

STEM SENTENCES IN INDONESIAN*

SANDRA CHUNG

It is well known that underlying transitive clauses in Indonesian can surface in several syntactic/morphological forms. They can appear in the active, a construction whose distinguishing morphological mark is the prefix *meng-* attached to the verb:

(1)a. Kita melihat kejadian itu kemarin.

'We saw the accident yesterday'.

b. Lisa sudah membaca buku itu.

'Lisa has already read the book'.

They can also appear in one of two passives. In the canonical passive, the underlying direct object is promoted to subject and the underlying subject appears as an oblique noun, either introduced by the preposition *oleh* 'by' or else cliticised to the right of the verb:

(2)a. Kejadian itu dilihat oleh banyak orang.

'The accident was seen by many people'.

b. Buku itu sudah dibaca Lisa.

'The book has already been read by Lisa'.

In the other passive, referred to here as object preposing, the underlying direct object is promoted to subject and the underlying subject cliticises to the left of the verb. The verb does not take a prefix but appears in its stem form:¹

(3)a. Kejadian itu kita lihat kemarin.

'The accident we saw yesterday'.

b. Buku itu sudah Lisa baca.

'The book Lisa has already read'.

Although the pragmatic functions of (1-3) are not entirely clear, the identification of (1) as syntactically active, and (2-3) as passive, has a long history. See Chung 1976b for a recent discussion.

In informal Indonesian, underlying transitive clauses also appear in a fourth morphological form, which I will call the stem construction:

(4)a. Kita lihat kejadian itu kemarin.

'We saw the accident yesterday'.

b. Lisa sudah baca buku itu.

'Lisa has already read the book'.

The stem construction can be identified morphologically by (i) its SVO word order and (ii) its lack of verb morphology, the verb appearing in its stem form. In the first of these characteristics the construction resembles the active (1), while in the second it resembles object preposing (3). It therefore poses an interesting problem for analysis.

This paper investigates the surface syntax of stem sentences, devoting particular attention to whether such sentences should be analysed as active or passive. I first discuss the distribution of clause types (1-4) in several varieties of Indonesian. I then argue that for all speakers of Indonesian, the stem construction patterns syntactically with the active (1) and should be identified as superficially active transitive.

Finally, I show that for a subclass of speakers most conversant with formal Indonesian, there is a version of object preposing which sometimes looks like the stem construction but cannot be analysed syntactically in the same way. For this subclass of speakers, certain sentences of the type (4a) are structurally ambiguous between active transitive (i.e. stem) constructions and object preposing constructions. A structural ambiguity between active and passive analyses is rather unusual from a crosslinguistic point of view. I first establish it, and then point out its possible significance for the development of clause types in Indonesian and the interaction of morphology and syntax.

1. PRELIMINARIES

Although a full description of clause types in Indonesian would be out of place in a paper of this length, it may be helpful to sketch the basic distribution of constructions (1-3) as well as the stem construction, which is under discussion. Readers are referred to Chung 1976b and references cited there for a more detailed description of the facts.

1.1. ACTIVE AND TWO PASSIVES²

The active (1) is the normal form of active transitive clauses in formal Indonesian. According to the traditional literature (see, for instance, Gonda 1952), clauses of this type are relatively infrequent in narrative, tending to appear only when the event described is imperfective or incomplete; elsewhere one of the two passives is used. This tendency is apparently still in force in contemporary formal Indonesian. In addition, the active occurs in the informal language under conditions to be described below.

The canonical passive (2) and object preposing (3) occur in both formal and informal Indonesian. Although these constructions seem originally to have been in complementary distribution, they now overlap for the large majority of speakers. The exact degree of overlap is subject to some individual variation, but can be characterised for the Indonesian described here as follows. The canonical passive is available for clauses with underlying third person subjects, whether pronouns or full nouns; object preposing is available for clauses with underlying pronoun or (less felicitously) proper noun subjects. In other words, either passive can be used when the underlying subject is a third person pronoun or proper noun. The canonical passive is the only option when the underlying subject is a common noun, while object preposing is the only option when the underlying subject is a first or second person pronoun.³ (For description of a different dialect, see Chung 1976a.)

1.2. THE STEM CONSTRUCTION

The stem construction (4) is volunteered by most speakers as the normal means of expressing (underlying) transitive clauses in informal Indonesian. This construction occurs primarily - perhaps only - in the informal language, a fact probably responsible for its being ignored, or characterised as an 'error', by most Indonesian grammars. (A notable exception is Dyen 1964.) A few grammars which do recognise the construction appear to identify it with object preposing; this analysis will be dealt with below.

The factors governing the choice between the stem construction and the two passives in informal Indonesian are unfortunately not clear to me. However, it is possible to say something about the choice of the stem construction as opposed to the active (1), which also occurs to a greater or lesser degree in informal Indonesian. Here two varieties of the informal language can be distinguished.

In the first variety (labelled informal Indonesian A below), either the active or the stem construction can be used for imperfective/

incomplete events; the stem construction - but not the active - is also used for perfective/complete events. In addition, there are a few contexts where the active must be used instead of the stem construction:

(a) In certain clauses containing an unspecified direct object. As pointed out by Soenjono Dardjowidjojo at this Conference, this restriction is apparently lexically governed; compare (6a-b) with (6c):

(5)a. Dia menulis sepanjang sore.

