

Argument or Adjunct: A Study of Dative Objects and PDS Hypothesis*

Katsuya Kinjo

I fear we are not getting rid of God because
we still believe in grammar ...
- Friedrich Nietzsche

0. Introduction

Miyagawa's PDS Hypothesis¹ (1984, 1989a, 1989b) predicts that verbs are classified into the appropriate intransitive, transitive, and ditransitive slots in the permanent lexicon. Even those morphologically complex derived verbs, such as causatives and passives, can participate in such a structure if, and only if, there is no competing item in the target slot. For example, the intransitive verb *nak-* 'cry' does not have a corresponding lexical transitive verb so that its causative form, *nak-ase-* 'cause to cry', can get into the transitive slot:

PDS

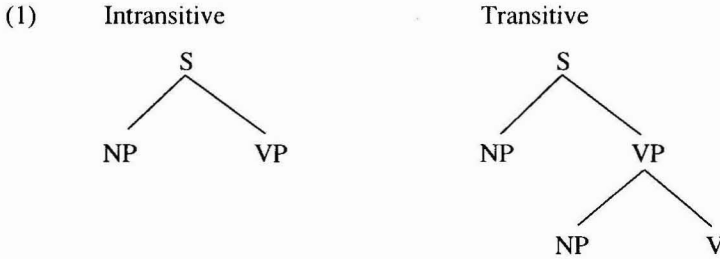
Intransitive	Transitive	Ditransitive
<i>nak-</i> 'cry'	<i>nak-ase-</i>	

It is taken for granted, as his suggestion of only three slots in one PDS structure shows, that all verbs are classified in one of these categories. His arguments are based on those verbs whose transitivity status is very clear. However, a close examination reveals that the status of many verbs is controversial. This paper considers the status of those verbs which take the so-called dative object, i.e. *ni*-marked NPs, as their secondary argument assuming subject as a primary argument²:

<i>ochiir-</i>	'fall into'	<i>aki-</i>	'be fed up with'
<i>hagem-</i>	'work hard'	<i>hitar-</i>	'be immersed in'
<i>kakar-</i>	'have (a sickness)'	<i>motozuk-</i>	'be based on'
<i>mukui-</i>	'repay, reward'	<i>natsuk-</i>	'take to'
<i>oyob-</i>	'reach'	<i>shitagaw-</i>	'obey'
<i>shitashim-</i>	'enjoy'	<i>somuk-</i>	'disobey'
<i>sonae-</i>	'take precaution of'	<i>tsukae-</i>	'serve'

1. Miyagawa's criterion of verb classification

Miyagawa's framework assumes that intransitive verbs are those which take only one argument; subject NP is directly governed by S node. On the other hand, transitive verbs are to take two arguments. Subject NP is still governed by S node but the other NP, direct object NP, is the sister node of V under VP node (1989a: 1):



He suggests the Numeral Quantifier (NQ) test to distinguish adjuncts from arguments. He argues that a numeral quantifier that is "syntactically separate from the NP whose referent is being counted can modify the NP if the NP is an argument" (1989: 5). In this analysis, the traverse phrase *kooen o* 'parks' in the example below can be an argument because it can be modified by a NQ phrase, *2-tsu* :

(2 = Miyagawa's (11))

Hanako ga kooen o 2-tsu sanposhita.
 NOM parks TRAV 2-CL took a walk
 'Hanako walked around two parks.'

On the other hand, the agent phrase in a passive sentence cannot be an argument, as the following ungrammatical sentence demonstrates:

(3 = Miyagawa's (12))

*Taroo ga sensei ni 2-ri shikar-are-ta.
 NOM teachers by 2-CL scold-PASS.-PST
 '(intended meaning =) Taro was scolded by two teachers.'

However, this analysis does not work for two reasons (cf. Moriyama 1986).

First, most of the *ni*-marked NPs are not countable, so that it cannot be determined whether or not these NPs are arguments. For example, *kitoku jootai* 'critical condition' and *benkyoo* 'study' are not counted even with the general counter *-tsu*:

(4) *Wanio ga kitoku jootai ni 2-tsu ochiit-ta.
 NOM. critical condition NI 2-CL fall into-PAST.
 'Wanio fell into two critical conditions.'

