

**A Reexamination of the Cross-linguistic Parameterization  
of Causative Predicates: Japanese perspectives**

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base patient in Type I can be a passive subject depends on whether the language does or does not allow a secondary object to be a passive subject. If the language is an object-symmetrical language (Bresnan & Moshi 1990), in which both direct and indirect object of ditransitive verbs (i.e., two patient or patient-like arguments) can be [-r] and become a passive subject, the base patient can indeed be a passive subject in Type I causatives. If it is an object-asymmetrical language, in which only an indirect object can be [-r] and become a passive subject, the base patient cannot be a passive subject. By comparing Chichewa and Kichaga, Alsina (1992) argues that this independently motivated parameter of object symmetry predicts whether a base patient in Type I causatives can be a passive subject.

There are, however, some causative phenomena that are not accounted for in this theory. First, the mappings of arguments onto functions given in (1) do not seem to be the only possibilities that are found with Type I and Type II argument fusion. Butt, Dalrymple & Frank (1997) point out that in one type of French causative which Alsina identifies as Type I, the causee is in fact mapped onto OBJ $\theta$ , and the base patient onto OBJ. Alsina & Joshi (1991) themselves recognize another mapping pattern for Type II causatives. In the causativization of “ingestive” verbs (Masica 1976), the base agent is mapped onto OBJ and the base patient onto OBJ $\theta$ , in a way superficially similar to Type I (see sec. 5.3 below).

Second, some have also argued that causatives differ along another dimension of variation, namely functional and/or argument structure complexity (Frank 1996, Matsumoto 1996, Zaenen & Dalrymple 1996). Building on the work of Zubizarreta (1987), Rosen (1989), and others, Frank (1996) argues that French and Italian causatives differ in the complexity of a-structure, namely, French causatives have a complex, biclausal a-structure, while Italian causatives have a simplex or monoclausal a-structure.<sup>1</sup> In my work I have also argued that such variation in complexity exists within a single language, namely Japanese; morphological causatives in this language are generally biclausal at a-structure, but are in some cases biclausal at f-structure as well (Matsumoto 1996).

In this paper I will discuss this additional parameter of structural complexity in causative predicates by taking a closer look at Japanese morphological causatives.

### 3. Japanese Causatives and the Type II *Sase* Causatives

#### 3.1. Types of Morphological Causatives in Japanese

The typical morphological causative in Japanese involving *sase* is exemplified in (2).

- (2) Jon wa    Biru ni    soba o                    tabe-sase-ta.  
 John Top Bill Dat    soba.noodles Acc    eat-Caus-Past  
 ‘John made/let Bill eat soba noodles.’

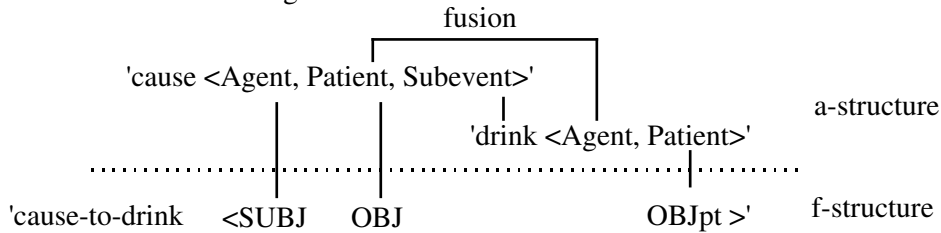
It has long been noted that sentences like this exhibit certain biclausal properties. In order to account for this, various proposals have been made in which biclausality is expressed in some level of representation. Early transformationalists, for example, posited biclausal Deep Structure (and monoclausal Surface Structure) (see Kuno 1973, 1983, Shibatani 1976, etc.; cf. Miyagawa 1980). In LFG, Ishikawa (1985) argued that Japanese morphological causatives create biclausal f-structure, in which the base verb heads the XCOMP of the causative (see Manning, Sag & Iida 1996 for a proposal in HPSG).

In my own work, I have argued that morphological causatives differ in their biclausal properties according to their subtypes (Matsumoto 1996), as mentioned briefly above. As observed by

<sup>1</sup> This analysis appears to embody a few problems, however. One type of evidence that Frank uses for her analysis is passivization. In French, it is not possible to passivize causatives with the base patient as a passive subject, even though this is potentially possible, given the nature of object in this language. Frank attributes this to the complex nature of argument structure: passivization applies to each of its substructures. However, it is not clear to me why this is the case, given that in her analysis the complex a-structure is mapped onto a simplex f-structure. (Note that the impossibility of such passivization in permissive causatives in Japanese is related to biclausality at the level of f-structure; see below.) In addition, the causee of (Type I) Italian causatives is known to exhibit certain subject properties (Burzio 1986:262-268), which cannot be accounted for if argument structure is monoclausal.



## d. coercive inducing causatives



In the case of explicit and implicit permissive causatives and persuasive conducting causatives, the subject of the embedded clause is functionally controlled by the object of the upper clause (explicit permissive causatives and persuasive inducing causatives involve control (*equi*) and implicit permissive causatives involve raising). In the case of coercive causatives, the logical subject of the embedded clause is linked to the patient of the upper clause by argument “fusion” in a-structure.

### 3.2. The Type II *Sase* Causatives

These are not, however, all the variations that can be seen in causatives in Japanese; there is in fact another subtype that has previously gone unnoticed. I will show that this subtype, which I will call Type II *sase* causatives, is 1) semantically Type II, and 2) syntactically purely monoclausal, at both f- and a- structure. In this respect this type presents a further variation on the complexity of f- and a-structures exhibited by causatives in Japanese.

This causative reading is available when certain transitive verbs are morphologically causativized with *sase*. Two examples are given in (5).

- (5) a. Hahaoya wa akachan ni kutsushita o hak-ase-ta.  
 mother Top baby Dat socks Acc put.on-Caus-Past  
 ‘The mother put the socks on the baby’s feet.’
- b. Hahaoya wa akachan ni miruku o nom-ase-ta.  
 mother Top baby Dat milk Acc drink-Caus-Past  
 ‘The mother fed the baby with milk (in a bottle).’