'He wrote all evening'.

b. Dia melukis kemarin.

'She painted yesterday'.

c. Dia membaca tiap hari.

'He reads every day'.

(6)a. *Dia tulis sepanjang sore.

('He wrote all evening'.)

b. *Dia lukis kemarin.

('She painted yesterday'.)

c. Dia baca tiap hari.

'He reads every day'.

(b) In clauses whose direct object is a pronominal enclitic, such as the third singular pronoun *-nya* (see Section 6):⁴

(7)a. Saya melihatnya kemarin.

'I saw him yesterday'.

b. Mereka akan memukulnya.

'They are going to hit him'.

(8)a. *Saya lihatnya kemarin.

('I saw him yesterday'.)

b. *Mereka akan pukulnya.

('They are going to hit him'.)

(c) In clauses containing certain verbs formed with the transitivity suffix *-i* (or, for some speakers, the transitivity suffix *-kan*):

(9)a. Guru itu memasuki rumah kecil.

'The teacher entered the apartment'.

b. Tidak banyak orang yang mempunyai Mercedes.

'There aren't many people who own a Mercedes'.

(10)a. *Guru itu masuki rumah kecil.

(*'The teacher entered the apartment'.*)

b. *Tidak banyak orang yang punyai Mercedes.

(*'There aren't many people who own a Mercedes'.*)

The second variety of informal Indonesian (labelled B below) differs from the first in that the active (1) is no longer used for imperfective/incomplete events, but has been replaced by the stem construction everywhere except in contexts (a-c). A variety of roughly this type is described in Dyen 1964.

The facts can be summed up as follows:

Formal Indonesian

Active	restricted to imperfective/incomplete events
Canonical passive	when the underlying subject is third person
Object preposing	when the underlying subject is a pronoun or (less felicitously) proper noun

Informal Indonesian

Stem construction	not in contexts (a-c)
Active	A: restricted to imperfect/incomplete events and contexts (a-c) B: restricted to contexts (a-c)
Canonical passive	when the underlying subject is third person
Object preposing	when the underlying subject is a pronoun or (less felicitously) proper noun

While there is certainly more to be said about the functional and sociolinguistic aspects of these clause types, the above should be sufficient for our purposes. In particular, we need not continue to distinguish between informal Indonesian A and B, since the arguments to be given below hold equally for both. I will therefore refer loosely to informal Indonesian, meaning A and B, in the following.

1.3. SUBJECT SHIFTING

In some idiolects of Indonesian, the derived subject of either passive can optionally be shifted to the right of the verb. Speakers who allow this subject shifting seem to be more conversant with formal Indonesian than ones who do not; otherwise they do not fall into any clear geographic or sociolinguistic grouping:

(11)a. Dengan sedih, ditutupnya pintu itu.

(*'With sadness, she closed the door'.* (canonical passive))

Under such an analysis the stem construction would be superficially passive. Its competition with the active in informal Indonesian A, and its replacement of the active in B, would be viewed as the result of a continuing spread of passives, at the expense of actives, in the informal language.

Such an analysis would be 'free' in the sense that subject shifting will produce surface structures like (4a) as a matter of course. Hence, for speakers who allow this rule, nothing special would need to be said to derive (4a) from an object preposing clause, while some additional statement would be required to keep this from occurring. This gives some initial plausibility to the idea that stem sentences are passive, at least for speakers who allow subject shifting to begin with.

Such an analysis would also have the virtue of rationalising the verb morphology, which is the same (i.e. prefixless) in the stem construction as in object preposing. Assuming a close correlation between morphology and syntax, we would presumably want to treat stem sentences as derived from object preposing rather than from the active (1), whose verb morphology is rather different. It is doubtless for this reason that clauses like (4a) are identified in several grammars as versions of object preposing - a position which probably would have been taken by more traditional grammars had they recognised the stem construction at all.

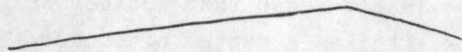
We thus have several (*a priori*) reasons for taking the object preposing analysis seriously. Nonetheless, I now show that the active analysis is correct for all speakers of Indonesian. Then, in Section 4, I return to idiolects which allow subject shifting and show that for these, certain stem sentences and certain clauses that have undergone subject shifting are structurally ambiguous.

3. ARGUMENTS FOR THE ACTIVE ANALYSIS


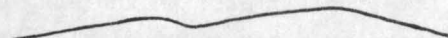
The arguments of this section take the following form: certain properties distinguish active from passive clauses in both formal and informal Indonesian. For each property, it is possible to show that stem sentences pattern with the active rather than with object preposing. An analysis which treats the stem construction as superficially active can account for this, whereas one which derives it from object preposing cannot. Therefore, the active analysis is to be preferred. The arguments begin with superficial properties of the clause (3.1-2) and then move to properties of the underlying subject (3.3-4) and direct object (3.5-6), establishing finally that the stem construction is superficially transitive as well as active (3.7.).

3.1. INTONATION⁶

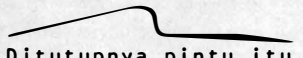
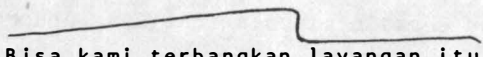
One property that distinguishes active clauses from certain passive clauses is intonation. The normal intonation of declarative sentences in Indonesian is level-to-rising, with highest pitch falling on the last major constituent. Consider the active clause:

- (14) 
 Kita melihat kejadian itu kemarin.
'We saw the accident yesterday'.