- (5) *Wanio wa benkyoo ni 3-tsu aki-ta.
 TOP. study NI 3-CL fed up with-PAST.
 'Wanio was fed up with 3 studies.'

Second, even *o*-marked objects, which are obviously direct objects (i.e. internal arguments) of the verbs, cannot be specified as arguments because there is no counter that can attach to such NPs:

- (6) ??Nekosuke wa gomi o 3-tsu suteta.
 TOP. garbage ACC. 3-CL threw out
 'Nekosuke threw out the three garbage.'
- (7) ?Inuo wa kutsu no tsuchi o 2-tsu totta.
 TOP. shoes POSS. dirt ACC. 2-CL brushed off
 'Inuo brushed the two dirt off his shoes.'

Miyagawa's NQ test has very limited predictability in terms of the distinction between argument and adjunct. Whether or not *ni*-marked NP is an adjunct or an argument is still indeterminable.

2. Dative objects as adjuncts

It seems that there are two possible ways to determine whether or not a verb is intransitive. One approach concerns the behavior of the verb in passive construction (Teramura 1982). It does not require mention of the number of arguments that the verb takes. On the other hand, the other approach (Miyagawa 1989a) discusses the number of the argument; if the verb in question takes one argument, it is an intransitive verb, and if two arguments, it is a transitive verb. Further, this latter approach suggests that if the NP marked by *ni* is an adjunct, the NP cannot be the internal argument of the verb; it should be governed by the S node. These verbs taking *ni*-marked NPs are classified as intransitive verbs so that they can occupy intransitive slots in appropriate PDS structures.

Because Miyagawa's NQ test is not applicable in certain cases, another test should be proposed. However, the first approach, which neglects the number of arguments, cannot be incorporated in Miyagawa's approach because his PDS Hypothesis depends on the argument structure of a verb. For example, Teramura suggests passivization as a test to distinguish transitive, intransitive, and *shodooshi* (1982). He argues that Japanese transitive verbs can participate in both direct and indirect passive construction, but intransitive are limited only to indirect passive. *Shodooshi* are the verbs which do not participate in either of these two passive constructions. Observe the following examples:

- (8) a. Nobita wa Isono-ke ni 20 nen tsukae-ta.
TOP. the Isonos NI 20 years serve-PST.
'Nobita served/worked for the Isonos for 20 years.'
- b. ?Isono-ke wa (Nobita ni) 20 nen tsukae-rare-ta.
the Isonos TOP. by 20 years serve-PASS.-PAST.
'The Isonos were served/ worked for by Nobita.'
- c. *Watashi wa Nobita ni Isono-ke ni 20 nen tsukae-rare-ta.
I TOP. by the Isonos NI 20 years serve-PASS.-PAST
'I was adversely affected by Nobita's serving the Isonos.'
- (9) a. Nobita wa benkyoo ni hagen-da. 'Nobita studied hard.'
TOP. study NI work hard-PAST.
- b. *Benkyoo wa (Nobita ni) hagem-are-ta.
TOP. by work hard-PASS.-PST.
'The study was worked hard (by Nobita).'
- c. ?Wanio wa Nobita ni benkyoo ni hagem-are-ta.
TOP. by study NI work hard-PASS.-PST.
'Wanio was adversely affected by hard-working Nobita.'

The unacceptability of direct and indirect passive sentences suggests that these verbs belong to the *shodooshi* category. However, in Miyagwa's framework, this test is not adequate; one must still determine whether or not the *ni*-marked NPs are adjuncts.

It is known that there is a behavioral distinction between the adjunct NPs and argument NPs. In Japanese, the former NPs are marked with semantic cases such as *kara* 'from', *de* 'with', *to* 'with', and *e* 'to'. The latter NPs serve as necessary constituents in a sentence, and they are marked with grammatical cases such as *ga* (nominative), *o* (accusative), and *ni* (dative). Those grammatical cases can be omitted in a spoken language, but the semantic cases cannot (Moriyama 1986; Teramura 1982; Watanabe 1971, 1974):

(10: grammatical cases)

- a. Sarukichi (ga) Tookyoo e itta. 'Sarukichi went to Tokyo.'
NOM. Tokyo DIR. went
- b. Sarukichi ga budoo (o) tabeta. 'Sarukichi ate grapes.'
NOM. grapes ACC. ate
- c. Boku, hanasu yo. (cf. Boku ga kimi ni hanasu yo.)
I speak PRT. I NOM. you DAT. speak PRT.
'I speak to you.'

