macrorole argument over an undergoer argument denotes the argument in question as less patient-like. The similar semantic difference is observed in Korean. (Kozinsky and Polinsky (1993:202), Choi (1983) (cited in Gerdts (1990:221), and Yang(1994).) In Korean, a causee may be coded by either nominative, dative, or accusative case. It is claimed that the nominative-coded causee has the most control, a dative-coded causee has less control, and the accusative-coded causee has no control over the situation. The alternative case assignment in the causative constructions in other languages are summarized in VV & LP (section 9.2.2.)

Alternative assignment of undergoer in causative constructions is available only when the verb is intransitive in Japanese. The double-*o* constraint blocks accusative coding of the causee in a sentence of a transitive verb.

(47) Hahaoya-ga kodomo-ni/*-o hon-o yom-ase-ta. mother-NOM child-DAT/*-ACC book-ACC read-CAUS-PAST 'The mother made/had/let the child read the book.'

In such a sentence, the semantic difference between coercive causation and permission is neutralized.

2.7. Passive construction

2.7.0. Introduction

Passive constructions are divided into two types, direct passive and indirect passive. The indirect passive construction, which is rare cross-linguistically, has case making and syntactic

properties which require special considerations.

We have already seen direct passive constructions. The examples are repeated as (48a) and (49a) below.

- (48a) Taro-ga Hanako ni tatak-are-ta.

 Taro-NOM Hanako by hit-PASS-PAST

 'Taro was hit by Hanako.'
- (49a) Kodomo-ga Taro ni hon-o atae-rare-ta . child -NOM Taro by book-ACC give-PASS-PAST 'The child was given the book by Taro.'

Direct passive sentences have active counterparts. The examples (48b) and (49b) are the active counterparts of (48a) and (49a) respectively.

- (48b) Hanako-ga Taro-o tatai-ta. Hanako-NOM Taro-ACC hit-PAST 'Hanako hit Taro.'
- (49b) Taro-ga kodomo-ni hon-o atae-ta Taro-NOM child-DAT book-ACC give-PAST 'Taro gave a book to the child.'

Indirect passives may be formed from an intransitive verb as in (50a), from a transitive verb as in (51a), or from a ditransitive verb as in (52a). Contrary to direct passives, indirect passives lack active counterparts.

- (50a) Hanako-ga Taro-ni sin-are-ta. Hanako-NOM Taro-DAT die-PASS-PAST '(lit.)Hanako was died by Taro.' or 'Taro died on Hanako.'
- (50b) * Taro-ga Hanako-o sin-da. Taro-NOM Hanako-ACC die-past
- (51a) Hanako-ga Taro-ni uta-o utaw-are-ta. Hanako-NOM Taro-DAT song-ACC sing-PASS-PAST 'Hanako was affected by Taro's singing a song.'
- (51b) * Taro-ga Hanako-o uta-o utat-ta.

 Taro-NOM Hanako-ACC song-ACC sing-past

- (52a) Hanako-ga kodomo-ni tomodachi-o takusan paatii-ni/e shootai-s-are-ta. Hanako-NOM child-DAT friends-ACC many party-to/to invite-do-PASS-PAST 'Hanako was affected by her child inviting many of her friends to the party.'
- (52b) * Kodomo-ga Hanako-o tomodachi-o takusan paatii-ni/e shootai-si-ta. child -NOM Hanako-ACC friends-ACC many party-to/to invite-do-PAST

The indirect passive construction is also called the adversative passive (Howard 1968), the adversity passive (Kuno 1973), or the affective passive (N. McCawley 1972) because of the semantics. The sentences denote that the 'subject' is adversely affected. A construction with *on*, with limited verbs in English, may express the similar adversity as in the translation of (50a). In such a sentence, the affected experiencer appears as an argument-adjunct, in an *on* prepositional phrase.

(53) The horse died on John.

AAJ

Some researchers have argued that some indirect passives do not denote adversity. (Wierzbicka 1979, Kuno 1983.) However, a closer look reveals that all the examples of non-adversative reading, except one example, that is (57a), which we will see shortly, are what I call possessor-raising passives. Such sentences have active counterparts, therefore they are actually direct passives. (54a), (55a), (56a) are examples of possessor-raising passive and (54b), (55b), and (56b) are their active counterparts.

- (54a) Hanako-ga (Taro ni) kata -o dak- are -ta. Hanako-NOM (Taro by) shoulder-ACC hold -PASS-PAST 'Hanako had Taro's arm around her shoulders.'
- (54b) Taro-ga Hanako-no kata -o dai -ta. Taro-NOM Hanako-GEN shoulder-ACC hold-PAST 'Taro put his arm around Hanako's shoulders.'
- (55a) Taro-ga (Hanako ni) asi- o fum- are-ta.

 Taro-NOM (Hanako by) foot-ACC step.on PASS-PAST 'Taro had (his) foot stepped on (by Hanako).'

- (55b) Hanako-ga Taro-no asi- o fum- da. Hanako-NOM Taro-GEN foot-ACC step.on PAST 'Hanako stepped on Taro's foot.'
- (56a) Seito-ga (sensei ni) sakubun-o home -rare-ta. student-NOM (teacher by) composition-ACC compliment-PASS-PAST 'The student was complimented on his composition (by his teacher).'
- (56b) Sensei-ga seito-no sakubun-o home -ta. teacher-NOM student GEN composition-ACC compliment-PAST 'The teacher complimented the student on his composition.'

Shibatani 1990 claimed that passive sentences with a body-part like object such as (54a) and (55a) are not indirect passives against other authors. I agree with him and will argue in the last section that not only passive sentences with a body-part object, but all possessor raising passive sentences including sentences such as (56a), are direct passives. He also claims that the only one remaining problematic example with the verb *huku* 'blow' as in (57a) is actually a direct passive sentence, even though there is no active counterpart.

- (57a) Konoha-ga kaze ni huk-are -te tit -ta. tree.leaf -NOM wind by blow-PASS-CONJ scatter-PAST 'Leaves scattered, being blow (away) by the wind.'
- (57b) * Kaze-ga konoha-o huk-u. wind-NOM tree.leaf-acc blow-NPST '(int.) The wind blows (away) a leaf.'

The problem of *huku* 'blow' is due to the accidental lack of an overt transitive counterpart, which has mislead many to claim that there is an intransitive, and hence, indirect passive that lacks the adversative reading. ... certain (direct) passives lack corresponding well formed active sentences, though the positing of the

corresponding active forms or of a basic <u>argument structure underlying them must</u>

<u>be recognized</u>. The casef *huku* is exactly of this kind, and together these cases require

us to think deeply the nature of argument structures associated with individual verbs.

(Shibatani 1990: 332. emphases added)

Accordingly, passive sentences with neutral (i.e. non-adversative) reading are direct passives. Of course, it does not deny that direct passives may denote adversity. If a direct passive denotes adversity (e.g. (55a)), it is because of the semantics of the predicate, whereas adversity is structurally coded in indirect passives.

2.7.1. Direct passive (revised)

With the revised case assignment rules (15), direct passive sentences of transitive verbs are accounted for as follows (We have already seen ditransitive passive sentences in terms of rules (15) in section 2.2.):

An example is (2) (repeated as (58) below).

(58) Taro-ga Hanako ni tatak-are-ta.

Taro-NOM Hanako by hit-PASS-PAST
'Taro was hit by Hanako.'

do'(Hanako, [hit'(Hanako, Taro)])

ACT--->Adjunct UND=peak

The undergoer *Taro* must be the pragmatic peak since there is no other core argument in the sentence. According to the rules (15) with the notion of pragmatic peak, *Taro* takes nominative by the rule (15P). The rule (15A) fails to apply to *Hanako* since it is not a core argument.

2.7.2. Indirect passive

As we saw above, the adversative meaning is inherent in true indirect passive sentences. I indicate it as **feel-affected'** in the LS. The sign in the LSs indicates simultaneous states of affairs.