And the canonical passive and object preposing clauses:

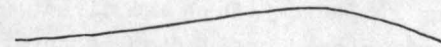
- (15)a. 
 Buku itu sudah dibaca Lisa.
'The book has already been read by Lisa'.
- b. 
 Kejadian itu kita lihat kemarin.
'The accident we saw yesterday'.

The intonation of passive clauses is different, however, if subject shifting has applied; then pitch rises until the verb is reached and falls sharply thereafter, so that the shifted subject (and any following constituent) bears low pitch. The effect is similar to that achieved by right dislocation in English:

- (16)a. 
 Ditutupnya pintu itu.
'He closed the door'.
- b. 
 Bisa kami terbangkan layangan itu.
'We can fly the kite'.

The intonation of (16) is quite obvious in main clauses, but less apparent in certain subordinate clauses, such as relative clauses, where it seems to be overridden by the larger intonation contour of the sentence. We return to this in Section 4.

Now if all stem sentences were derived from object preposing clauses by subject shifting, we would expect them to exhibit the subject shifting intonation. But they do not; instead, such sentences are assigned normal declarative intonation by all speakers (cf. though Section 4):

- (17)a. 
 Kita lihat kejadian itu kemarin.
'We saw the accident yesterday'.

The fact that subject shifting has applied in (20) is established by intonation.

Now if all stem sentences were derived from object preposing clauses, we would expect their underlying subject to follow the auxiliary. But in fact, the underlying subject always precedes:

- (21)a. Kami sudah baca buku itu.
'We have already read the book'.
- b. Dia akan bangun rumahnya sendiri.
'He is going to build his house himself'.
- c. Saya tidak kenal dia.
'I don't know him'.

This argues that the stem construction is not a variant of object preposing, but instead patterns syntactically with the active.

3.3. UNDERLYING SUBJECT

A third property that distinguishes active from object preposing clauses has to do with a restriction on the underlying subject. In active clauses the underlying subject may be an NP of any syntactic type:

- (22)a. Dia menjual mobil itu pada saya.
'He sold the car to me'.
- b. Pak guru menulis surat itu.
'The teacher wrote the letter'.
- c. Anak2 akan membaca buku ini.
'The children are going to read this book'.
- d. Banyak orang telah menyetir mobil ini.
'Many people have driven this car'.

But in object preposing clauses, the underlying subject must be a pronoun or (less felicitously) proper noun; it is never a full NP (but see fn.3):

- (23)a. Mobil itu dia jual pada saya.
'The car he sold to me'.
- b. *Surat itu pak guru tulis.
('The letter the teacher wrote'.)
- c. *Buku ini akan anak2 baca.
('This book the children are going to read'.)

- d. *Mobil ini telah banyak orang setir.
(*'This car many people have driven'.*)

The restriction on underlying subjects holds even if the derived subject has been moved rightwards by subject shifting, as shown by the following examples, all of which have the subject shifting intonation:

- (24)a. *Akan laki2 itu pukul saya.
(*'The man is going to hit me'.*)
- b. *Telah orang itu lihat kejadian itu.
(*'The man saw the accident'.*)

Now if stem sentences were derived from object preposing clauses, we would expect their underlying subjects also to exhibit this restriction. However, stem sentences may have underlying subjects which are NPs of any syntactic type:

- (25)a. Dia jual mobil itu pada saya.
(*'He sold the car to me'.*)
- b. Pak guru tulis surat itu.
(*'The teacher wrote the letter'.*)
- c. Anak2 akan baca buku ini.
(*'The children are going to read this book'.*)
- d. Banyak orang telah setir mobil ini.
(*'Many people have driven this car'.*)

Sentences like these provide another argument that the stem construction should not be derived from object preposing, but instead is syntactically similar to the active.

3.4. SUBJECT-REFERRING RULES

A fourth argument - also involving subjects - has to do with rules which pick out the cyclic subject of the clause. These include equi, relativisation, and clefting; for some discussion see Chung 1976a, 1976b and Gibson 1978. What is important about these rules is that they delete or extract the NP which bears the subject relation after the passives have had a chance to apply.⁷ So they affect the underlying subject of the active, but the derived subject (= underlying direct object) of the canonical passive and object preposing; they do not affect the underlying subject of either passive.

Clearly, if the stem construction were syntactically passive, its underlying subject ought not to be deleted by equi or extracted by relativisation or clefting. But the underlying subject can undergo all of these rules:

- (26)a. Dia datang ke Indonesia untuk lihat saya.
'She came to Indonesia to see me'. (equi)
- b. Apakah kamu tahu orang yang jual mobilnya?
'Do you know the man who sold his car?' (relativisation)
- c. Lebih baik kamu yang ganggu dia.
'Better it's you that interrupts him'. (clefting)

Its ability to do so argues that it still bears the subject relation after both passives have had a chance to apply. In other words, the stem construction is superficially active.