The base verb *hak(u)* ‘put on’ in (5a) refers to the action of putting a clothing item on one’s own lower body. The causative form *hak-ase(-ru)* in its Type II causative reading in (5a) represents the causer’s action on the clothing item to the effect that someone else can have it on his or her lower body. (This means that *hak(-u)* means ‘put something on your own lower body’ while *hak-ase(-ru)* means ‘put something on someone else’s lower body’; note that English *put on* is misleadingly ambiguous in this regard.) In (5b), *nom-ase(-ru)*, with the base verb *nom(-u)* ‘drink’, is used to mean ‘feed’ or ‘give a drink to’.<sup>2</sup> (These sentences potentially have regular permissive and inducing causation readings as well. However, given that a baby is not independently capable of the caused or permitted actions described, such readings are pragmatically unnatural. The only natural reading one can get is that considered here.)

The semantics of these sentences is that of Alsina’s Type II. In (5a), for example, the mother acts on the socks to achieve the intended effect, so that the caused event can be accomplished without the action of the base agent. Note, however, that unlike what Alsina claims with regard to Type II causatives, the base subject in this causative is not an oblique. I will come back to this point later.

This type of *-sase* causative is only possible with a restricted set of transitive base verbs, which are listed in (6).

<sup>2</sup> One peculiar fact about these examples is that the dative-marked NP is non-agentive. It is possible to have an inanimate entity like a doll as a dative NP in (5a); thus the base “agent” is not really an agent. This constitutes a major counterexample to the otherwise solid generalization that dative marking in Japanese causatives is allowed only on an agent (Tonoike 1978, Dubinsky 1994).

(6) transitive base verbs <i>hak(-u)</i> ‘put ... on one’s own lower body’ <i>tabe(-ru)</i> ‘eat’ <i>nom(-u)</i> ‘drink’ <i>shir(-u)</i> ‘come to know’ <i>kik(-u)</i> ‘hear’ <i>mot(-u)</i> ‘come to have’	causativized verbs <i>hak-ase(-ru)</i> ‘put ... on someone else’s lower body’ <i>tabe-sase(-ru)</i> ‘make ... eat, feed’ <i>nom-ase(-ru)</i> ‘make ... drink, feed’ <i>shir-ase(-ru)</i> ‘let ... know, inform’ <i>kik-ase(-ru)</i> ‘let ... hear, tell’ <i>mot-ase(-ru)</i> ‘make ... have, put in the hand of’
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These base verbs all represent “self-directed” processes —an action conducted with the agent himself as the recipient or beneficiary of a moved entity or influence. The Type II *sase* causatives of these verbs represent the causation of such self-directed action by the causer acting on the base patient. This means that in Type II *sase* causatives, the base subject is not so much the agent of the caused action as the recipient of the causer’s action. Thus the semantic structure of Type II *sase* causatives can be represented as something like (7a) or perhaps (7b), structures similar to those which have been proposed for ditransitive verbs in English.

- (7) a. Cause <Actor, Acted-upon, Result>
- 
- b. Cause <Actor, Acted-upon, Result>
- 

#### 4. Evidence for the Purely Monoclausal Nature of Type II *Sase* Causatives

Evidence suggests that Type II *sase* causatives are monoclausal in both functional and argument structure. That is, *nom-ase(-ru)* (drink-Caus) ‘feed’ in this reading has the a-structure and f-structure given in (8).

- (8) Type II *sase* causatives
- |                                    |             |
|------------------------------------|-------------|
| 'feed <Agent, Recipient, Patient>' | a-structure |
| ..... ..... ..... .....            |             |
| 'feed <SUBJ OBJ OBJpt>'            | f-structure |

Note that in this a-structure the base verb does not have any argument structure of its own and its ‘subject’ does not function as a logical subject of any predicate, let alone a grammatical subject.

In what follows, I will present evidence for this analysis in comparison to implicit permissive causatives and coercive causatives. (The other two subtypes will be ignored here for simplicity of presentation.) Relevant evidence comes from honorific marking, passivization, pronominal binding, control, and adjunct interpretation.<sup>3</sup>

##### 4.1. Subject Honorification

The best diagnostic for identifying grammatical subjects in Japanese is subject honorification, a phenomenon in which a certain marking on the verb indicates the speaker’s sense of respect toward the grammatical subject of the verb. Consider how the periphrastic honorific form *o-V ni nar(-u)* can be used on the base verb. In (9) the same causative form *hak-ase(-ru)* is used in three different sentences, each having only one of the three readings examined here. (9a) is an example of implicit permissive causative with honorific marking on the base verb, disambiguated by means of embedding in the *-te oku* construction; this construction, which marks the anticipation of some non-immediate, future effect of the action (see Ono 1992), is compatible only with permissive causative readings. As

<sup>3</sup> I will not use reflexive *jibun* as a test for the subjecthood of a causee NP. See Iida (1996) for non-grammatical factors involved in *jibun* binding.

shown, this permissive causative does allow the base verb to have honorific marking (Kuno 1987), suggesting that the base subject in this case is a grammatical subject. This is not possible (or at least very strained) with coercive causatives, as in (9b).<sup>4</sup> In the Type II *sase* causative reading in (9c), such honorification is completely ruled out.

(9) a. PERMISSIVE CAUSATIVE

Karera wa ooji ni sono kutsushita o o-haki ni nar-asete oki-mashi-ta.  
 they Top prince Dat the socks Acc H-put.on Cop become put-Pol-Past  
 ‘They let the prince (continue to) put the socks on his feet.’

b. COERCIVE CAUSATIVE

?Karera wa muriyari ooji ni sono kutsushita o  
 they Top forcibly prince Dat the socks Acc  
 o-haki ni nar-ase-mashi-ta.  
 H-put.on Cop become-Caus-Pol-Past  
 ‘They forcibly made the Prince put the socks on his feet.’

c. TYPE II *SASE* CAUSATIVE

\*Karera wa mada sankagetsu no ooji ni sono kutsushita o  
 they Top yet three.month Cop prince Dat the socks Acc  
 o-haki ni nar-ase-mashi-ta.  
 H-put.on Cop become-Caus-Pol-Past  
 ‘They put the socks on the three-month-old Prince’s feet.’ (intended)

#### 4.2. Passivization

Consider next the question of passivizability. It has often been claimed that the object of the base verb cannot become the passive subject when the whole causative verb is passivized. This has been related to the biclausality of morphological causatives (e.g., Inoue 1976, Marantz 1984). However, Ishikawa (1985) observes that some speakers do accept certain passivized causative sentences with the base object as passive subject. (10) is such an example, slightly modified from Ishikawa (1985). This sentence can be regarded as a case of coercive causative.