(59a) Hanako-ga Taro-ni sin-are-ta. Hanako-NOM Taro-DAT die-PASS-PAST

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'(lit.) Hanako was died by Taro.' or 'Taro died on Hanako.' [INGR be-dead'(Taro)])] [feel-affected'(Hanako)]
```

(60a) Hanako-ga Taro-ni uta-o utaw-are-ta.

Hanako-NOM Taro-DAT song-ACC sing-PASS-PAST

'Hanako was affected by Taro's singing a song.'

[do'(Taro, [sing'(Taro, song)])] [feel-affected'(Hanako)]

Both direct passives and indirect passives 'demote' an argument. Shibatani (1990) argues that indirect passives do not share the universal 'agent-defocusing' property of passivization. 'Agent-defocusing' refers to the property that passivization demotes the agent to an adjunct or syntactically deletes it from a clause. It is true that indirect passivization does not demote the agent to an adjunct status, however, it does 'demote' the 'subject' to the dative coded 'non-subject' (as we see presently). In this broad sense, the indirect passive construction deserves to be called 'passive'.

Indirect passives differ from direct passives regarding a 'demoted' argument in very important respects. First, what is demoted is restricted to the actor in direct passive, whereas, the undergoer as well as the actor may be 'demoted' in indirect passives. Second, in direct passives, the actor is 'demoted' to an adjunct status, and consequently it can be deleted, whereas, in indirect passives, the demoted highest macrorole must be kept in a clause (unless it is understood as a *pro* whose identity is provided contextually. (Shibatani 1990:325-326)

- (61) John-ga tatak-are-ta.

 John-NOM hit-PASS-PAST

 'John was hit.'
- (62) * John-ga sin-are-ta.

 John-NOM die-PASS-PAST

 '(Someone) died on John.'

Accordingly, the highest macrorole is 'demoted' to a direct core argument status coded by dative but not to an adjunct status. (The syntactic properties of the direct core argument will be

discussed further in the next chapter.) Thus, it may be stated as follows:

(63) The highest macrorole of the basic sentence is 'demoted' to non-macrorole direct core argument status.

The indirect passive construction is parallel to the causative construction in some respects.

The causer is added to the corresponding non-causative sentence. Analogously, the affected experiencer is added to the corresponding non-passive sentence in indirect passives.

- (59b) Taro-ga sin-da.
 Taro-NOM die-PAST
 'Taro died.'
 INGR **be-dead'**(Taro)
 UND=peak
- (59c) Hanako-ga Taro-o sin-ase-ta. (Causative)
 Hanako-NOM Taro-ACC-CAUS-PAST
 'Hanako had Taro died.'

 do'(Hanako, Ø) CAUSE [INGR be-dead'(Taro)])

 ACT=peak
 UND
- (59a) Hanako-ga Taro-ni sin-are-ta. (Indirect Passive)
 Hanako-NOM Taro-DAT die-PASS-PAST

 '(lit.) Hanako was died by Taro.' or 'Taro died on Hanako.'

 [INGR be-dead'(Taro)])] [feel-affected'(Hanako)]

 DCA DCA=peak
- (60b) Taro-ga uta-o utat-ta.
 Taro-NOM song-ACC sing-PAST
 'Taro sang a song.'
 [do'(Taro, [sing'(Taro, song)])
 ACT=peak UND
- (60c) Hanako-ga Taro-ni uta-o utaw-ase-ta. (Causative)
 Hanako-NOM Taro-DAT song-ACC sing-CAUS-PAST
 'Hanako had Taro sing a song.'
 do'(Hanako, Ø) CAUSE [do'(Taro, [sing'(Taro, song)])]

 ACT ACT--->DCA UND
- (60a) Hanako-ga Taro-ni uta-o utaw-are-ta. (Indirect Passive)
 Hanako-NOM Taro-DAT song-ACC sing-PASS-PAST
 'Hanako was affected by Taro's singing a song.'

 [do'(Taro, [sing'(Taro, song)])] [feel-affected'(Hanako)]

ACT--->DCA UND DCA=peak

In both causative and indirect constructions, the number of arguments increases by one. The number of macroroles, on the other hand, is reduced by one in indirect passives. Note that corresponding sentences for causative and indirect passive sentences are not 'counterparts' which share the same LS as in active sentences and their direct passive versions. The indirect passive construction is different from the causative construction in the sense that what is added is assigned a macrorole in causatives but it is a non-macrorole direct core argument in indirect passives. The following proposal regarding the 'added' argument is required in indirect passive constructions.

(64) Non-macrorole status assignment in indirect passives.

The lowest semantic argument in the LS (i.e. the affected participant) is assigned a non-macrorole direct core argument status.

This has an important consequence for accusative case marking in sentences with a transitive verb such as in (60a). *Taro*, the 'demoted' argument can not be the pragmatic peak, since demotion is the operation used to make an argument pragmatically less salient. Instead, the 'added' experiencer is more likely to be the pragmatic peak. The animate *Hanako* is more likely to be the pragmatic peak than inanimate *uta* 'song' is. The pragmatic peak *Hanako* gets nominative case from the rule (15P). (63) says that *Taro* is 'demoted' from actor status. Therefore by (16) repeated below, the undergoer *uta* 'song' is considered to be the lower macrorole.

(16) Nature of macrorole ranking

A 'demoted' macrorole is respected in terms of macrorole ranking (even if it is not assigned case).

The lower macrorole *uta* 'song' receives accusative by the rule (15B). The remaining non-macrorole direct core argument receives dative by the rule (15C). If we did not have (64) and assigned the undergoer to the lowest argument *Hanako*, then *uta* 'song' would be assigned DCA. In that case, we cannot account for the fact that *uta* 'song' is marked by accusative rather than dative.

Case assignment for sentences with an intransitive verb is exemplified with (59a) repeated below.

```
(59a) Hanako-ga Taro-ni sin-are-ta.

Hanako-NOM Taro-DAT die-PASS-PAST

'(lit.) Hanako was died by Taro.' or 'Taro died on Hanako.'

[INGR be-dead'(Taro)]) [feel-affected'(Hanako)]