(11: semantic cases)

- a. Sarukichi ga Tokyoo (e) itta. 'Sarukichi went to Tokyo.'
 NOM. Tokyo DIR. went
- b. *Sarukichi ga Wanio (to) asonda. 'Sarukichi played with Wanio.'
 NOM. COM. played
- c. *Ginko ga Tokyoo (kara) kita. 'Ginko came from Tokyo.'
 NOM. Tokyo ABL. came
- d. *Ginko ga toshokan (de) benkyooshita. 'Ginko studied in the library.'
 NOM. library PL. studied

Thus, if the marker *ni* in question cannot be omitted in an utterance, it can prove that the phrase in question is an adjunct; the verbs taking these dative NPs are said to be intransitive verbs. The following examples show that this is the case:

- (12) a. ??Wanio ga kitoku joutai __ ochiitta.
 NOM. critical condition fell in
 'Wanio fell into a critical condition.'
- b. ??Wanio ga sensei __ somuita. 'Wanio disobeyed the teacher.'
 NOM. teacher disobeyed
- c. ??Yama ga yuuhi __ haeteiru.
 mountain NOM. sun set shining
 'The mountain is shining in the rays of the setting sun.'

3. Dative objects as internal arguments

Meanwhile, there is another test to examine the behavioral difference between grammatical case markers and semantic case markers. The semantic case particles can participate in a structure N __ *no* N with no difficulty; however, *ga*, *o*, *ni* cannot:

- (13) a. sanji *kara* no honkaigi 'a meeting at 3 o'clock'
 3 o'clock ABL. POSS. meeting (Teramura 1991:19)
- b. chichi *e* no dengon 'a message to my father'
 father DIR. POSS. message (Teramura 1991: 19)
- c. kurasumeeto *to* no tooron 'discussion with classmates'
 classmate COM. POSS. discussion (Watanabe 1974: 59)
- (14) a. *boku *ga* no hanashi
 I NOM. POSS. story (Watanabe 1974: 60)
- b. *kono hon *o* no tsuudoku
 this book ACC. POSS. reading through (Watanabe 1974: 61)

- c. *kare *ni* no hanashi
 he DAT. POSS. story

Thus, if it can be shown that the *ni*-marker in question behaves like the grammatical case markers such as *ga*, *o*, and *ni* in (14), it can be said that the *ni*-marked NPs are arguments but not adjuncts. The following examples suggest that this is the case:

- (15) a. *shiwase *ni* no hitari
 happiness NI PASS. immersion
 b. *taifuu *ni* no sonae
 typhoon NI POSS. preparation
 c. *byooki *ni* no rikan
 sickness NI POSS. contract

This observation suggests that the *ni*-marked NP, such as *benkyoo ni* in *benkyoo ni hagemu* 'study hard', is an argument; thus, the verbs in question are classified as transitive verbs. However, as demonstrated above, there is an evidence to support that such an NP is an adjunct (cf. the passivization indicating that they are kinds of intransitive verbs, *shodooshi*). Miyagawa's framework does not acknowledge such cases in which one NP has double status, i.e. argument and adjunct. The former is assigned its case and theta role from the verb, and the latter forms a postpositional phrase in which the noun can have the theta role from the postposition.