(10) ?[PRO Fukei o kanshin s-aseru tame] totemo muzukashii  
 parents Acc admire-Caus purpose particularly difficult  
 ji ga (kodomo-tachi ni) kak-ase-rare-ta.  
 letter Nom child-Pl Dat write-Caus-Pass-Past  
 ‘In order to impress parents, particularly difficult (Chinese) characters were made [i.e., by the teacher] to be written (by the children).’

Significantly, Type II *sase* causatives even more clearly allow the base object (as well as base subject) to be the passive subject, just as regular ditransitive verbs do in Japanese. Examples are given in (11). This again argues for monoclausality.

(11) a. Sono rinyuu-shoku wa mada dono akachan ni mo tabe-sase-rarete i-nai.  
 the baby.food Top yet any baby Dat too eat-Caus-Pass Asp-Neg  
 ‘The baby food has not yet been given to feed any child.’  
 b. Sono akachan wa mada dono rinyuu-shoku o tabe-sase-rare-ta.  
 the baby Top yet any baby.food Acc eat-Caus-Pass-Past  
 ‘The baby has not been fed with any baby food.’

This means that the arguments of both the causative morpheme and the base verb map onto

<sup>4</sup> One might be inclined to attribute the unacceptability of sentences like (9b) to a pragmatic factor: it is pragmatically unlikely that someone would force a person one respects to do something. This account appears to be based on an incorrect assumption on subject honorification. Subject honorification reflects the sense of respect felt by *the speaker of the sentence* toward the subject of the verb, and there should be nothing strange about someone forcing a person the speaker respects to do something.

grammatical functions of a single predicate in f-structure.

### 4.3. Pronominal Binding

The next argument comes from pronominal interpretation. The pronoun *kare* ‘he’ must be referentially disjoint from its clausemate in f-structure. Applying this test to causatives in Japanese, Kitagawa (1986) observes that *kare* may be bound by the subject but must be disjoint in reference with the causee. This is certainly clear for permissive causatives, as in (12a). However, a different pattern can be found in coercive causatives, as in (12b), and more clearly in Type II *sase* causatives, as in (12c), in a way compatible with the present account. The reflexive form *karejishin* ‘himself’, in contrast, must be bound within its clause. This reflexive exhibits behavior complementary to *kare*, as shown.

- (12) a. Taro<sub>i</sub> wa Jiroo<sub>j</sub> ni sonomama kare<sub>i,\*j</sub> / karejishin<sub>i,j</sub> o bengo s-asete oi-ta  
 Taro Top Jiro Dat as.it.is he/himself Acc defend do-Caus put-Past  
 “Taro appears to let Jiro continue to defend him(self).”
- b. Taro<sub>i</sub> wa Jiroo<sub>j</sub> ni muriyari kare<sub>i,\*j</sub> / karejishin<sub>i,j</sub> o bengo sase-ta.  
 Taro Top Jiro Dat forcibly he/himself Acc defend do-Caus put-Past  
 “Taro appears to let Jiro continue to defend him(self).”
- c. Anpanman<sub>i</sub> wa akachan ni kare<sub>i,\*j</sub>/karejishin<sub>i</sub> o tabe-sase-ta.  
 Anpanman Top baby DAT he/himself Acc eat-Caus-Past  
 “Anpanman gave his own body to (feed) the baby.”<sup>5</sup>

### 4.4. Control

There are also a few pieces of evidence for monoclausal a-structure. First, the pattern of control suggests that the “subject” of the base verb in Type II causative reading does not have the status of logical subject. The subject of certain adverbial control clauses can be controlled by either grammatical or logical main-clause subject in Japanese. This is the case with *-nagara* ‘while’ clauses. In permissive and coercive causatives the base subject can be the controller of the subject of *nagara* clauses, as illustrated in (13a) and (13b). In Type II *sase* causatives, on the other hand, the base subject cannot be the controller, as shown in (13c). (The causer in (13a) is not a fully acceptable controller, probably due to some pragmatic factor.)

- (13) a. PERMISSIVE CAUSATIVE  
 Jon<sub>i</sub> wa sono koj ni [PRO<sub>i,j</sub> terebi o mi-nagara ] kutsushita o  
 John Top the child Dat television Acc watch-while socks Acc  
 hak-asete oi-ta  
 put.on-Caus put-Past  
 ‘John let the child put on the socks, watching TV.’
- b. COERCIVE CAUSATIVE  
 Jon<sub>i</sub> wa muriyari sono koj ni [PRO<sub>i,j</sub> terebi o mi-nagara]  
 John Top forcibly the child Dat television Acc watch-while  
 sono kutsushita o hak-ase-ta.  
 the socks Acc put.on-Caus-Past  
 ‘John forcibly made the child put on his socks, watching TV.’
- c. TYPE II SASE CAUSATIVE  
 Jon<sub>i</sub> wa sono netakiri no roojin<sub>j</sub> ni  
 John Top the confined.to.bed old.man Dat  
 [PRO<sub>i,\*j</sub> terebi o mi-nagara] sono kutsushita o hak-ase-ta.  
 television Acc watch-while the socks Acc put.on-Caus-Past  
 ‘Watching TV, John put the socks on the feet of the old man confined to bed.’

<sup>5</sup> Anpanman is a benevolent comic character made of bread, who sacrifices himself for hungry people.



#### 4.5. Adjunct Interpretation

The status of Type II *sase* causatives is also clarified by considering the interpretation of adjuncts with respect to their base verb. Japanese causatives differ in the range of adjuncts that can modify the base verb and in their positions in the sentence (Matsumoto 1996). In this section I will look at a specific type of adjunct in a specific position in causative sentences.