UND--->DCA DCA=peak
```

The pragmatic peak takes nominative case by the rule (15P). The non-macrorole direct core argument takes dative by the rule (15C).

Sugioka (1984 via Miyagawa 1989: 186) observes that *te-i-*, an aspect marker, may intervene between a verb and a passive morpheme in the indirect passive construction as in (65), whereas it is not the case in the direct passive construction as in (66a).

- (65) Taro-ga Hanako-ni (yodoosi) oki- te-i -rare -ta.

 Taro-NOM Hanako -DAT (all.night) stay.up L-PROG-PASS-PAST

 'Taro was affected by Hanako's staying up (all night).'

 (modified from Sugioka 1984 via Miyagawa 1989: 181)

 [do'(Hanako,[stay-up'(Hanako)] [feel-affected'(Taro)]

 ACT--->DCA

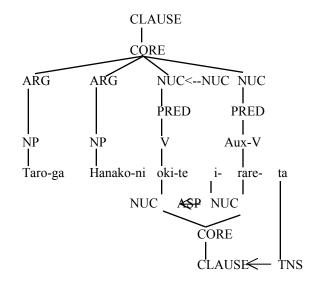
 DCA=peak
- (66a) * Taro-ga Hanako ni tatai-te-i -rare -ta.

 Taro-NOM Hanako by hit-L-PROG-PASS-PAST
 '(int.) Taro was being beaten by Hanako.'
- cf. (66b)Taro-ga Hanako ni tatak-are-te-i -ta.

 Taro-NOM Hanako by hit-PASS-L-PROG-PAST
 'Taro was being beaten by Hanako.'

The layered structure of (65) is:

(65') Nuclear coordination



Note that the aspect maker -i-, which is a state verb in origin, is subordinated to the verb stem *oki* 'stay up' (cf. Hasegawa (1996)'s example cited as (14') in Chapter One). Since the passive morpheme -(r)are- can be separated from the verb stem by an aspectual element and the aspectual element can modify only the verb stem, the nexus of the verb stem and -(r)are- is coordination. This is again shared with causatives but not with direct passives . -(r)are- affects the number of semantic arguments. Therefore, I consider -(r)are- itself to be an independent nucleus.

2.7.3. Possessor-raising passive

If a possessor is raised from (67a), the sentence would be like (67b) in principle. However, the sentence is ungrammatical because of the double-*o* constraint. (It is well known that Korean and some other languages allow double accusative constructions. One of the Japanese dialects, spoken in the *Hachijoojima* island, also has double accusative constructions. (Kaneda 1993.)

(67a) Hanako-ga Taro-no asi- o fum- da. Hanako-NOM Taro-GEN foot-ACCstep.on PAST 'Hanako stepped on Taro's foot.' (67b) * Hanako-ga Taro-o asi- o fum- da. Hanako-NOM Taro-ACC foot-ACCstep.on PAST 'Hanako stepped on Taro's foot.'

The constraint is evaded in the passive version.

(67c) Taro-ga (Hanako ni) asi- o fum- are-ta.

Taro-NOM (Hanako by) foot-ACC step.on PASS-PAST 'Taro had (his) foot stepped on (by Hanako).'

The possessor-raising passive construction is one of the direct passive constructions for the following reasons. First, the passive morpheme does not affect the number of semantic arguments of the LS, in other words, the passive morpheme does not increase the number of semantic arguments of the clause. Second, there exists an active counterpart sentence linked to the same LS (which is not the case for indirect passive). For instance, both active (67a) and its passive counterpart (67c) share the same LS (67'), except that *asi* 'foot' is the head in (67a), while both *Taro* and *asi* 'foot' are arguments in (67c).

(67') do'(Hanako [step-on'(Hanako, [have.as.part'(Taro, foot)])])

Another example of possessor-raising passives is (68c), which shares its LS with the active counterpart (68a) and another passive form (68b).

- (68a) Sensei-ga Taro-no ronbun-o hihan-si-ta.
 teacher-NOM Taro-GEN thesis-ACC criticism-do-PAST
 'The teacher criticized Taro's thesis.'
 do'(teacher [criticize'(teacher, [have'(Taro, thesis)])])
 ACT=peak
 UND
- (68b) Taro-no ronbun-ga (sensei ni) hihan-s-are-ta.
 Taro-GEN thesis-NOM (teacher by) criticism-do-PASS-PAST
 'Taro's thesis was criticized by the teacher.'
 do'(teacher [criticize'(teacher, [have'(Taro, thesis)])])
 ACT--->adjunct UND=peak
- (68c) Taro-ga (sensei ni) ronbun-o hihan -s -are-ta.

 Taro-NOM (teacher by) thesis-ACC criticism-do-PASS-PAST

 'Taro was criticized on his thesis (by the teacher).'

do'(teacher [**criticize'**(teacher [**have'**(Taro, thesis)])])

ACT--->adjunct DCA=peak UND

The difference among these sentences lies in the linking of macroroles, syntactic argument status, and the pragmatic peak. In terms of syntactic arguments, direct passives reduce their number by one as the actor is 'demoted' to an adjunct status or unspecified. A possessor-raising passive sentence reduces a syntactic argument through passivization. However, a possessor-raising passive sentence increases its syntactic argument through possessor-raising, by assigning 'argument' status to both the possessor and the possessed. Note that as far as semantic arguments are concerned, there is no change among LSs of (68a), (68b), and (68c). The difference among those is the status of syntactic arguments.

In non-possessor-raising (68b), *Taro* cannot be the pragmatic peak since it is not a core argument. In possessor-raising (68c), both *Taro* and *ronbun* 'thesis' are arguments, therefore *Taro* is a core argument. *Taro* is most likely to be the pragmatic peak since it is higher than *ronbun* 'thesis' in terms of argument hierarchy and in terms of the animacy hierarchy. In (68c), the case assignment rule (15P) assigns nominative case to the pragmatic peak *Taro*, the undergoer *ronbun* 'thesis' receives accusative by the rule (15B). Note that the undergoer is lower than the actor-adjunct in terms of the macrorole ranking since the actor-adjunct is respected by the nature defined in (16).

The third reason to consider possessor-raising passives to be direct passives is the fact that NP-*ni* is 'demoted' to an adjunct status (i.e. to the periphery). It does not receive dative case as it does in the indirect passive construction as seen in the previous section. This point will be discussed in the next chapter. Fourth, Miyagawa (1989: 187) observes that aspectual elements cannot intervene between a verb stem and a passive morpheme in this construction. (67a,b) are adapted from Miyagawa. (In his analysis, *sensei-ni* is dative contrary to the present analysis)

- (67a) Taro-ga sensei ni ronbun-o hihan -s -are-te -i -ru. Taro-NOM teacher by thesis-ACC criticism-do-PASS-L -PROG-NPST
- (67b) * Taro-ga sensei ni ronbun-o hihan -si-te -i -rare-ru.

 Taro-NOM teacher by thesis-ACC criticism-do-L-PROG-PASS-NPST
 'Taro is being criticized on his thesis by the teacher.'

Indirect passives allow an aspectual element to intervene between a verb stem and a passive morpheme, whereas possessor-raising passives do not. The ungrammaticality of (67b) is parallel to that of a typical direct passive (68b).

- (68a) Kodomo-wa Hanako ni sikar-are -te-i -ta. child -TOP Hanako by scold-PASS-L-PROG-PAST
- (68b) * Kodomo-wa Hanako ni sikat-te-i -rare -ta. scold-L-PROG -PASS -PAST 'The child was being scolded by Hanako,'

The layered structure of (68c) (repeated below) is (68c').

(68c) Taro-ga sensei ni ronbun-o hihan -s -are-ta.

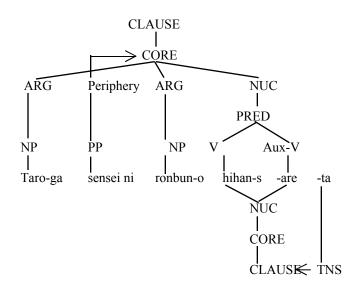
Taro-NOM teacher by thesis-ACC criticism-do-PASS-PAST

'Taro was criticized on his thesis by the teacher.'

do'(teacher [criticize'(teacher [have'(Taro, thesis)])])

ACT--->adjunct DCA=peak UND

(68c')



Chapter 3

Syntactic Characteristics

3.0. Introduction

In this last chapter, I will discuss the conditions on three syntactic constructions, 'subject'-honorification, *zibun* reflexive, and *-nagara* 'while'. The investigation will reveal that the constraints on these constructions should be defined in terms of the LSs rather than in terms of grammatical relations.

3.1. Controllers of the 'subject'-honorific predicate

When a person denoted by the 'subject' is socially superior to the speaker, the predicate may undergo 'subject'-honorification by means of *o-Verb Infinitive-ni nar-*, *o-Adjective*, *o-Noun-copula*, and suppletions such as *goran ni naru* 'honorific of see' for *miru* 'see'. (Harada 1976, Shibatani 1978 among others). Causative constructions show that both the 'surface subject' and the 'logical subject' (or embedded subject) may control the predicate undergoing 'subject'-honorification.

- (1) Tanaka sensei-ga Taro-ni hurui rekoodo-o o-kik -ase ni nat -ta. Tanaka teacher-NOM Taro-DATold record -ACC H-listen-CAUS become -PAST 'Prof. Tanaka had Taro listen to the old record.'

 (The Italicized NP indicates the controller of the honorific predicate)

 [do' (Prof. Tanaka, Ø)] CAUSE [do'[(Taro, [listen'(Taro, old record)])]]

 (Parts of the LS irrelevant to discussion are omitted)
- (2) Syukutyoku-no yoomuin-ga *kootyoo-sensei-ni* yoomuin-situ de sibaraku night.duty-GEN janitor-NOM principal-teacher-DAT night.duty.room in a.little **o**-yasumi **ni nar** -ase -te sasiage-ta
 H-rest become -CAUS-L- give -PAST (Manning, Sag, and Iida 1997:5)

 'The janitor on night duty let the principal take a rest in the night duty room for a little while.'

 [do'(janitor, Ø)] CAUSE [do'[(principal, [rest'(principal)])]]

Honorification of the causee in (2) requires contextual support because it is uncommon for a

causer who is inferior to the causee to give a command or permission to his/her superior causee. Nevertheless, (2) indicates the causee may be picked out as an honored person. Note also the position of *-ni nat-*. When it appears after the causative morpheme *-(s)ase-* as in (1), the honorific predicate has wider scope including the causer, but when *-ni nat-* appears before *-(s)ase-* as in (2), the honorific predicate has a narrow scope excluding the causer. I will demonstrate that controllers of honorific predicates are defined by an interaction between Logical Structures (i.e. semantics), the argument vs. adjunct distinction (i.e. syntax), and pragmatic factors, but not by 'subject' in a traditional sense. I will, however, continue to use the term 'subject-honorification' for the sake of convenience.

Each LS consists of two sub-components. Each component corresponds to a nucleus. In (1), for example, $[\mathbf{do'}(x, \emptyset)]$ CAUSE (x is realized as *Prof. Tanaka*) corresponds to one nuclear predicate, namely the causative morpheme -(s)ase- and the other component $\mathbf{do'}[(y, [\mathbf{listen'}(y, z)])]$ (y is realized as Taro) corresponds to the other nuclear predicate, namely the verb kiku 'to listen to'. Therefore, we may propose that a subject-honorific predicate is controlled by the first argument of each LS component corresponding to each nucleus. If we call the LS component corresponding to a nucleus 'nuclear LS', then we may formalize it as follows:

- (3) Condition on controllers of the 'subject'-honorific predicate. (Preliminary version)
 - (a) The highest argument of each nuclear LS controls the subject-honorific predicate.
 - (b) Pragmatic condition: The controller must be honored.
 - (c) Condition on scope: The position of the honorific predicate determines the scope of the potential controller.

We may indicate nuclear LS by { } as follows:

(1') {[do'(Prof.Tanaka, Ø)] CAUSE } {do'[(Taro, [listen' (Taro, old record)])]}

(2') {[do'(janitor, Ø)] CAUSE} {do' [(principal, [rest'(principal)])]}

The unacceptability of the next sentence with a ditransitive verb supports (3).

(4) * Yoomuin-ga kootyoo-sensei-ni kusuri- o o-watasi ni nat -ta. janitor-NOM principal-teachyer-DAT medicine-ACC H-hand.over become -PAST The janitor gave the medicine to the principal.'

{[do'(janitor,[hand.over'(janitor, principal)]] CAUSE [[BECOME have'(principal, medicine)]}

The sentence would be acceptable if the *yoomuin* 'janitor' were called *yoomuin-san* by adding the *-san* suffix, denoting the speaker's politeness. The absence of this suffix excludes *yoomuin* from the set of potential controllers of the honorification. *Kootyoo-sensei* 'principal' cannot control the honorification either because it is not the highest argument. The LS shows *yoomuin* 'janitor' is the highest argument of the nuclear LS. There is only one nucleus for the whole clause of a ditransive verb.

Let us look at direct passive sentences, to see if (3) can handle them as well.

- (5) * John-wa senseini ni o-tasuke-rare ni nat -ta. (Matsumoto 1992: 32)

 John-TOP teacher by H-help -PASS become -PAST

 '(int.)John was saved by the teacher.'

 {[do'(teacher, Ø)] CAUSE [BECOME saved'(John)]}
- (6) Sensei-wa John ni o-tasuke-rare ni nat -ta. (ibid.32) teacher-TOP John by H-help-PASS become -PAST 'The teacher was saved by John.' {[do'(John, Ø)] CAUSE [BECOME saved'(teacher)]}
- (7) * John-wa *senseii ni* o-tasuke ni nar -are -ta.
 John-TOP teacher by H-help become-PASS-PAST
 '(int.)John was saved by the teacher.'
 {[do'(teacher, Ø)] CAUSE [BECOME saved'(John)]}

In direct passives the NP followed by *ni* 'by' is an adjunct, not a syntactic core argument. Example (5) shows that the adjunct *sensei* 'teacher' cannot control the honorific predicate; accordingly, (3a) must be modified. One might argue that unacceptability of (5) is due to the scope of honorification. However, in (7) *-ni nar-* precedes *-are-*, which indicates that the scope

of the honorific predicate is narrowed, that is, *John* is excluded from the scope, and the only potential controller is *sensei* 'teacher'. Even in such a sentence, it is still ungrammatical because *sensei* 'teacher' is an adjunct. The grammaticality of (6) indicates that *sensei* 'teacher', which is not the first semantic argument of a nuclear LS, can control the honorific predicate contra the proposal of (3). *Sensei* 'teacher' is a syntactic core argument, whereas *John* is not a core argument syntactically. This suggests that a nominal can control an honorific predicate as long as it is the highest syntactic core argument in each nuclear LS. A note is in order here. The grammaticality of (6) might be slightly lower. It is because *sensei* 'teacher' is the highest core argument only as the result of the demotion of *John*. The choice of *sensei* 'teacher' as the controller is the next choice. Therefore, (3) is now revised as follows:

- (8) Conditions on controllers of the 'subject'-honorific predicate. (Revised)
 - (a) The highest syntactic core argument of the nuclear LS may control the subject-honorific predicate.
 - (b) Pragmatic condition: the controller must be honored.
 - (c) Condition on scope: The position of the honorific predicate determines the scope of potential controller.

Honorification in inversion sentences falls out naturally without being trapped by the debate regarding the subject-hood of a dative coded NP versus a nominative coded NP.

- (9) * Taro-ni sensei-ga o-wakari ni nar-anai.
 Taro-DAT teacher-NOM H-understand become-neg
 '(int.) Taro does not recognize the teacher.'
 know'(Taro, teacher)
- (10) Kakehi sensei-ni eigo-ga yoku o-wakari ni nar-u. Kakehi teacher-DAT English-NOM well H-understand become-NPST. 'Prof. Kakehi understands English well.' know'(Prof. Kakehi, English)

Since *Taro*, in (9), is not followed by the politeness suffix –*san*, it is not honored. *Sensei* 'teacher' cannot be the controller since it is not the highest syntactic core argument. The unacceptability of (9) and the grammaticality of (10) are correctly predicted by (8).

Shibatani (1990: 304-305) points out that possessive constructions and existential constructions behave differently in terms of subject honorification.

Possessive:

(11) Kakehi sensei-ni hige-ga o-ari ni nar-u. (Shibatani 1990: 304) Kakehi teacher-DAT beard-NOM H-have become-NPST 'Prof. Kakehi has a beard.'

Existential:

(12) Kimi-ni rippana *ryoosin*-ga irassyar-u (ibid. 305) you-DAT fine parents-NOM exist-NPST (honorific suppletive form for *iru*) (lit.) 'At you exist fine parents.'

We know (12) is existential because if it were possessive the verb would be *o-ari ni naru*, the honorific form for *aru* 'be'.

In (11) the dative nominal is the controller; whereas, in (12) the nominative nominal is the controller. We can account for this difference by assuming that a locative cannot be a controller even if the locative argument (in a broad/metaphoric sense) is human.

- (11') Possessive: have.as.part'(PROF. KAKEHI, beard)
 Possessor
- (12') Existential: **be-at'**(you, *PARENTS*) Locative

Now let us turn to indirect passives.

- (13a) Taro-wa *sensei*-ni henna-mono-o o-mesiagari ni nar -are -ta. Top-TOP teacher-DAT strange-thing-ACC H-eat(suppletive) become -PASS -PAST 'Taro was affected by the teacher's eating something strange.' {[do'(teacher, [eat'(teacher, strange food)])]} { [feel-affected'(Taro)]}
- (13b) * Taro-wa sensei-ni henna-mono-o o-mesiagar -are ni nat -ta.