3.5. UNDERLYING DIRECT OBJECT

A fifth argument that distinguishes the active from the two passives involves a restriction on the underlying direct object. Active clauses in Indonesian regularly allow their direct objects to be indefinite. Indefinite/nonspecific NPs can be marked in several ways, one of which is simply to assign them no article at all:

- (27)a. Dia menjual mobil pada saya.
'He sold a car to me'.
- b. Anak itu akan membaca buku.
'The child is going to read a book'.
- c. Saya telah menulis surat.
'I wrote a letter'.

In contrast, object preposing clauses do not allow their underlying direct objects (= derived subjects) to be indefinite:

- (28)a. *Mobil dia jual pada saya.
('A car he sold to me'.)
- b. *Surat telah saya tulis.
('A letter I wrote'.)

And for some speakers, canonical passive clauses do not allow this either (cf. Dardjowidjojo 1977):

- (29)a. *Mobil dijual dia pada saya.
('A car was sold by him to me'.)
- b. *Buku akan dibaca oleh anak itu.
('A book will be read by the child'.)

Speakers who reject both (28) and (29) seem to have a general restriction that derived subjects must be definite. For speakers who reject (28) but accept (29), it appears that this restriction extends only to

derived subjects created by object preposing (see Dyen 1964 and Chung 1976b).

The restriction on definiteness continues to hold even if the derived subject has been moved rightwards by subject shifting:

(30)a. *Telah saya tulis surat.

(*'I wrote a letter'.*)

b. *Akan dibacanya buku.

(*'He will read a book'.*)

Thus if stem sentences were derived from object preposing clauses, they should exhibit it as well. But in fact, stem sentences regularly have underlying direct objects which are indefinite:

(31)a. Dia jual mobil pada saya.

(*'He sold a car to me'.*)

b. Anak itu akan baca buku.

(*'The child will read a book'.*)

c. Saya telah tulis surat.

(*'I wrote a letter'.*)

This argues that they should be identified with the active rather than with object preposing. The point is particularly clear for speakers who have the definiteness restriction for both passives, since for them (31) shows that the underlying direct object of the stem construction is not a derived subject at all.

3.6. HANYA

Yet another argument for the active character of the stem construction is provided by the syntax of *hanya* 'only'. *Hanya* has phrasal scope (i.e. it can qualify NPs, PPs, or VPs) and its scope relations are determined in part by linear order within the clause. Before demonstrating this, it may be helpful to sketch the surface distribution of this adverb.

There are three types of positions in the clause that *hanya* can occupy:

(a) Immediately preceding the constituent in its scope. This construction is awkward, apparently most so when the constituent in question is a surface subject:

(32)a. ??Hanya anak2 akan datang besok.

(*'Only children will come tomorrow'.*)

- b. ??Hanya Lisa sudah pernah melihat filem itu.
'Only Lisa has ever seen the film'.
- c. Buku ini hanya untuk wanita.
'This book is only for women'.
- d. Buku ini akan dibaca hanya oleh wanita.
'This book will be read only by women'.

(b) Immediately preceding the constituent in its scope, when this has been clefted:

- (33)a. Hanya anak2 yang akan datang besok.
'It is only children who will come tomorrow'.
- b. Hanya Lisa yang sudah pernah melihat filem itu.
'It's only Lisa who has ever seen the film'.
- c. Hanya buku ini yang sudah mereka baca.
'It is only this book that they have already read'.

(c) Immediately preceding the auxiliary or, if none is present, the main verb. This is one normal position for adverbs:

- (34)a. Saya hanya akan merebus pisang ini.
'I'm only going to boil these bananas'.
- b. Kita hanya pergi ke beberapa rumah.
'We only went to a few houses'.

When hanya precedes the auxiliary or verb, it can be interpreted as having scope over the entire VP, or else over some NP or PP. It is this last possibility that we are interested in. Let us now consider the class of NPs and PPs which can be controlled by hanya in this pre-verbal position.

In active clauses, hanya cannot be interpreted as having scope over the subject. (Note that * indicates that the reading in question is ungrammatical; the sentence may be grammatical with other readings):

- (35)a. *Lisa hanya sudah pernah melihat filem itu.
(*'Only Lisa has ever seen the film'.*)
- b. *Wanita itu hanya akan membaca buku ini.
(*'Only the woman will read this book'.*)

But it can control a postverbal direct object or prepositional phrase:

- (36)a. Saya hanya membaca buku ini.
'I read only this book'.

b. Wanita itu hanya akan membaca buku ini.

'The woman will read only this book'.

c. Kita hanya menaikkan layang2 itu untuk Lisa.

'We launched the kite only for Lisa'.

The generalisation is this: hanya can have scope over any following element in the clause (including NPs, PPs, or VP), but not over any preceding one. This generalisation is not unique to Indonesian but appears to hold for scope words like 'even', 'only', and so forth, in many languages.

Roughly the same situation obtains in object preposing and canonical passive clauses. Thus, hanya cannot have scope over the derived subject of either passive:

(37)a. *Buku ini hanya saya baca.

('Only this book I read'.)

b. *Buku ini hanya sudah dibaca oleh mereka.

('Only this book has been read by them'.)

But it can control any following NP or PP, including the agent of a canonical passive:

(38)a. Masakan ini hanya saya buat dengan cabai.

'This food I make only with hot peppers'.

b. Surat ini hanya akan saya tulis untuk Lisa.

'This letter I am going to write only for Lisa'.

c. Buku ini hanya akan dibaca oleh wanita.