As observed by Jackendoff (1972), English (psychological) manner adverbials like *reluctantly* and *happily* can be interpreted with respect to either grammatical or logical subject when placed in preverbal position. This is also the case with Japanese, as shown in (14), in which either John or Mary is happy or reluctant.

- (14) Jon wa Marii ni {shibushibu/ooyorokobi de} kisu s-are-ta.  
 John Top Mary by reluctantly/happily kiss do-Pass-Past  
 ‘John was {reluctantly/happily} kissed by Mary.’ (either John or Mary is reluctant or happy)

Now, in permissive causatives these adverbials can be interpreted with respect to the base subject, as in (15a), in which either John or the child is happy. The same is true of coercive causatives in (15b). However, this is not the case with Type II *sase* causatives in (15c), in which only John can be happy.

(15) a. PERMISSIVE CAUSATIVE

Jon wa sono ko ni sono kutsushita o ooyorokobi de hak-asete oi-ta.  
 John Top the child Dat the socks Acc happily put.on-Caus put-Past  
 ‘John let the child put on his socks(,) happily.’

b. COERCIVE CAUSATIVE

Jon wa muriyari sono ko ni sono kutsushita o ooyorokobi de hak-ase-ta.  
 John Top forcibly the child Dat the socks Acc happily put.on-Caus-Past  
 ‘John forcibly made the child put on his socks(,) happily.’

c. TYPE II *SASE* CAUSATIVE

Jon wa sono netakiri no roojin ni sono kutsushita o  
 John Top the confined.to.bed old.man Dat the socks Acc  
 ooyorokobi de hak-ase-ta.  
 happily put.on-Caus-Past  
 ‘John happily put the socks on the feet of the old man confined to bed.’

The aggregate of evidence presented above argues strongly that Type II *sase* causatives are monoclausal in a- and f-structure.<sup>6</sup>

#### 5. Similarity to Ditransitive Lexical Causatives

Given that Type II *sase* causatives are purely monoclausal, they are in this respect no different from lexical ditransitive causatives. The only difference is that they contain the *sase* morpheme, used in regular morphological causatives.

The similarity between Type II *sase* causatives and lexical causatives goes further. The salient point in this regard is that all ditransitive lexical causatives in Japanese are semantically similar to

<sup>6</sup> One question to be explored is whether there are Type II *sase* causatives with intransitive base verbs. In this connection, one might note that some *sase* causatives with intransitive base verbs behave like regular transitive verbs in certain respects. For example, Manning, Sag & Iida 1996 point out that unmarked word order for the arguments of *sak-ase(-ru)* (bloom-Cause) has the order location-theme, as in (i).

- (i) sono ame ga no ni hana o sak-ase-ta  
 the rain Nom field Loc flower Acc bloom-Caus-Past  
 ‘The rain made the flowers bloom in the field.’

As they note, this is unexpected, since the order produced by clausal complementation would have the theme (an argument of the causative morpheme) preceding the locative (an argument of the base verb). This pattern seems to hold for certain nonagentive intransitive base verbs. Phenomena like this must be carefully evaluated to see if these are the case of monoclausal case (see also Aoki 1977).

Type II *sase* causatives. Most lexical causative verbs in Japanese are transitive (i.e., monotransitive), and have morphologically related intransitive non-causative verbs. There are, however, several ditransitive lexical causatives, whose related noncausative counterparts are transitive verbs. All the examples that I have been able to identify are listed in (16) (see also Jacobsen 1992).

- (16) *kise(-ru)* ‘put ... on (someone else’s body), dress’ (cf. *ki(-ru)* ‘put on one’s body’), *abise(-ru)* ‘pour (over ...)’ (cf. *abi(-ru)* ‘be covered with (bathed in)’), *kabuse(-ru)* ‘cover with, put on someone else’s head’ (cf. *kabur(-u)* ‘become covered with, put on one’s own head’), *mise(-ru)* ‘show’ (cf. *mi(-ru)* ‘see’), *oshie(-ru)* ‘teach’ (cf. *osowar(-u)* ‘learn’), *sazuke(-ru)* ‘endow’ (cf. *sazukar(-u)* ‘receive’), *azuke(-ru)* ‘entrust’ (cf. *azukar(-u)* ‘be entrusted’), *tama(-u)* ‘give’ (cf. *tamawar(-u)* ‘receive’), *kas(-u)* ‘lend’ (cf. *kari(-ru)* ‘borrow’), and *ii-tsuke(-ru)* ‘order’ (cf. *ii-tsukar(-u)* ‘be ordered’)

These are all based on transitive verbs representing self-directed actions. In addition, in all of these ditransitive lexical causatives, the causer acts on the patient of the related transitive verb to bring about the result, just as in Type II *sase* causatives. Note that the pair *ki(-ru)* ‘put ... on one’s own upper body’ and *kise(-ru)* ‘put ... on someone else’s upper body’ exactly parallels the pair *hak(-u)* and *hak-ase(-ru)* above.

All ditransitive lexical causatives in Japanese are of this type: there are no ditransitive lexical causatives in which the causer acts on the agentive actor (i.e., Type I association). Further, all transitive lexical causatives can also be regarded as Type II in that only an affected entity not in control of the resulting event can be the object of such a causative (see Alsina & Joshi 1991). Thus, all lexical causatives ((mono)transitive or ditransitive) in Japanese can be regarded as Type II.

## 6. Typology of Causative Predicates

### 6.1. Variation in Structural Complexity of Causatives

What do the above observations suggest for the typology of causative predicates? One implication is the need to recognize more variability across different types of causative predicates in language. Alsina treats all causative formation as argument structure composition, whereby a composite a-structure is mapped onto a simplex f-structure. However, this is not the only option in language. The present study has shown that the complexity of argument and functional structures does seem to vary and has highlighted the necessity and importance of recognizing such variation (see also K.P. Mohanan 1983, Matsumoto 1996).

This point is particularly relevant as regards the treatment of passivization. In Alsina’s analysis the passivization behavior of Japanese causatives is difficult to explain. Alsina argues that Japanese morphological causatives are Type I, and that Japanese is an object-symmetrical language (i.e., both the direct and the indirect object of *atae(-ru)* ‘give’ can be a passive subject). Contrary to his expectations, however, he observes that Japanese does not allow a base patient to be a passive subject, and in order to account for this he invokes the ad hoc solution of imposing a limitation on the activation of the object symmetry parameter (Alsina 1992: note 18).