```
Taro-TOP teacher-DAT strange-thing-ACC H-eat(suppletive)-PASS become -PAST '(int.)Taro was affected by the teacher's eating something strange.' {[do'(teacher, [eat'(teacher, strange food)])]} { [feel-affected'(Taro)]}
```

(13c) # Sensei-wa Taro-ni henna-mono-o o-tabe -rare ni nat -ta.

teacher-TOP Taro-DAT strange-thing-ACC H-eat(suppletive)-PASS become -PAST

'(int.) The teacher was affected by Taro's eating something strange.'

{[do'(Taro, [eat'(Taro, strange food)])]}{ [feel-affected'(teacher)]}

Condition (8) correctly predicts *sensei* 'teacher' in (13a) is the controller. Both *sensei* and *Taro* are the highest syntactic core arguments of their respective nuclear LSs, but the scope of the honorific predicate is narrow (note that *-ni-nar-* is inside of *-are-*) hence picks up *sensei* 'teacher' as the controller. Example (13b), where the scope of the honorific predicate is wider (note that *-ni-nat-* is outside of *-are*), picks up *Taro* as the controller. However, *Taro* is not, pragmatically, a legitimate controller of the honorific predicate. In (13c), *sensei* 'teacher' should be the controller. The anomaly of the sentence is due to a pragmatic conflict. The connotation carried by honorification is positive while adversity passives connote a negative situation. With narrow scope, *sensei* 'teacher' in (14) is the controller.