'This book is going to be read only by women'.

Note that the generalisation holds for the linear order of elements after the passives have had a chance to apply.

Crucially for us, there is one type of NP which hanya cannot control even though it occurs postverbally in surface structure. This is the derived subject of a passive that has been moved rightward by subject shifting (in idiolects which allow this rule to begin with):

(39)a. *Hanya saya baca buku ini.

('I read only this book'.)

b. *Hanya sudah dibaca buku ini oleh mereka.

('They have already read only this book'.)

The failure of this NP to fall under the scope of hanya could be dealt with in several ways; for instance, by assuming that scope relations are assigned before subject shifting, or else by restating the generalisation so that hanya is allowed to control any following element

which is not a (cyclic) subject. Its interest to us is that it provides a sixth text for the surface syntax of the stem construction. If stem sentences were derived from object preposing clauses by subject shifting, then their underlying direct objects (= putative derived subjects) should not fall under the scope of *hanya*, even though they follow it in surface structure. However, they do fall under its scope:

(40)a. *Saya hanya baca buku ini.*

'I read only this book'.

b. *Anak2 hanya akan baca buku ini.*

'The children are going to read only this book'.

c. *Kita hanya lihat satu tabrakan.*

'We saw only one collision'.

Depending on how scope relations are assigned generally, sentences like these argue for one of the following: (i) the underlying direct object of the stem construction follows *hanya* at the time of scope assignment, or else (ii) the underlying object is not a subject at this time. Both of these reduce to the observation that the underlying direct object has not been turned into a derived subject by either passive. They therefore argue that the stem construction is superficially active.

3.7. DIRECT OBJECT-REFERRING RULES

The arguments of the preceding sections establish that stem sentences are syntactically active, in that their underlying subjects are surface subjects while their underlying direct objects are not, and they have certain other properties of active clauses. To show that the stem construction is also superficially transitive, we must now argue that its underlying direct object continues to bear the direct object relation in derived structure. The argument is provided by several rules, including reflexivisation and (control of) *equi*, which pick out the cyclic direct object of the clause. Reflexivisation allows cyclic direct objects to appear in the form *diri* 'self' plus possessive pronoun, but assigns a different reflexive morphology to other NPs. *Equi* can be controlled (i.e. the deletion can be triggered) only by NPs which hold the subject or direct object relation in both underlying and cyclic structure (see Chung 1976a).

If the stem construction is superficially transitive, we would expect its underlying direct object to be accessible to these rules. And it is: the underlying object undergoes reflexivisation and controls *equi* in the expected way:

(41)a. Saya lihat diri saya dalam air.

'I looked at myself in the water'. (Dyen 1964:17a.12)

b. Kepada pedagang itu, kami jual diri kami.

'To the merchant, we sold ourselves'. (reflexivisation)

c. Saya tidak beli bir untuk diminum oleh Robert.

'I didn't buy any beer to be drunk by Robert'. (equi)

This argues that it is a cyclic direct object, and so the stem construction is transitive as well as active. As such it exactly parallels the active (1).

4. THE STEM CONSTRUCTION AND SUBJECT SHIFTING

It should be clear that the arguments of Section 3 force an active transitive analysis only for a subclass of stem sentences, namely critical examples like (21), (25), (26), and so forth, which exhibit distinctive properties of active and/or transitive clauses. However, any mechanism which we choose to account for these will generate all other stem sentences as a matter of course. For instance, suppose sentences like (21) and (25) are related to their formal counterparts, (18) and (22), by a condition on the meng-insertion rule which states: (42) Do not attach meng- to transitive verbs in informal Indonesian.

Unless specifically prevented from doing so, this condition will produce not only (21) and (25) but also other prefixless active clauses, such as (4a), thereby generating the full range of stem sentences. Hence, in the absence of conflicting evidence, it is simplest to conclude that all stem sentences are superficially active transitive.

The active analysis is therefore forced for some stem sentences and free for others. Further, there is no other motivated source for surface structures of this type in idiolects which lack the subject shifting rule. This suggests that, for speakers of these idiolects, any clause with SVO word order and prefixless verb morphology will be a stem sentence (and therefore active transitive).

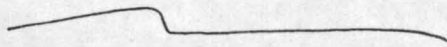
The situation is different, however, for speakers who allow subject shifting, since for them application of this rule to an object preposing clause can also produce a surface structure like (4a) (to see this, compare (12) and (13)). This means that these speakers have two free analyses of (4a), one treating it as a stem sentence (i.e. active transitive) and the other deriving it from object preposing.

We might then expect to find evidence in idiolects of this type supporting either analysis for a surface structure like (4a), which

exhibits no distinctive properties of an active clause; i.e. no auxiliary following the subject, no full noun underlying subject, no indefinite underlying direct object, and so forth. Two classes of such evidence are discussed immediately below.

4.1. INTONATION

Speakers whose idiolects allow subject shifting regularly assign the subject shifting intonation to certain clauses of the type (4a), which have no distinctive properties of active clauses. Consider:

- (43) 
 Kita lihat kejadian itu kemarin.
'We saw the accident yesterday'.

The intonation indicates that these clauses have undergone subject shifting and so are presumably derived from object preposing clauses. Aside from this, they are indistinguishable from stem sentences in terms of superficial properties such as word order and lack of verb morphology. Apparently, intonation provides the only cue to whether (43) is syntactically active or passive (cp. (17)).