As observed above, contrary to Alsina’s assumption, Type II *sase* causatives (and to some extent coercive causatives) do allow the patient of the base verb to be a passive subject. In this respect, Alsina’s ad hoc solution is in fact unnecessary as far as these causatives are concerned. However, it remains true that in the permissive causatives the patient of the base verb cannot be a passive subject. This fact remains unexplained in Alsina’s account unless a highly ad hoc limitation to the object symmetry parameter is posited.

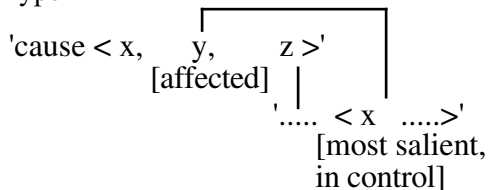
In the present account, the mapping of base patient to passive subject is constrained by two factors: functional structure complexity and object symmetry. Only those causatives whose argument structure is mapped onto monoclausal f-structure and in which a base patient can have [-r] allow the base patient to be passive subject.

### 6.2. Structural Complexity and Association Types

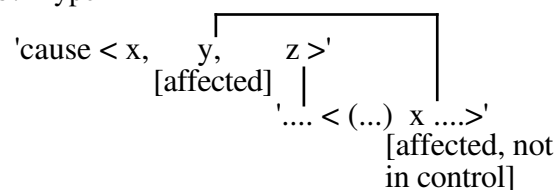
The additional parameter of a- and f-structure complexity interacts in an interesting way with Alsina’s parameter of Type I vs. Type II association. Alsina’s typology of Type I vs. Type II causatives is limited in that it represents a fusion only at the level of a-structure. Given the variation pointed out above, however, his idea can be recast in a structure-neutral way, applicable to any of

functional, argument, or semantic structure. In this view, Type I can be stated as in (17a), and Type II as in (17b). In Type I, the entity affected by the causation is associated with the most salient entity in the embedded structure, an individual in control of the embedded event. This may be a control relationship between an upper OBJ and an embedded SUBJ at f-structure, or the argument fusion of an upper Patient and an embedded logical subject at a-structure. In Type II association, the entity affected by the causation is associated with the entity affected in the embedded structure. This can involve the fusion of upper Patient and embedded Patient at a-structure, or an equivalent semantic association at the semantic level (see (7)).

(17) a. Type I



b. Type II



Japanese presents several different cases in which the various types of association are realized in causatives of different complexity. Permissive causatives in Japanese can be characterized as Type I in the sense that the most salient function in the embedded clause is linked to a particular function of the causative morpheme. Given that such causatives have biclausal a- and f-structure, they can be placed in slot (a) in (18). Coercive causatives also involve Type I association, but with the association now taking place in a-structure. Given that these are biclausal in a-structure but monoclausal in f-structure, such causatives can be classified as case (b) in (18). Type II *sase* causatives and lexical causatives, by contrast, are instances of Type II with the association taking place in semantic structure. This is case (f). There are no examples of cases (c), (d), and (e) in Japanese.<sup>7</sup>

(18)	complexity type			
	a-structure f-structure	biclausal biclausal	biclausal monoclausal	monoclausal monoclausal
association type	Type I	(a) ✓	(b) ✓	(c)
	Type II	(d)	(e)	(f) ✓

Case (e) in (18) can be sought in other languages. In fact, in Alsina's analysis, where only types (b) and (e) exist, Type II causatives in Chichewa, Marathi, and Catalan are all claimed to be of case (e). A close examination of the data, however, suggests that Marathi causatives are in fact case (f). Consider the Marathi causative sentence in (19) (Alsina & Joshi 1991).

(19) sumaa-ni raam-kad5n/\*-laa shaam-laa maarawle.  
 Suma-Erg Ram-by/-Acc Sham-Acc beat-Caus  
 'Suma made Ram beat Sham. (Suma had Sham beaten by Ram.)'

When a transitive verb is causativized, as in (19), the base subject is expressed as an oblique, with the base object appearing as the accusative object of the causativized verb (Alsina & Joshi 1991). Alsina & Joshi claim that this sentence involves Type II association. (Presumably this means that the point of the sentence is to get Sham beaten, with the base subject as an intermediary; see also Saksena 1980, 1982).

Sentence (19) does not seem to have a composite a-structure. T. Mohanan (1988) observes that the base subject in Marathi causatives does not have the status of a logical subject. Consider, for example (20) (Mohanan 1988).

<sup>7</sup> The English *make*-periphrastic causative can be regarded as a further instance of case (a).

- (20) *sumaa<sub>i</sub>-ni raam<sub>j</sub>-kad<sub>5</sub>n shaam<sub>k</sub>-laa [aaplyaa<sub>i</sub>,\*<sub>j</sub>,\*<sub>k</sub> g<sup>har</sup>-aat] maarawle.*  
 Suma-Erg Ram-by Sham-Acc self's home-Loc beat-Caus  
 'Suma<sub>i</sub> made Ram<sub>j</sub> beat Sham<sub>k</sub> in his<sub>i</sub>,\*<sub>j</sub>,\*<sub>k</sub> house.'

The Marathi reflexive *aapan<sub>5</sub>* must be bound by its logical subject (Joshi 1989). In sentence (20) the base subject cannot be the antecedent of *aaplyaa* (genitive form of *aapan<sub>5</sub>*). This means that Marathi causatives are monoclausal in a-structure (Mohanani 1988), like Japanese Type II *sase* causatives. The same can be said of Hindi causatives (Mohanani 1994: 38) and perhaps also of Malayalam and Chichewa Type II causatives, in which no logical subject properties of the base agent have been pointed out in the literature.

The missing case (e) in (18) above does seem to be found in Catalan. Alsina (1996) points out that there are two types of case marking in Catalan periphrastic causatives (as in other Romance languages), one dative and the other oblique, as exemplified in (21).

- (21) a. He fet netejar els lavabos al general  
 I have made clean the toilet to the general  
 'I made the general clean the toilet.'  
 b. He fet netejar els lavabos pel general  
 I have made clean the toilet by the general  
 'I had the toilet cleaned by the general.'