```
(14) (Watasi-wa) ima sensei-ni o-kosi ni nar -are -te-wa komarimas-u. (I -TOP) now teacher-DAT H-come(suppletive) become-PASS-L-TOP trouble -

NPST

'I will be in trouble if the teacher shows up now.'

[[do'(teacher, [move.to.ref.point'(teacher)])] CAUSE [become be-at'(ref.point, teacher)]] [feel-affected'(I)]
```

With narrow scope, example (15a) picks up *ame* 'rain' as the controller. However, an inanimate nominal cannot be the controller of an honorific predicate pragmatically, thus the sentence is unacceptable.

```
(15a) * Sensei-ga ame-ni o-fur-are ni nat -ta. teacher-NOM rain-DAT H-fall-PASS become-PAST '(int.) The teacher was affected by raining.'

[do'(rain, [fall'(rain)])] [feel-affected'(teacher)]
```

In (15b), with wider scope, taking sensei 'teacher' as the controller pragmatically conflicts with

the adversity reading. Nevertheless, since there is no other candidate for the controller, *sensei* 'teacher' is forced to be construed as the controller but anomalously.

```
(15b) # Sensei-ga ame-ni o-furi ni nar -are -ta.
teacher-NOM rain-DAT H-fall become-PASS-PAST
'(int.) The teacher was affected by raining.'
[do'(rain, [fall'(rain)])] [feel-affected'(teacher)]
```

The important point to note in the above sentences is that the dative nominals can control the subject honorific predicate. This clearly indicates that the dative coded nominal in an indirect passive construction is not an adjunct. (cf. VV & LP 1997:390)

Now, let us look at possessor-raising passives. If it were a kind of 'indirect passive', the nominal followed by *ni* could control a 'subject'-honorific predicate. On the other hand, if it is a direct passive, as I have argued, we would expect that the nominal in question cannot control a 'subject'-honorific predicate. The latter is the case.

```
(16) * Taro-ga sensei ni e -o o-home ni nar -are -ta.

Taro-NOM teacher by painting-ACC H-praise become-PASS-PAST
'(int.) Taro was praised by the teacher for the painting.'