4. Discussion

In addition to the above observation, these *ni*-marked objects' behavior that is different from arguments/adjuncts should be noted. Regarding relativization, arguments and adjuncts are equally capable of serving as the head of a relative clause. Observe the following examples:

- (16) a. [Wanio ga ____ katta] hon 'the book which Wanio bought'
 NOM. bought book
 b. [Wanio ga ____ ronbun o okutta] jaanaru
 NOM. article ACC. sent journal
 'the journal to which Wanio sent an article'
 c. [Wanio ga ____ kita] mura 'the village from which Wanio came'
 NOM. came village
 d. [Wanio ga ____ itta] daigaku 'the university to which Wanio went'
 NOM. went university
 e. [Wanio ga ____ (isshoni) asonda] tomodachi
 NOM. together played friends

'the friends with whom Wanio played'

The above examples show that relativization can be applicable equally to both arguments (accusative and dative NPs) and adjuncts (direction, ablative and comitative NPs). Observe the following examples:

- (17) a. Wanio ga benkyoo ni hagenda. 'Wanio studied hard'
 NOM. study NI worked hard
 b. *[Wanio ga ____ hagenda] benkyoo
 NOM. worked hard study
 'the study on which Wanio worked very hard'
- (18) a. Wanio ga kitoku jootai ni ochiitta.
 NOM. critical condition NI fell in
 'Wanio fell into a critical condition.'
 b. *[Wanio ga ____ ochiitta] kitoku jootai
 NOM. fell in critical condition
 'the critical condition into which Wanio fell'
- (19) a. Ginko wa taifuu ni sonaeta. 'Ginko prepared for a typhoon.'
 TOP. typhoon NI prepared
 b. *[Ginko ga ____ sonaeta] taifuu
 NOM. prepared typhoon
 'the typhoon for which Ginko prepared'

These unacceptable relative clauses indicate that these *ni*-marked NPs behave like neither arguments nor adjuncts.

If the point of discussion is on the case assignment, as Moriyama (1986) suggests, such a marker can be treated as an idiosyncratic feature of each verb. However, what has been focused on in this paper is that, as far as Miyagawa's hypothesis is concerned, (i) there is a claim that intransitive and transitive verbs can be distinguished by the number of the argument that verbs take, (ii) in order to do so, NQ test has been proposed, and (iii) such a distinction is presupposed in the PDS Hypothesis, which claims that verbs are classified in the permanent lexicon according to their transitivity status.

It has been observed that indeterminacy of the status of verbs raises a serious issue for Miyagawa's framework. The more serious problem arises concerning *ni*-marked NP when the obvious intransitive verb takes such a complement. For example, the verb *nak-* 'cry' has been considered as one of the absolute intransitive verbs which do not have corresponding transitive verbs. In the following example, the subject sufficiently satisfies the valency of the verb:

- (20) Kanaa wa nai-ta. 'Kanaa cried.'
 TOP. cry-PST

The transitive slot of the PDS of *nak-* 'cry/weep', then, can be filled with its causative form, *nak-ase-* 'cause to cry/weep':

PDS		
Intransitive	Transitive	Ditransitive
<i>nak-</i> 'cry/weep'	<i>nak-ase-</i> 'cause to cry/weep'	

However, *nak-* 'cry/weep' can combine with a *ni*-marked NP as the following examples show:

- (21) Kanaa wa sono shirase ni nai-ta.
 TOP. the news NI weep-PST.
 'Kanaa wept at the news.'

What should be noted is that such a *ni*-NP is not ignored as an adjunct. Again, the particle *ni* cannot be omitted in spoken Japanese:

- (22) *Kanaa wa sono shirase __ nai-ta. '(intended meaning =(21)'
 TOP. the news weep-PST

Relativization is also impossible:

- (23) ??[Kanaa ga naita] (sono) shirase
 NOM. weep-PST. the news

As mentioned above, the causative form of the verb can enter the transitive slot; however, the causative verb *nak-ase-* cannot be used as follows:

- (24) ??Jiraa wa Kanaa o sono shirase ni nak-ase-ta.
 TOP. ACC. the news NI weep-CAUS.-PST.
 '(intended meaning =) Jiraa caused Kanaa to weep at the news'

What is realized here is that the derived morphologically complex form, *nak-ase-*, which is registered in the permanent lexicon, cannot occur with the *ni*-NP. One might suggest, then, because the verb *nak-* 'cry/weep' (cf. (20)) does not have a figurative meaning, another PDS for *nak-* (cf. (21)) can be suggested. If so, s/he is saying that there are two phonologically, morphologically, and semantically similar verbs. Let us call these two verbs *nak-1* and *nak-2*, where the only the latter take the *ni*-marked NP. However, it will soon be noticed that such distinction does not help the situation; the blocking device (cf. Aronoff 1976) does not prevent the causative form of *nak-ase-2* from getting in the transitive slot:

PDS		
Intransitive	Transitive	Ditransitive
<i>nak-2</i>	<i>nak-ase-2</i>	

The PDS of *nak-2* allows the existence of the causative verb *nak-ase-* whose meaning corresponds

- b. Nakandakari-san ga benkyoo ni hagenda.
 NOM. study NI work hard
 'Mr. Nakandakari studied hard.'