(21a) involves Type I association, and (21b), Type II. (In these cases causative verb and base verb are realized as two different morphological words at c-structure.)

Alsina argues that both of these causative types are functionally monoclausal but biclausal at a-structure. They are functionally monoclausal, he argues, given the patterns observed in quantifier floating. He further points out that the base subject in both (21a) and (21b) can be the controller of an adverbial clause subject, thereby showing that it is a logical subject; thus both of the underlined NPs can be a possible controller of the italicized verbs in the *without* clause in (22a) and (22b).

- (22) a. En Pere els-hi farà *saludar* el professor sense cridar  
 Pere them will make greet the professor without shouting  
 'Pere will make them greet the professor without shouting.'  
 b. En Pere els farà *criticar* (pels seus col·legues)  
 Pere them will make criticize by his colleagues  
 sense dir res a la direcció  
 without saying anything to the management  
 'Pere will have them criticized by his colleagues without telling the management anything.'

The conclusion is that Catalan causatives of the type (21b) do appear to represent case (e) in (18).

(23), an expansion of (18), shows all the attested cases covered in this short review of causatives in various languages.<sup>8</sup>

<sup>8</sup> The typology of causatives can also be conceived in terms of the term/oblique status of the base subject. All Type I causatives have their base subject realized as OBJ (i.e., a term) while Type II causatives allow oblique as well as object base subject. Type II causatives with base subject realized as a term are found in Marathi (causativized ingestive verbs) and Japanese (Type II *sase* causatives). Both of these cases are purely monoclausal, and as far as I know, all cases of Type II causatives with biclausal a-structure and monoclausal f-structure have the base subject realized as oblique. Type II purely monoclausal causatives can also have an oblique base subject, as is the case with causatives of ingestive verbs in Hindi (T. Mohanani, personal communication; see also Saksena 1980, 1982). Given this, the variation in causative predicates can be represented as in (i).

(23)		complexity type		
		a-structure f-structure	biclausal biclausal	biclausal monoclausal
association type	Type I	(a) √	(b) √	(c) *
	Type II	(d) *	(e) √	(f) √

√ attested                      \* unattested

- (a) Japanese permissive causative, English periphrastic causative  
 (b) Japanese coercive causative, Catalan causative with dative base subject  
 (e) Catalan causative with oblique base subject  
 (f) Marathi and Hindi causative, Japanese Type II *sase* causative

I would like to argue that the distribution of attested cases in this table is not accidental, and that the gaps are systematic ones. That is, Type I association does not take place in purely monoclausal causatives (c), and Type II association does not take place in purely biclausal causatives (d).

Why should this be? First, Type II association is not permitted in biclausal f-structure because such association would posit the control of an object, something unsanctioned in grammar.

On the other hand, Type I association is not allowed in purely monoclausal causatives because of a constraint on semantically possible verbs. As a number of linguists have argued, a lexical or purely monoclausal causative cannot be formed that would represent the external causation of a process which is intrinsically internally caused (e.g., by the will of the actor; see Haspelmath 1993, Levin & Rappaport Hovav 1994, 1995, Matsumoto 1996). It has been observed, for example, that there are no lexical causative counterparts of intransitive verbs such as *weep*, *shout*, *rejoice*, etc., which denote processes caused by factors internal to the subject of these intransitive verbs. Such constraints can be subsumed by the Determinative Causation Condition (Matsumoto 1996) stated in (24), which essentially says that in lexical causatives the causer must be the only individual in control of the resulting event.

- (24) In order for an event of causation and its result to be expressed in a lexical meaning, the causing event must be the only crucial cause of the result.

Type I association in a purely monoclausal causative would necessarily result in the violation of constraint (24): the fact that the causer would be acting on the entity in control of the resulting event means that this entity's control would partially determine the result of causation. By contrast, Type II *sase* causatives and ditransitive lexical causatives in Japanese do not violate this constraint because of the semantics of Type II association. In *tabe-sase(-ru)* 'make eat' or 'feed', for example, the causer acts on the food so that the base subject or eater is only the recipient of the action of feeding, not an internal causer of the caused process of eating.

The present typology of causatives can be compared with Baker's (1988) typology of causative predicates. Baker claims that there are basically two types of causatives, reflecting the two ways the base verb can be incorporated: a V-to-C movement type and a VP-to-Comp movement type. He argues that the former type of incorporation occurs in causatives in which the causee is realized as an object and the base patient as a secondary object (as in Alsina's Type I). In causatives formed through VP-to-Comp movement, on the other hand, the causee is realized as an oblique and the base

(i)		complexity type		
		a-structure f-structure	biclausal biclausal	biclausal monoclausal
causee	term	Type I	Type I	Type II
	oblique	*	Type II	Type II

patient as an object (as in Alsina's Type II). What is noteworthy in Baker's account is that his two major types are correlated with some properties related to the issue of mono- vs. biclausality. In the VP-to-Comp type the base patient can be a passive subject, and the base logical subject (causee) does not exhibit subject properties, pointing toward monoclausality. In the V-to-C type, by contrast, the base patient cannot be a passive subject and the causee exhibits subject properties in terms of binding. In Baker's account, however, the difference between grammatical and logical subject properties are not carefully distinguished. Moreover, there are some empirical problems with this approach. For example, grammatical or logical subject properties of a causee are lacking in certain causatives that exhibit the case marking pattern of the V-to-C movement type; in fact, the Type II *sase* causative above is one such example (see also note 10).

### 6.3. Type II Linking and Verbs of Self-directed Action

Finally, let us discuss the grammatical functions of the arguments of Type II *sase* causatives. The Japanese Type II *sase* causative differs from Type II causatives in Chichewa and Catalan in that the Japanese causee is realized as a dative object rather than an oblique. Japanese is not the only language which shows this pattern. Interestingly, Marathi and other Indian languages present a similar pattern with a similar set of verbs.