{do'(teacher, [praise'(teacher, [have'(Taro, painting)])])}

ACT--->adjunct
```

```
(17) # Sensei-wa yakuza ni munamoto-o o-tsukam -are ni nat -ta. teacher-TOP gang by collar -ACC H-grab -PASS become-PAST {do'(yakuza, [grab'(yakuza, [have.as.part'(teacher, collar)])])} ACT--->adjunct 'The teacher was grabbed by a yakuza by the collar.'
```

Example (16) shows that a nominal followed by *ni* cannot control a 'subject'-honorific predicate. This means the nominal is not a dative but an adjunct. In (17), *sensei* 'teacher' is the only possible controller of the honorific predicate, as far as syntax is concerned because *sensei* 'teacher' is the highest syntactic core argument. However, the pragmatic conflict makes the sentence sound odd. Thus, the possessor-raising passive construction is an example of the direct passive construction but not the indirect passive construction.

3.2. Reflexive zibun

The reflexive *zibun* 'self' has been claimed to be 'subject oriented' (Kuroda 1965, Kuno 1973, McCawley 1976, Inoue 1976 among others). In (18), *zibun* can be controlled by the 'surface subject' (grammatical/syntactic subject) *Taro* or the embedded subject (logical subject) *Ziro*. Unlike English *-self*, *zibun* is not restricted by a clausemate condition, in other words, it allows long distance reflexive control. In (18), *zibun* can be controlled by *Taro*, which is a nominal, out of the clause in which the reflexive occurs. Pragmatically, the antecedent of *zibun* must be animate.

- (18)Taroo₁-ga Hanako₂-ni [Ziro₃-ga zibun_{1/3/*2} -o hihan -si -ta] to it -ta. Taro-NOM Hanako-DAT Ziro-NOM self -ACC criticism-do-PAST comp say -PAST 'Taro said to Hanako that Ziro criticized self.' (modified from Tsujimura 1996:278)
- Kuno (1973) and Shibatani (1976) observe that a dative nominal of a lexical causative verb fails to control *zibun* as in (19), while a dative nominal in a morpho-syntactic causative ('productive causative' in Shibatani) sentence may control *zibun* as in (20).
- (19) Taro₁ -wa Ziro₂-ni zibun_{1/* 2} -no huku -o kise -ta. (Shibatani 1976:248)

 Taro-TOP Ziro-DAT self -GEN clothes-ACC put.on-PAST

 'Taro put Taro's/* Ziro's clothes on Ziro.'

 {[do'(Taro, Ø)] CAUSE do'[(Ziro, [wear'(Ziro, [have'(zibun, clothes)])])]}
- (20) Taro₁ -wa Ziro₂ -ni zibun_{1/2} -no huku -o ki -sase -ta.

 Taro-TOP Ziro-DAT self -GEN clothes-ACC wear-CAUS-PAST

 'Taro made Ziro put on Taro's/ Ziro's clothes.'

 {[do'(Taro, Ø)] CAUSE}{do'[(Ziro, [wear'(Ziro, [have'(zibun, clothes)])])]}

Note that the lexical causative sentence (19) is a ditransitive construction, consisting of one nuclear LSs, while the morpho-syntactic causative in (20) consists of two nuclear LSs.

Kuno (1973) also pointed out that the dative nominal of an 'indirect passive' sentence can control *zibun* as in (21), while the adjunct of a direct passive fails to control *zibun* as in (22).

- (21) John₁-wa Mary₂-ni *zibun*_{1/2}-no uti de nekom -are -ta. (ibid.: 304) John-TOP Mary-DAT self -GEN house in become.bed.ridden-PASS-PAST 'John was affected by Mary's becoming bedridden in John's/Mary's house.' {[BECOME bed.ridden'(Mary)]}{ [feel-affected'(John)]}

 UND--->DCA DCA=Peak
- (22) Mary₁-wa John₂ ni *zibun*_{1/*2}-no uti de koros-are-ta. (ibid.: 299) Mary -TOP John by self -GEN house in kill-PASS-PAST 'Mary was killed by John in Mary's /* John's house.' {[do'(John, Ø)] CAUSE [INGR dead'(Mary)]}

 ACT--->adjunct UND

The following formulation can account for all these facts.

- (23) Conditions on controllers of *zibun*
 - (a) The highest syntactic core argument of each nuclear LS may control the reflexive *zibun*.
- (b) Pragmatic condition: the controller must be human (or higher animal(s))

 Condition (23a) is identical with condition (8a) on controllers of the 'subject'-honorific predicate.

The notion of 'core argument' excludes the adjunct *John* in (22) from the possible controllers. The notion of 'nuclear LS' distinguishes lexical causatives from morpho-syntactic causatives. The lexical causative (i.e. ditransitive), sentence (19), is a single nuclear LS. The highest core argument *Taro* of the whole LS is the sole controller of the reflexive. In the morphosyntactic causative (20), *Taro* is the highest core argument of the first nuclear LS, and *Ziro* is the highest core argument in the second nuclear LS. Thus, the ambiguity of the antecedent is born out. The indirect passive (21) also consists of two nuclear LSs; thus, both *Mary* and *John* may control the reflexive. Condition (23) predicts the correct controller in inversion sentences as follows:

(24) Taro-ni₁ Hanako₂-ga *zibun*_{1/*2}-no heya kara mie -ta Taro-DAT Hanako-NOM self -GEN room from visible-PAST 'Taro saw Hanako from Taro's/*Hanako's room. ...**visible'**(Taro, Hanako)

- (25) # Taro₁-ni Hanako₂-ga *zibun**_{1/*2}-no koe de wakat -ta Taro-DAT Hanako-NOM self -GEN voice by understand-PAST 'Taro recognized Hanako by self's voice.' ...BECOME **know**'(Taro, Hanako)
- In (24) the highest core argument *Taro*, the dative nominal, controls the reflexive. The nominative *Hanako* cannot control the reflexive since it is not the highest core argument. In (25) *Hanako* cannot control the reflexive, because *Hanako* is not the highest core argument in the LS. *Taro* is predicted as the controller since it is the highest core argument. However, the interpretation we get, 'Taro₁ recognized Hanako by the voice of himself₁', is pragmatically odd.

A note is in order here. Condition (23) does not provide a complete account of the controller of *zibun*. For example, the antecedent must c-command its reflexive in Japanese as well as in English. (McCawley 1976: 57)

(26) Taro₁ -no tomodachi₂ -ga *zibun*_{2/*1} -no ronbun-o kai -ta.

Taro -GEN friend -NOM self -GEN thesis-ACC write-PAST 'Taro's friend wrote friend's/* Taro's thesis.'

Taro, embedded in the NP *Taro no tomodachi ga* 'Taro's friend-NOM', fails to c-command the reflexive. This c-command condition is translated into the LS superiority condition in RRG (VV & LP: 400). Some ditransitive verbs denoting transfer of ownership are counterexamples for the condition on the controller of a 'subject'-honorific predicate and for condition (23) on reflexive controllers.

(27) Taro₁ -wa kodomo₂-ni *zibun*_{1/2} -no heya-o atae-ta.

Taro -TOP child -DAT self -GEN room-ACC give-PAST

'Taro gave the child Taro's/the child's room.'

[do'(Taro, [give'(Taro, child)] CAUSE [have'(child, room)]

A co-reference reading of the reflexive with *kodomo* 'child' is perfectly acceptable, although *kodomo* is not the highest core argument of a nuclear LS. It seems pragmatics, namely the ownership or controllability by the possessor over the possessed, overrides the condition in (23).

'Controllability' here refers to the power of control in the real world, that is, how the child uses the room. Once the room is given to *kodomo* 'the child', he or she is the owner of the room. It leads to a co-referential reading between *kodomo* and *zibun*.

Howard (1974:69) says the following sentence is unambiguous for most speakers, but ambiguous for some speakers.

(28) Tanaka₁-wa Satoo₂ ni *zibun*_{1/?2} -no heya-no kagi-o watas -are -ta. (ibid.: 69) Tanaka -TOP Satoo by self -GEN room-GEN key-ACC hand.over-PASS-PAST 'Tanaka had the key to Tanaka's /?Satoo's room handed to him by Satoo.'

If *Satoo* cannot control *zibun* as they claim, it is predicted from condition (23), because *Satoo* is an adjunct. Consequently, *Satoo* should not control the reflexive. If *Satoo* does control *zibun*, however, condition (23) fails to account for that fact. Unfortunately, my own judgment agrees with the minority. Again, it seems the owner's pragmatic controllability interacts.

Comprehensive formalization of the pragmatic condition is beyond the scope of the present

discussion. (See Iida and Sells 1987, Iida 1992 for pragmatic approaches to zibun)

Now, we look at possessor-raising passives. Our prediction is that co-reference of *zibun* is ambiguous in indirect passive (29), while co-reference of *zibun* is unambiguous in the possessor-raising direct passive (30). NP-*ni* in the former is a dative and the highest core argument, whereas it is a postpositional adjunct in the latter. The prediction is born out.

- (29) Hanako₁-wa Taro₂ -ni *zibun*_{1/2} -no heya de sin-are-ta. Hanako-TOP Taro -DAT self -GEN room in die-PASS-PAST 'Hanako was affected from Taro's dying in her/his room.'
- (30) Mary₁-wa John₂ ni *zibun*-no heya_{1/*2} de atama-o war -are -ta. (Kuroda 1978) Mary-TOP John by self-GEN room in head-ACC break-PASS-PAST 'Mary had her head injured by John in Mary's room.'

Many authors have claimed or presupposed that possessor-raising passives are indirect passives. (Kuroda 1965, McCawley 1972, Kuno 1973, Howard and Niyekawa-Howard 1976, Teramura