(26) shows that *hagem-* 'work hard' does not correspond to *hagemas-* 'encourage'. Although (27b) is an acceptable sentence, the corresponding transitive sentence (27a) is not. Because of this asymmetrical relationship, there is no reason for them to be in the same PDS. Thus, the situation of *hagem-* 'work hard' is identical with that of the intransitive *nak-* 'cry/weep' taking *ni*-NP. The following sentence confirms that a 'vacant slot' problem arises in this case as well:

- (28) ??Gakiya-san wa Nakandakari-san o benkyoo ni hagem-ase-ta.
 TOP. ACC. study NI work hard-CAUS.-PST.
 '(intended meaning =) (27a))'

PDS

Intransitive	Transitive	Ditransitive
<i>hagem-</i> 'work hard'	* <i>hagem-ase-</i>	

Nonoccurrence of *hagem-ase-* cannot be explicated in the framework because there is no means to block such an item.

5. Summary and conclusion

The status of the verbs taking *ni*-NPs has been discussed, and the following points have been clarified. First, Miyagawa's Numeral Quantifier test does not work on the *ni*-NPs. Second, these *ni*-NPs are close to arguments in one sense, and at the same time they are similar to adjuncts. Third, as far as relativization is concerned, these NPs show different characteristics from arguments and adjuncts. Fourth, such indeterminacy of certain NPs creates serious problems for Miyagawa's framework, in which the verbs are supposed to be classified according to the number of arguments that they take. Fifth, even if the verbs taking *ni*-NPs can get into one of the three PDS slots, they cause a problem because they do not have corresponding causative forms; Miyagawa's blocking device cannot prevent non-occurring causatives from occupying the PDS slot.

As long as one deals with 'typical' intransitives and transitives, the points discussed above tend to be overlooked. Even noting such cases, they are set aside as 'exceptions'. However, as Kinjo (1994) observes, Miyagawa's PDS Hypothesis has other 'exceptions' as well. Miyagawa's hypothesis needs extensive reorganization including cases such as those discussed in this paper. Or, because it seems that all the problems arise from his assumptions that (i) all NPs are either arguments or adjuncts, and that (ii) Japanese verbs can be classified according to the number of arguments that they can take, such assumptions should be modified.

* I wish to thank the two judges for helpful suggestions and critical comments. But responsibility for the text rests entirely upon the author.

Notes

1 This hypothesis has been proposed in order to capture "what kind of relation the morphologically complex verbs have to the morphologically simple verbs in the lexicon" (1989a: 116). His basic assumptions are: (1) "a PDS has three slots: intransitive, transitive, and ditransitive", (2) "only one lexical item can occupy a particular slot; the existence of a lexical item in a slot blocks another lexical item that would otherwise occupy that slot" (1989a: 117-118), and (3) "[b]efore any morphological derivation takes place, all PDS slots that are filled have verb stems" (ibid.). Further, he says, "... the true function of the PDS is to serve as a filter for the permanent lexicon. Once a lexical item successfully passes the PDS-filter by fitting into a slot, it receives permanent entry into the lexicon. In contrast, lexical items that are blocked do not receive such an entry" (1989a: 119). We will observe some cases where the blocking device does not explain the nonoccurrence of certain lexical items.

2 The distribution of arguments is governed by potentially idiosyncratic specifications on verbs (e.g. a subject and an object are the arguments of *koros*- 'kill'). On the other hand, adjuncts appear whenever they would be semantically appropriate (e.g. *koros*- 'kill' does not require *kooen de* 'at a park' as an argument; thus, it is regarded as an adjunct).