In Marathi causatives, the base subject is usually realized as an oblique in Type II linking. However, there are some verbs that behave differently. This is the case with "ingestive verbs" (Masica 1976), a class whose membership is similar to the "self-directed" verbs that participate in Type II *sase* causatives in Japanese (the verbs whose subject is affected in some sense; e.g., 'eat', 'drink', 'learn', 'remember'). With ingestive verbs, the base subject becomes the accusative-marked object of the causativized verb, as in (25) (Saksena 1980, 1982, Alsina & Joshi 1991).

- (25) sumaa-ni raam-laa paanḥ paadjzle.  
Suma-Erg Ram-Acc water drink-Caus  
'Suma made Ram drink water.'

(Other Indian languages exhibit similar but somewhat different patterns. In Hindi and Malayalam, for example, ingestive verbs allow their subject to be an object as well as an oblique when causativized (Saksena 1980, 1982, Mohanan 1988).<sup>9</sup>)

There are, however, some differences between the causatives of self-directed verbs in Japanese and Marathi. First, both involve Type II association but the causative patient is linked to different arguments of the base verb. Alsina & Joshi (1991) argue that cases like (25) too involve Type II association, with the causative patient fused with the base agent, unlike Japanese in which it is linked to base patient. They note that the subject of the ingestive verb (e.g., the drinker) is affected (i.e., nourished) by the event (see also Saksena 1980, 1982), and thus the base subject qualifies for Type II association.

Second, passivization can promote the base patient as well as base subject into a subject in Japanese, but in Marathi it can only promote the base subject.<sup>10</sup> This is partly due to the object symmetry parameter: Japanese is an object-symmetrical language and allows either of the two internal arguments to be [-r], while Marathi is object asymmetrical and allows only one of them to be [-r], in this case the base subject.

One might ask here why it should be the base agent rather than the base patient that is treated as [-r] in Marathi causativized ingestive verbs. A crucial factor seems to be affectedness. As mentioned above, in Marathi causativization, it appears, a special attention is paid to the affected nature of the agent of ingestive processes. This affected nature of the nourished person rather than the intake leads to the [-r] assignment of the base agent in causatives in this language (see Zaenen 1993 for the

<sup>9</sup> K. P. Mohanan (personal communication) notes that in Malayalam a few psychological verbs behave in a similar way (e.g., *wiswasi-ppi-kk-um* 'persuade, make ... believe', formed from *wiswasikk-um* 'believe').

<sup>10</sup> In this respect, this causative would be treated as a case of V-to-C movement in Baker's (1988) theory. It should be noted, however, that here the base "subject" does not have subject properties, revealing an insufficiency in Baker's typology.

relationship between [-r] assignment and “Proto-Patient” properties; see Dowty 1981). One might note here that Marathi and Japanese in this respect represent two different ways of conceptualizing events like feeding and clothing. In contrast to Marathi, Japanese seems to treat feeding or dressing as caused motion; food is a moved entity and the eater is the recipient of the moved entity, and so Type II *sase* causatives behave like ditransitive verbs. In either case, the agentivity of the eater is suppressed, allowing a purely lexical causative expression.

These two possibilities parallel the alternations manifested by *spray/load* verbs. In essence, Japanese causativized self-directed verbs are like theme-object *spray/load* verbs, which in Japanese function as ditransitive verbs, while their counterparts in Marathi are like goal-object *spray/load* verbs like English *feed*. Such variation in different languages reflects different preferences in mapping arguments onto grammatical functions, preferences which are presumably independent of causative parameters. Such different preferences might be formalized along the lines of Butt, Dalrymple and Frank (1997); this, however, is beyond the scope of the present paper.

## 7. Conclusion

In this paper, I have examined the syntax and semantics of Japanese Type II *sase* causatives in comparison to other kinds of morphological causatives in Japanese and similar causatives in other languages. I have pointed out that Type II *sase* causatives are purely monoclausal, at both functional and argument structure, and that in this respect they present a further variation in the complexity of functional and argument structures exhibited by different subtypes of Japanese causatives. I have also noted that semantically Type II *sase* causatives correspond to Alsina’s Type II association, in which the causer acts on the base patient to bring about a change, in contrast to permissive and coercive causatives, in which Type I association is involved.

Alsina’s typology of Type I and Type II association must be elaborated in view of such variation in the functional and argument structure complexity of causatives. The observations made in this paper on causatives in Japanese and other languages suggest that there are certain constraints on the way Type I and Type II association is realized in causatives of various complexity types: Type I association (where the causer acts on the most salient, controlling entity of the base verb) cannot be found in causatives with a monoclausal a-structure, while Type II association (where the causer acts on the affected, noncontrolling entity of the base verb) is not found in causatives with biclausal f-structure. Grammatical and semantic explanations for these constraints were offered above. Verification of this hypothesis must await further examination of other languages.

## References

- Alsina, Alex. 1992. On the argument structure of causatives. *Linguistic Inquiry* 23:517-555.
- Alsina, Alex. 1996. *The Role of Argument Structure in Grammar*. Stanford: CSLI Publications.
- Alsina, Alex. 1997. A theory of complex predicates: Evidence from causatives in Bantu and Romance. In Alex Alsina, Joan Bresnan & Peter Sells, eds., *Complex Predicates*, 203-246. Stanford: CSLI.
- Alsina, Alex, and Smita Joshi. 1991. Parameters in causative constructions. In *Papers from the 27th Regional Meeting of the Chicago Linguistic Society*, 1-15. Chicago Linguistic Society, University of Chicago.
- Aoki, Reiko. 1977. Shieki: jidooshi/tadshi-to-no kakawari-ni oite [Causatives considered in relation to intransitives and transitives]. *Seijo Kokubun* 10:26-39.
- Baker, Mark. 1988. *Incorporation*. Chicago: University of Chicago Press.
- Bresnan, Joan, and Joni Kanerva. 1989. Locative Inversion in Chichewa: A Study of Factorization in Grammar. *Linguistic Inquiry* 20:1-50.
- Bresnan, Joan, and Lioba Moshi. 1990. Object asymmetries in comparative Bantu syntax. *Linguistic Inquiry* 21:147-186.
- Burzio, Luigi. 1986. *Italian Syntax: A Government Binding Approach*. Dordrecht: Reidel.
- Butt, Miriam, Mary Dalrymple, and Anette Frank. 1997. An architecture for linking theory in LFG. In Miriam Butt and Tracy Holloway King, eds., *On-Line Proceedings of the LFG 97 Conference*. <http://www-csli.stanford.edu/publications/LFG/>
- Dowty, David. R. 1991. Thematic Proto-roles and Argument Selection. *Language* 57:547-619.
- Dubinsky, Stanley. 1994. Predicate union and the syntax of Japanese causatives. *Journal of Linguistics* 30:43-79.
- Frank, Anette. 1996. A note on complex predicate formation: Evidence from auxiliary selection, reflexivization, and past participle agreement in French and Italian. In Miriam Butt and Tracy Holloway King, eds., *On-Line Proceedings of the First LFG Conference*. <http://www-csli.stanford.edu/publications/LFG/lfg1.html/>.
- Grimshaw, Jane. 1990. *Argument Structure*. Cambridge, Mass.: MIT Press.