1982, Miyagawa 1989, and the latest text book on Japanese linguistics by Tsujimura 1996.) As Kuno (1983) points out (30) is a counter example for the claim that a possessor-raising passive is an indirect passive. If it were an indirect passive, it would lead to ambiguous co-reference of antecedents. In our account, (30) is a direct passive with an actor-adjunct. The very sentences such as the following, which would support the claim that a possessor-raising passive were an indirect passive seem to go against our claim at first glance. In the apparent possessor-raising passives (31) and (32), co-reference of *zibun* is ambiguous. (from Kuno, 1973: 303-304)

- (31) John₁-wa Mary₂ ni $zibun_{1/2}$ -no kazoku-no hanasi bakaris -are -ta. John-TOP Mary DAT/by self -GEN family-GEN talk only do-PASS-PAST 'John was affected by Mary's talking only about his/her family.'
- (32) John₁-wa Mary₂ ni zibun_{1/2} -no koto -o zimans-are-ta.

 John-TOP Mary DAT/by self -GEN matter-ACC boast-PASS-PAST

 'John suffered from Mary's bragging about his/her matter.'

 (Translation is Kuno's. Remember that I do not consider a possessor raising passive as an inherent adversative passive)

A closer look into these examples, reveals that they are structurally ambiguous, namely these sentences can be either a possessor-raising passive (i.e. an direct passive) or an indirect passives). In (31), if *kazoku* 'family' is John's family then the sentence is a possessor-raising passive. In this interpretation, *John* is the only antecedent of *zibun*. On the other hand, if *kazoku* 'family' is interpreted as Mary's family then the sentence is an indirect passive. In this reading, *Mary ni* is the core argument which serves as an antecedent of the reflexive. Thus, the ambiguity in co-reference is accounted for. This observation is further supported by the fact that the adversative reading is not inherent if the sentence is interpreted as a possessor-raising passive.

(33) John₁-wa Mary₂ ni *zibun*_{1/*2}-no kazoku -no koto -o hanasi s -are -ta John-TOP Mary by self -GEN family-GEN matter-ACC talk do-PASS-PAST node tokui-dat -ta so.that proud-be-PAST 'John was proud because he was talked about his family by Mary.'

Under the co-referent reading of *John* and *zibun*, (33) is a possessor-raising passive. This sentence does not imply adversity, as indicated by *tokui-dat-ta* 'was proud'. If we try to read *zibun* as co-referent with *John*, then the sentence must be interpreted as an indirect passive. However, this interpretation is not possible because the implication of adversity, inherent for an indirect passive contradicts the meaning of *tokui-dat-ta* 'was proud'.

An inalienable possessor is more easily understood as a possessor than an alienable possessor. Compare the following two sentences.

- (34) Taro₁-wa Hanako₂ ni asi-o $zibun_{1/*2}$ -no heya de massaaji s -are -ta. Taro-TOP Hanako by leg-ACC self -GEN room in massage do-PASS-PAST 'Taro had his legs massaged in Toro's/* Hanako's room.'
- (35) Taro₁ -wa Hanako₂ ni hikidasi ni kakusite-oi-ta wisukii-o
 Taro-TOP Hanako DAT/by drawer in hide -put-PAST whisky-ACC

 zibun_{1/2} -no heya de nom -are -ta
 self -GEN room in drink-PASS-PAST
 'Taro had his whisky, which he kept in a drawer, drunk by Hanako in Taro's/Hanako's room.'

In (34), the possessed is a body-part and *Taro* always has control of his own body-part; thus, the sentence is construed as a possessor-raising passive. In (35), the legal possessor of the *whisky* is *Taro*; however, he loses his control of *the whisky* once *Hanako* takes it. Consequently, *Hanako* gains control of the *whisky*. The sentence easily switches to an indirect passive, indicated by the ambiguous co-reference of the reflexive.

In this section, I have argued that the conditions on the controllers of the reflexive *zibun* are basically the same as the conditions on the controllers of 'subject'-honorific predicates. The analysis of *zibun* and its antecedent has also indicated that a possessor-raising passive is a direct passive.

3.3. Controllers of the -nagara 'while' clause.

Controllers of *-nagara* 'while' clauses have been used as a test of 'subject'. (Perlmutter 1983, Shibatani 1988, Matsumoto 1992: 34, Dubinsky 1997: 20-21)

(36) Aiko-wa Mitsuko ni naki-nagara sikar -are-te -i -ru Aiko-TOP Mitsuko by cry-while scold-PASS-L-PROG-NPST 'Aiko is being scolded by Mitsuko, while (Aiko/Mitsuko is) crying.'

Either *Aiko* or *Mitsuko* may be the one who is crying and the controller of the *nagara* clause. For expository purpose, I use Ø as follows.

(36') Aiko₁-wa Mitsuko₂ ni $[\emptyset_{1/2}]$ naki-nagara] sikar-are -te-i -ru Aiko-TOP Mitsuko by cry-while scold-PASS-L-PROG-NPST

This anaphoric controller behaves differently from the cataphoric controller.

(37) [Ø_{1/*2} naki-nagara] Aiko₁ -wa Mitsuko₂ ni sikar-are -te -i -ru cry-while Aiko -TOP Mitsuko by scold-PASS-L-PROG-NPST 'While (Aiko/* Mitsuko is) crying, Aiko is being scolded by Mitsuko.'

In (37), the example of cataphoric controller, only *Aiko* but not *Mitsuko* can be the controller.

Let us look at cataphoric controllers first and we will come back to anaphoric controllers later. Perlmutter (1984) claims the condition on controllers of the *nagara* clause is as follows:

(38) Condition on controllers of the *-nagara* clause (Perlmutter 1984: 322)

'Only a working 1 of the matrix clause can control the *-nagara* clause.'

He apparently restricts his discussion to cataphoric controller. This condition was proposed to account for the controller in inversion sentences. 'Working 1' denotes a 'subject' at the any stage of derivation as long as it is not a chômeur (i.e. adjunct) at the final clause. However, this condition has a problem. A causee of a causative sentence can satisfy the definition of working 1; however, it does not serve as a cataphoric controller of a *nagara*-clause.

(39) $[\emptyset_{1/*2} \text{ koohii-o} \text{ nomi-nagara}] \text{ Taro}_1\text{-wa Hanako}_2\text{-ni} \text{ terebi-o} \text{ mi} \text{ -sase -ta.}$ coffee-ACC drink-while Taro-TOP Hanako -DAT TV -ACC watch-CAUS-PAST 'While (Taro/ *Hanako was) drinking coffee, Taro let Hanako watch the TV.'

This reveals that 'working 1' is, at best, a necessary condition on the cataphoric-controller but not a sufficient condition.

In order to seek a more adequate condition, we look for conditions on cataphoric controllers of a *-nagara* clause in terms of the LS as we did in the two previous sections. We begin with morpho-syntactic causative and lexical causative sentences.

- (39') [Ø_{1/*2} koohii-o nomi-nagra]Taro₁-wa Hanko₂-ni terebi-o mi -sase -ta. coffee-ACC drink-while Taro -TOP Hanako-DAT TV -ACC watch-CAUS-PAST 'While (Taro/ *Hanako was)drinking coffee, Taro let Hanako watch the TV.' ...{[do'(T, Ø)] CAUSE}{[[do'(H, Ø)] CAUSE [BECOME visible'(H, TV)]]}} (LSs of the *-nagara* clause are omitted. Only the parts of LS crucial to the discussion will be presented)
- (40) [Ø_{1/*2} koohii-o nomi-nagara] Taro₁ -wa Hanko₂ -ni shasin-o mise-ta. coffee-ACC drink-while Taro -TOP Hanako-DAT picture-ACC show-PAST 'While (Taro/ *Hanako was) drinking coffee, Taro showed the pictures to Hanako.' ... {[do'(T, Ø)] CAUSE [BECOME visible'(H, picture)]}

The comparison between the morpho-syntactic causative (39') and the ditransitive lexical causative (40) shows that only the highest argument of the main clause may be the controller. Note that nuclear LSs which played an important role in the condition on controllers of 'subject'-honorification and reflexive *zibun* are irrelevant to the condition on cataphoric controllers of a gap in *nagara*-clause. In order to see how 'adjuncts' affect the condition, let us compare the direct passive (41) and the indirect passive (42).

- (41) [Ø_{1/*2} naki-nagara] Aiko₁ -wa Mitsuko₂ ni sikar-are-ta cry-while Aiko-TOP Mitsuko by scold-PASS-PAST 'While (Aiko/ *Mitsuko was) crying, Aiko was scolded by Mitsuko.' ... do'(Mitsuko, [scold'(Mitsuko, Aiko]) ACT--->adjunct UND
- (42) [Ø_{2/*1} naki-nagara] Aiko₁ -wa Mitsuko₂ -ni uti-o deteik-are-ta. cry-while Aiko-TOP Mitsuko-DAT home-ACC leave-PASS-PAST 'Aiko was affected by Mitsuko's leaving home while (Mitsuko/*Aiko was) crying.' ...[[do'(Mitsuko, [leave'(M, home)])]&[be.not.at (home, M)]] [feel-affected'(Aiko)] ACT--->DCA

DCA=Peak

Example (41) shows an adjunct cannot be a controller. In such a case the next highest core argument, *Aiko* in this example, becomes the controller. Example (42) shows the highest core argument of the main clause LS is the controller. Again, the notion of nuclear LS is irrelevant. The condition on cataphoric controllers is:

(43) Condition on cataphoric controllers of the gap in the *-nagara* clause.

The highest syntactic core argument of the LS of the main clause is the controller of the gap in the *nagara*-clause.

The condition correctly predicts that the *ni*- 'by' adjunct of a possessor-raising construction (i.e. a direct passive) in (44) cannot be the controller.