Two further points should be made. First, the subject shifting intonation is assigned only by speakers who allow subject shifting to begin with, and then only to clauses which can be derived independently from an object preposing construction. If, for instance, a clause has a full noun underlying subject, then a derivation involving object preposing would not be possible and the subject shifting intonation could not be assigned. Second, the intonation of (43) is absent in certain subordinate clauses, such as relative clauses, where it is effaced by the larger intonation contour of the sentence. This will be relevant in the following subsection.

4.2. RELATIVISATION OF POSSESSORS⁸

Relativisation provides further evidence that clauses of the type (4a) can be analysed as stem sentences or as versions of object preposing.

Relative clauses in Indonesian follow their head nouns and are introduced by the complementiser *yang*, which is otherwise found only in focus constructions. There are several strategies for relativisation, depending on the syntactic function of the relative noun within the relative clause. Subjects and direct objects are relativised by deletion; this strategy is restricted to subjects in some versions of formal Indonesian, but available to subjects and direct objects otherwise (Chung 1976a):

(44) Perempuan yang duduk di sana adalah adik saya.

'The woman who is sitting over there is my younger sister'.

(Relative clauses are underlined.) Possessors are relativised by pronominalisation; it is this strategy that we are interested in:⁹

(45) Apakah kamu melihat orang yang tangannya patah?

'Did you see the man whose arm is broken?'

Significantly, not all possessors can be relativised, but only ones attached to the cyclic subject of the clause. Thus in the active, the possessor of the underlying subject can be relativised:

(46) Telah bertemukah anda dengan gadis yang ibunya menyukai saya?

'Have you met the girl whose mother likes me?'

But the possessor of a direct object or prepositional phrase cannot:

(47)a. *Siapa wanita yang saya mengunjungi rumahnya?

('Who is the woman whose house I visited?')

b. *Itu dia orang yang kamu melukai kakinya.

('That is the person whose leg you hurt'.)

c. *Di mana orang yang saya pergi ke rumahnya?

('Where is the person whose house I went to?')

In object preposing and canonical passive clauses, the possessor of the derived subject can be relativised, while possessors of other NPs cannot:

(48)a. Apakah kamu sudah bertemu dengan laki2 yang bukunya saya baca?

'Have you ever met the man whose book I read?'

b. Inilah orang yang layang2-nya hendak kita naikkan.

'This is the person whose kite we want to fly'.

c. Siapa yang bertemu dengan anak perempuan yang mobilnya dibetulkan oleh John?

'Who met the girl whose car was repaired by John?'

Note that, in idiolects that allow subject shifting, moving the derived subject to the right does not affect the ability of its possessor to be relativised. This fact will be useful later:

(49)a. Inilah orang yang hendak kita naikkan layang2-nya.

'This is the person whose kite we want to fly'.

b. Siapa yang bertemu dengan anak perempuan yang dibetulkan mobilnya oleh John?

'Who met the girl whose car was repaired by John?'

The fact that only possessors of subjects can be relativised suggests that we can use this strategy to test for which NP of a clause like (4a) is its cyclic subject, since it is just this NP whose possessor should be able to undergo the rule. And in fact, in all varieties of informal Indonesian, the underlying subject of this clause type allows its possessor to be relativised. This argues that the underlying subject is a cyclic subject, and so is consistent with our conclusion that clauses of this type can be analysed as stem sentences (i.e. active transitive):

(50) Inilah orang2 yang rencananya buat kami terkejut.

'These are the people whose decision made us surprised'.

Further, in varieties of Indonesian which lack subject shifting, no other NP of the clause allows its possessor to undergo the rule. This is consistent with our claim that, for these speakers, all clauses of the type (4a) are stem sentences.

For speakers who allow subject shifting, though, the facts are different. If clauses of the type (4a) can be analysed as stem sentences or object preposing clauses, then it should be possible also to relativise the possessor of their underlying direct object (= derived subject) in just these cases. Such a move is indeed allowed. The possessor of the underlying direct object can be relativised in (51):

(51)a. Apakah kamu sudah bertemu dengan laki2 yang saya baca bukunya?

'Have you ever met the man whose book I read?'

b. Itu dia orang yang kamu lukai kakinya.

'This is the person whose leg you hurt'.

But not in (52), where the embedded clause exhibits some distinctive properties of active clauses:

(52)a. *Inilah orang yang kita hendak naikkan layang2-nya.

('This is the person whose kite we want to fly'.) (Note that the subject precedes the auxiliary.)

b. *Apakah kamu sudah bertemu dengan orang yang banyak orang sudah setir mobilnya?

('Have you ever met the person whose car many people have driven?') (Note the subject is a common noun and precedes the auxiliary.)

The contrast between (51) and (52) argues that, for these speakers, surface structures like (4a) are structurally ambiguous between an active transitive and an object preposing analysis. Interestingly, the analyses here are not disambiguated by intonation, since the subject

shifting intonation that we would expect is obscured in (51) by the larger intonation contour of the sentence. Relativisation seems to provide the only hint that the embedded clause of (50) is syntactically active, while those of (51) are not.¹⁰

5. CONCLUSION

This paper has attempted to investigate the surface syntax of the stem construction. I first showed that, for all speakers, stem sentences are superficially active transitive. I then showed that, for speakers whose grammars include subject shifting, there is a class of surface structures which are structurally ambiguous between the stem construction and object preposing. This class consists of clauses exhibiting no distinctive properties of active clauses, i.e. clauses having a pronominal/proper noun underlying subject and lacking an auxiliary, among other things. The conclusions lead to several more general remarks.