- Haspelmath, Martin. 1993. More on the typology of inchoative/causative verb alternations. In Bernard Comrie and Maria Polinsky, eds., *Causatives and Transitivity*, 87-111. Amsterdam/Philadelphia: John Benjamins.
- Iida, Masayo. 1996. *Context and Binding in Japanese*. Stanford: CSLI Publications.
- Inoue, Kazuko. 1976. *Henkeibunpoo to Nihongo* [Transformational Grammar and Japanese]. Tokyo: Taishukan.
- Ishikawa, Akira. 1985. *Complex Predicates and Lexical Operators in Japanese*. Doctoral dissertation, Stanford University.
- Jackendoff, Ray. 1972. *Semantic Interpretation in Generative Grammar*. Cambridge, Mass.: MIT Press.
- Jacobsen, Wesley M. 1992. *The Transitive Structure of Events in Japanese*. Tokyo: Kurosio Publishers.
- Joshi, Smita. 1989. Logical subject in Marathi grammar and the predicate argument structure. In E. Jane Fee and Katherine Hunt, eds., *Proceedings of the Eighth West Coast Conference on Formal Linguistics*, 207-219. Stanford: The Stanford Linguistics Association.
- Kitagawa, Yoshihisa. 1986. *Subjects in Japanese and English*. Doctoral dissertation, University of Massachusetts, Amherst.
- Kuno, Susumu. 1973. *The Structure of the Japanese Language*. Cambridge, Mass.: MIT Press.
- Kuno, Susumu. 1983. *Shin Nihon Bunpoo Kenkyuu* [New Studies in Japanese Grammar]. Tokyo: Taishukan.
- Kuno, Susumu. 1987. Honorific marking in Japanese and the word formation hypothesis of causatives and passives. *Studies in Language* 11:99-128.
- Levin, Beth, and Malka Rappaport Hovav. 1994. A preliminary analysis of causative verbs in English. *Lingua* 92:35-77.
- Levin, Beth, and Malka Rappaport Hovav. 1995. *Unaccusativity: At the Syntax-Lexical Semantics Interface*. Cambridge, Mass: MIT Press.
- Manning, D. Christopher, Ivan Sag, and Masayo Iida. 1996. The lexical integrity of Japanese causatives. In Takao Gunji, ed., *Studies in the Universality of Constraint-Based Phrase Structure Grammars*, 9-37. Osaka: Osaka University.
- Marantz, Alec. 1984. *On the Nature of Grammatical Relations*. Cambridge, Mass.: MIT Press.
- Masica, Colin P. 1976. *Defining a Linguistic Area: South Asia*. Chicago: University of Chicago Press.
- Matsumoto, Yo. 1996. *Complex Predicates in Japanese: A Syntactic and Semantic Study of the Notion 'Word'*. Stanford: CSLI Publications & Tokyo: Kurosio Publishers.
- Miyagawa, Shigeru. 1980. *Complex Verbs and the Lexicon* (Coyote Papers 1). University of Arizona Linguistics Circle, Tucson.
- Mohanan, Karvanur P. 1983. Move NP or lexical rules? Evidence from Malayalam Causativization. In Lori Levin, Malka Rappaport, and Annie Zaenen, eds., *Papers in Lexical-Functional Grammar*, 47-111. Bloomington: Indiana University Linguistics Club.
- Mohanan, Tara. 1988. Causatives in Malayalam. Ms., Stanford University.
- Mohanan, Tara. 1994. *Argument Structure in Hindi*. Stanford, Calif.: CSLI Publications.
- Ono, Tsuyoshi. 1992. The grammaticalization of the Japanese verbs *oku* and *shimau*. *Cognitive Linguistics* 3:367-390.
- Rosen, Sara T. 1989. *Argument Structure and Complex Predicates*. Doctoral dissertation, Brandeis University.
- Saksena, Anuradha. 1980. Affected agent. *Language* 56: 812-826.
- Saksena, Anuradha. 1982. *Topics in the Analysis of Causatives with an Account of Hindi Paradigms*. Berkeley & Los Angeles: University of California Press.
- Shibatani, Masayoshi. 1976. The grammar of causative constructions: A conspectus. In Masayoshi Shibatani, ed., *Syntax and Semantics*, Vol. 6, *The Grammar of Causative Constructions*, 1-40. New York: Academic Press.
- Shibatani, Masayoshi. 1978. *Nihongo no Bunseki: Seiseibunpoo no Hoohoo* [An Analysis of Japanese: The Method of Generative Grammar]. Tokyo: Taishukan.
- Shibatani, Masayoshi. 1990. *Languages of Japan*. Cambridge: Cambridge University Press.
- Tonoike, Shigeo. 1978. On the causative constructions in Japanese. In John Hinds and Irwin Howard, eds., *Problems in Japanese Syntax and Semantics*, 3-29. Tokyo: Kaitakusha.
- Zaenen, Annie. 1993. Unaccusativity in Dutch: Integrating syntax and lexical semantics. In James Pustejovsky, ed., *Semantics and the Lexicon*, 129-161. Dordrecht: Kluwer.
- Zaenen, Annie, and Mary Dalrymple. 1996. Les verbes causatifs "polymorphiques": les predicats complexes en francais. *Langages* 30, 122:79-95.
- Zubizarreta, Maria L. 1987. *Levels of Representation in the Lexicon and in the Syntax*. Dordrecht: Foris.