(44) [Ø_{1/*2}naki-nagara] Aiko₁-wa Mitsuko₂ ni atama-o nagur-are-te-i-ta.
cry-while Aiko-TOP Mitsuko by head-ACC hit -PASS-L-PROG-PAST
'While (Aiko/*Mitsuko was) crying, Aiko was beening beaten on the head by Mitsuko.'
... do'(Mitsuko [beat'(Mitsuko, [have.as.part'(Aiko, head)])])
(beat', instead of hit', indicates an iterative interpretation)

Although *Mitsuko* is higher than *Aiko*, since *Mitsuko* is an adjunct, it cannot be the controller. *Aiko*, the runner-up, becomes the controller.

Next, let us consider the condition on anaphoric controllers of the *-nagara* clause.

(45) Mitsuko₁-wa Aiko₂ -o [Ø_{1/*2} naki-nagara] sikat-te -i -ru..

Mitsuko-TOP Aiko -ACC cry-while scold-L-PROG-NPST
'Mitsuko is scolding Aiko while (Mitsuko is) crying.'

... do'(Mitsuko, [scold'(Mitsuko, Aiko])

ACT UND

The highest core argument of the matrix clause LS is the controller. The difference between lexical causative (46) and the morpho-syntactic causative (47) indicates that the higher argument of each nuclear LS can be a controller.

- (46) Taro₁-wa seito₂ -ni $[\emptyset_{1/*2}]$ koohii-o nomi-nagara] bideo-o mise-ta. Taro-TOP student-DAT coffee-ACC drink-while video-ACC show-PAST 'Taro showed the video to his students while he was drinking coffee.' ... {[do'(Taro, \emptyset)] CAUSE [do'(students, [watch'(students, video)])]}
- (47) Taro₁-wa seito₂ -ni $[\emptyset_{1/2}$ koohii-o nomi-nagara] bideo-o mi -sase -ta. watch-CAUSE-PAST 'Taro had his students watch the video, while he/they were drinking coffee.' ...{ $[\mathbf{do'}(\text{Taro}, \emptyset)]$ } { CAUSE $[\mathbf{do'}(\text{students}, [\mathbf{watch'}(\text{students}, \text{video})])]$ }

Since there is a single nuclear LS for the lexical causative (46), the controller is unambiguous; meanwhile, the controller in the morpho-syntactic causative sentence (47) is ambiguous because the matrix clause consists of two nuclear LSs.

In passive voice, contrary to all the conditions we have seen so far (including the *zibun* reflexive and 'subject'- honorification), an actor-adjunct may be a controller in this construction as we can see in the following direct passive sentences.

- (48) Hanako₁-ga Taro₂ ni [Ø_{2/*1} aruki-nagara] aisatu-s -are -ta. (Shibatani 1988: 129) Hanako-NOM Taro by walk-while greet-do-PASS-PAST 'Hanako was greeted by Taro, while he was walking.' ...do'(Taro [greet'(Taro, Hanako)]
- (49) John₁-wa Mary₂ni [Ø_{1/2} nikkori warai-nagara] kisu s are -ta. (Matsumoto 1992: 34) John-TOP Mary by sweetly smile-while kiss do-PASS-PAST 'John was kissed by Mary, while he/she was smiling.' ...[do'(Mary [kiss'(Mary, John)])]
- (50) Aiko₁-wa Mitsuko₂ ni [Ø₁>₂ naki-nagara] sikar-are -te -i -ru.. Aiko-TOP Mitsuko by cry-while scold-PASS-L-PROG-NPST 'Aiko is being scolded by Mitsuko while (Aiko/ Mitsuko is) crying.' ... do'(Mitsuko, [scold'(Mitsuko, Aiko])

Whether the nominative NP ('surface subject') can be a controller or not seems to be determined pragmatically. In (48), the nominative NP cannot be the controller (I agree with Shibatani's judgment). In (49), the nominative NP is a possible controller (I agree with Matsumoto's judgment). In (50), the nominative NP is the preferred controller (judgment is mine). By contrast, the highest semantic argument of the matrix clause can always be a controller although it is

syntactically an adjunct. An adjunct in a possessor-raising passive, i.e. a direct passive, behaves in the same way.

(51) Kodomo₁-wa hahaoya₂ ni $[\emptyset_{1/2}$ nikkori warai-nagara] atama-o nader-are-ta. child -TOP mother by sweetly smile-while head-ACC pat-PASS-PAST 'The child was patted on his head while he/she was smiling sweetly.' ...**do'**(mother, [hit'(mother, [have.as.part'(child. head)])])

This example is ambiguous because both the surface 'subject' and the highest semantic argument, which is the adjunct, may be the controller.

On the other hand in indirect passives, the controller is never ambiguous.

- (52) Aiko₁-wa Mitsuko₂ -ni [Ø_{2/*1} naki-nagara] uti -o deteik-are-ta.

 Aiko-TOP Mitsuko-DAT cry-while home-ACCleave-PASS-PAST

 'Aiko was affected by Mitsuko's leaving home while (Mitsuko/ *Aiko was) crying.'

 {[do'(M, [leave'(M, home)]) & [be.not.at (home, M)]}{ [feel-affected'(Aiko)]}
- (53) Taro₁-wa Hanako₂-ni [Ø_{2/*1} naki-nagara] sin-are-ta.

 Taro-TOP Hanako-DAT cry-while die-PASS-PAST
 ...{[INGR dead'(Hanako)]}{ [feel-affected'(Taro)]}

The matrix clause has two nuclear LSs as well as a morpho-syntactic causative. However, the argument of **feel-affected**' can never be the controller. This is due to the [+static] property of the adversative passive predicate. (Note that *sinu* 'to die' in Japanese is an achievement [INGR **dead**'(Hanako)], which is [-static].) The meaning of a *-nagara* 'while' clause is intrinsically dynamic. It requires the controller of the gap to be an argument of a [-static] verb.

Inversion sentences, which are also [+static], are not compatible with a *-nagara* clause.

- (54) * Hito-wa me-o toji-nagara tenohira-no ue -ni aru mono-ga wakar -u person-TOP eye-ACC close-while palm-GEN surface-at exist thing NOM understand-NPST
 - '(int.) A person can recognize what is in his/her hand with his/her eyes closed.' ...know'(person, thing)

Compare (54) with the *-mama* 'as it is' clause in (55). The *-mama* clause is compatible with an inversion sentence. This suggests that *-mama* is not intrinsically dynamic.

(55) Hito-wa me-o toji-ta-mama tenohira-no ue -ni aru mono-ga wakar -u person-TOP eye-ACC close-PAST-as.it.is palm-GENsurface-at exist thing-NOM understand-NPST

'A person can recognize what is in his/her hand with his/her eyes closed.'

The semantics of *nagara* requires a [-static] matrix verb. The [+static] property of the stative **feel-affected'** and the stative inversion predicates contradicts this [-static] constraint; therefore, arguments of **feel-affected'** and inversion clauses cannot control the gap of a *nagara*-clause. (cf. Toratani 1997)

The sufficient but not necessary condition on anaphoric controllers of the gap in *-nagara* clause is formulated as follows.

(56) The highest semantic argument of a [-static] nuclear LS of the matrix clause is ONE of the possible anaphoric controllers of the gap of *nagara*-clauses.

Conclusion

The following rules for case assignment in Japanese were proposed and then applied to several constructions.

Case/postposition assignment rules (Japanese):

- (P) Assign nominative case to the pragmatic peak.
- (A) Assign nominative case to the higher ranking macrorole core argument.
- (B) Assign accusative case to the other macrorole core argument.
- (C) Assign dative case to the other core argument as default (Direct Core Argument)
- (C') The other core argument may take a postposition (Oblique Core Argument)

Nature of macrorole ranking:

A 'demoted' macrorole is respected in terms of macrorole ranking even if it is not assigned a case.

The rules correctly accounted for all constructions including inversions, dative-postposition, double nominative, possessor-raising double nominative, causative, direct passive, possessor-raising passive, and indirect passive constructions.

Conditions on controllers in so-called 'subject'-honorification, reflexive *zibun*, and *-nagara* 'while' clauses were discussed. 'Bi-clausal' characteristics of causative sentences and indirect passive sentences were captured by their nuclear logical structures.

Conditions on controllers of the 'subject'-honorific predicate:

- (a) The highest syntactic core argument of the nuclear LS may control the subject-honorific predicate.
- (b) Pragmatic condition: the controller must be honored.
- (c) Condition on scope: The position of the honorific predicate determines the scope of potential controller.

Conditions on controllers of zibun:

- (a) The highest syntactic core argument of each nuclear LS may control the reflexive zibun.
- (b) Pragmatic condition: the controller must be human or higher animal(s)

Conditions on cataphoric controllers of the gap in the *-nagara* clause:

The highest syntactic core argument of the LS of the main clause is the controller of the gap in the *nagara*-clause.

Sufficient but not necessary conditions on anaphoric controllers of the gap in a nagara clause:

The highest semantic argument of a [-static] nuclear LS of the matrix clause is one of the possible anaphoric controllers of the gap in *nagara*-clauses.

I discussed the differences between direct passives and indirect passives, and argued that possessor-raising passives are direct passives but not indirect passives.

I showed that logical structures, argument-hood (i.e. syntactic arguments vs. adjuncts), and

pragmatics, not grammatical relations, were factors to determine all the phenomena discussed in this paper.

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