First, it is reassuring that there are no speakers for whom the stem construction is superficially passive, rather than active transitive. The reason why this is reassuring follows from the relative frequencies of (1) and (4). Recall that in one version of informal Indonesian, the stem construction has replaced the active (1) almost entirely. If this construction were syntactically passive, then we would be forced to the conclusion that passives in this version of Indonesian were virtually obligatory. The fact that stem sentences are (instead) superficially active means that this sort of claim does not have to be made. Further, because the stem construction does not seem to be restricted to imperfective/incomplete events in the way that the active (1) is, it may well be possible to claim that the frequency of active clause types has actually increased from formal to informal Indonesian. Such a change, if real, would conform to our larger notions of linguistic change because it would serve to decrease the opacity of the passive(s). Elsewhere I have discussed a comparable development for the Polynesian languages (Chung 1978).

Second, it is tempting to speculate about the origins of the stem construction itself. The fact that object preposing can provide a source for surface structures like (4a) in some idiolects suggests that the stem construction may have arisen historically from object preposing. We can posit a development something like the following:

Stage 1: Object preposing followed by subject shifting,

Saya pukul orang itu. ←

(Reanalysis of these clauses as superficially active transitive)

Stage 2: Object preposing followed by subject shifting,

Saya pukul orang itu. ←

Condition (42) on meng-insertion ↘

(Loss of subject shifting)

Stage 3: Condition (42) on meng-insertion ↘

Saya pukul orang itu. ↘

Stage 1 would be reflected by formal Indonesian, Stage 2 by the informal Indonesian of speakers who allow subject shifting, and Stage 3 by the informal Indonesian of other speakers. The motivation for the reanalysis preceding Stage 2 would presumably be that it serves to decrease the opacity of object preposing. In order for the reanalysis to work, however, we would somehow have to square it with the facts of intonation: subject shifting clauses have (and, presumably, have always had) an intonation different from that of normal active transitive clauses. Given this, a direct reinterpretation of some subject shifting clauses as stem sentences would seem rather difficult.¹¹

A second possibility - and one which seems at least as promising - would be to relate the development of stem sentences to the larger interaction of morphology and syntax in Indonesian. The distribution of voice affixes in the clause types of formal Indonesian is typologically rather bizarre. While the active and the canonical passive are indicated by verb prefixes, object preposing has no associated verbal affix but instead is indicated by the stem form of the verb. In structuralist terms, the active and the canonical passive are morphologically marked; object preposing is unmarked. What is unusual about this is that most languages prefer to have the syntactically basic form of the clause be morphologically unmarked. So actives typically employ the stem form of the verb, and passives are typically indicated by overt morphology. The fact that formal Indonesian violates this generalisation is unexpected enough that it has led some linguists to propose (wrongly) that object preposing represents the underlying form of the transitive clause.

Given this, one function of the rise of stem sentences is to bring informal Indonesian into conformity with the general pattern, by creating a clause type which is both syntactically active transitive and morphologically unmarked. The change thus provides a historical means of rationalising the morphology. The interest of such an

explanation is this. There are by now many examples of syntactic change that decrease rule opacity at the expense of rendering the morphology more complex (see Anderson 1977, Chung 1978). If the speculations just presented turn out to be correct, then the rise of stem sentences will be a happy example of a change in which an increase of syntactic transparency helps to simplify the morphology as well.

6. A FALSE ARGUMENT THAT STEM SENTENCES ARE SYNTACTICALLY PASSIVE

The arguments of Section 3 are based on properties which distinguish active clauses from object preposing clauses. It should be noted, though, that not all such properties can be used to test for the surface syntax of the stem construction. Here I show one reason why.

Indonesian has a third singular pronoun, *-nya*, which is enclitic to the verb and can be used to represent various types of nonsubjects. In particular, it can be the direct object of an active clause:

(53)a. *Saya melihatnya kemarin.*

'I saw him yesterday'.

b. *Mereka akan memukulnya.*

'They are going to hit him'.

But it cannot be the derived subject (= underlying direct object) of an object preposing or canonical passive clause.

Given this, it might be supposed that the ability to take *-nya* as direct object would be one defining characteristic of active as opposed to passive clauses. Then the ungrammaticality, for all speakers, of sentences like (54) would seem to indicate that stem sentences are not superficially active:

(54)a. **Saya melihatnya kemarin.*

('I saw him yesterday'.)

b. **Mereka akan pukulnya.*

('They are going to hit him'.)

The argument is fallacious, though, because Indonesian has other clause types which are active transitive but cannot, nonetheless, take *-nya* as direct object. These clause types share with the stem construction the property of not (normally) allowing the transitive prefix *meng-*. For instance, Indonesian has a number of psychological verbs whose direct objects are introduced by optional prepositions in formal speech, but are prepositionless in informal speech (Stevens 1970). These verbs do not take *meng-*:

- (55)a. Saya suka laki2 itu.
'I like that man'.
- b. ?*Saya menyukai laki2 itu.
('I like that man'.)
- c. Bapak saya mau buku itu.
'My father wants that book'.
- d. ?*Bapak saya memau buku itu.
('My father wants that book'.)