3 This point needs further clarification. NQ is proposed as a test to distinguish arguments from adjuncts. He says, "any NP internal to the VP that can function as the antecedent [of the NQ] is an argument of the verb" (1989a: 36). Because the subject and direct object of NPs equally serve as the antecedent of the NQ, these two NPs are considered arguments of the verb. The following examples and explanations are from Miyagawa (1989a: 36):

"... the NP marked with *ni* is an argument for verbs *au* 'meet' and *ataru* 'inquire', the following examples show that the Goal NP, marked with *ni* for the verbs *iku* 'go' and *kuru* 'come', is not an argument for these verbs; hence it is an adjunct.

*Kodomotachi wa kooen ni 2-tsu itta.

'The children went to two parks.'

*Kyonen, Hanako wa paatii ni 3-tsu kita.

'Last year, Hanako came to three parties.'"

4 Although *2-do* or *2-kai* can be used in place of *2-tsu*, this misses the point. The point is whether the noun *kitoku joutai* is countable or not. *2-do*, if used, indicates the frequency of the event.

5 I would like to thank one of the judges for calling my attention to the fact that (27a) can be acceptable if *benkyoo ni* is replaced with *benkyoo suru yooni*. However, it seems that *yooni* functions as one unit -- it cannot be decomposed into *yoo* plus *ni*. The following sentences show that *yoo* cannot be deleted:

- (i) a. Watashi wa shachoo no iu yooni shita. 'I did as the president told me.'
- b. *Watashi wa shachoo no iu ni shita.

References

- Aronoff, Mark. 1976. *Word Formation in Generative Grammar*. Cambridge, Mass.: The MIT Press.
- Kinjo, Katsuya. 1994. A Reexamination of Miyagawa's PDS Hypothesis: Organization of Verbs in Japanese Lexicon. University of California at Berkeley, ms.
- Miyagawa, Shigeru. 1984. Blocking and Japanese causative. *Lingua* 64, 177-207.
- Miyagawa, Shigeru. 1989a. *Syntax and Semantics 22: Structure and Case Marking in Japanese*. San Diego: Academic Press.
- Miyagawa, Shigeru. 1989b. Shiekikei to goibumon. In S. Kuno and M. Shibatani (eds.) *Nihongogaku no Shintenkai*. Tokyo: Kuroshio Shuppan, 187-211.
- Moriyama, Takuro. 1986. *Nihongo Doshi Jutsugobun no Kenkyu*. Tokyo: Meiji Shoin.
- Teramura, Hideo. 1982. *Nihongo no Shintakusu to Imi I*. Tokyo: Kuroshio Shuppan.
- Watanabe, Minoru. 1971. *Kokugo Kobunron*. Tokyo: Shima Shobo.
- Watanabe, Minoru. 1974. *Kokugo Bunporon*. Tokyo: Kasama Shoin.

論文要旨

アーギュメントにもアジャンクトにもならない目的語

～宮川のPDS仮説の再検討～

金城 克哉

宮川はその一連の研究論文(1984, 1989a, 1989b)の中でPDS仮説というレキシコンの中での動詞相互の関係についての重要な提案をしている。これは簡単に言えば、三つの動詞、自動詞、他動詞、二重動詞(目的語が二つ必要なもの)があって、それらが形態的、意味的に関係があると認められれば一つのPDSという「枠」に収まり、それはPermanent lexiconに登録されるというものである。特徴として、派生語の使役動詞も「空き」があれば枠の中に収められるということが挙げられている。

この論文ではまず、宮川の仮説の基礎となっている動詞の分類に焦点を絞り、目的語として「に」を取る動詞を検討し、これら一群の動詞は宮川の基準では自動詞にも他動詞にも分類され得ないことを指摘する。次に多義語動詞に焦点を移し、宮川の提唱する「一つの動詞は必ず一つのPDSにしか属さない」という仮説(の一部)は動詞の多義的用法、特にアーギュメントの数が増える場合には成り立たないことを論じる。代案を提出することはここではできないが、どんな情報をレキシコンに入れるのか、それらは互いに関連づけることができるのか、多義的な語(多くはそうであるが)はどう扱うのか等、どの理論的枠組みでも考えなければならない点である。