That these verbs are transitive is shown by the ability of their direct objects to undergo object preposing (for some speakers) and relativisation and clefting (for all speakers in the informal language):

- (56)a. Laki2 itu saya suka.
'That man I like'. (object preposing)
- b. Dia satu2-nya laki2 yang saya suka.
'He is the only man who I like'. (relativisation)
- c. Mobil yang saya mau mahal.
'The car that I want is expensive'. (relativisation)
- d. Buku itu yang saya mau.
'It is that book that I want'. (clefting)

They cannot, however, take *-nya* as direct object:

- (57)a. *Saya sukanya.
('I like him'.)
- b. *Bapak saya maunya.
('My father wants it'.)

Further, Indonesian has a number of verbs, such as *makan* 'eat', *minum* 'drink', and so forth, which idiosyncratically do not take *meng-*:

- (58)a. Dia tidak makan kue itu.
'He didn't eat the cake'.
- b. ??Dia tidak memakan kue itu.
('He didn't eat the cake'.)
- c. Dia akan minum bir.
'He is going to drink some beer'.
- d. *Dia akan meminum bir.
('He is going to drink some beer'.)

These verbs are true transitives, as shown by the fact that their direct objects regularly undergo object preposing, the canonical passive, and (in informal Indonesian) relativisation and clefting. But they cannot take *-nya* as direct object unless *meng-* is, exceptionally, prefixed as well:

- (59)a. *Dia tidak makannya.
(*'He didn't eat it'.*)
- b. Dia tidak memakannya.
(*'He didn't eat it'.*)
- c. *Dia akan minumnya.
(*'He is going to drink it'.*)
- d. Dia akan meminumnya.
(*'He is going to drink it'.*)

Examples like these show that the ability to take *-nya* as direct object is not a property of all active transitive clauses, but rather of clauses whose verbs exhibit the transitive prefix *meng-*. Therefore the failure of *-nya* to appear in (54) reveals nothing about the syntax of the stem construction.

(In contrast, psychological verbs and idiosyncratic transitives like *makan* pattern with other active transitives for the purposes of the tests presented in Section 3, though I do not show this explicitly.)

N O T E S

* This paper is an attempt to clarify earlier remarks of mine to the effect that the transitive prefix is optional in Indonesian (Chung 1976a, 1976b). I would like to thank J.W.M. Verhaar for stimulating correspondence which led me to the idea of this paper, and A.M. Stevens, J.W.M. Verhaar, Soenjono Dardjowidjojo, Jack Prentice, and Isidore Dyen for a number of helpful comments on the earlier version.

The Indonesian described here is spoken in Jakarta and Bandung. The data were provided by Lisa Siregar (Jakarta), Robert Item (Jakarta), Kris Sumano (Jakarta), Toto Dharmadji (Jakarta), Sugijanto Soegijoko (Bandung), and Bianti Djiwandono (Jakarta). Research on this topic was supported in part by the Academic Senate of UCSD and by a Mellon Faculty Fellowship from Harvard University. Thanks to all.

In some places (notably Section 1) the discussion of register and dialect has been oversimplified rather severely. I would particularly welcome comments in this area from readers of this paper.

1. Two notes: (i) Cliticisation here refers primarily to the position of the NP in question (i.e. hugging the verb) and not to loss of stress, though it is true that a few pronouns have stressless clitic forms (e.g. 1st sg. proclitic *ku-*, 3rd sg. enclitic *-nya*). This is loose terminology which the reader is asked to bear with. (ii) As I do not give word-by-word glosses, English translations are chosen in part to reflect the Indonesian word order; so object preposing clauses are translated with English topicalisations, clauses with subject shifting (1.3) are translated with English actives, and so forth. The translations do not, in these cases, give clues to the syntax of the Indonesian. For instance, object preposing, despite the translation given here, is a passive; see Chung 1976b.

2. A word on methodology may be in order. The data discussed here were obtained in two ways: (i) by asking speakers to translate English sentences into Indonesian, and (ii) by asking them for grammaticality judgements on altered versions of their translations. In general, I have tried to cite examples produced spontaneously by speakers (rather than merely judged grammatical by them) to illustrate grammatical construction types. Examples are cited in their original form even when they exhibit so-called nonstandard characteristics, such as the use of *pada* for *kepada* in (22a), the use of *telah* for the past tense auxiliary in (22d) (by a speaker bilingual in Javanese), and so forth. See fn.9 for the only exception to this.

3. Two qualifications: (i) One speaker interviewed for this paper allows the underlying subject of the canonical passive to be a first or second person pronoun (cf. Chung 1976a). (ii) Alan Stevens has pointed out that in written Indonesian the underlying subject of object preposing can be a common noun (sometimes a rather long common noun). In general this does not seem possible in spoken Indonesian, whether formal or informal.

4. At this Conference Soenjono Dardjowidjojo observed that the active must also be used when the direct object is the 1st sg. enclitic *-ku* or the 2nd sg. enclitic *-mu*. However, most of the Indonesians I have worked with do not regularly use *-ku* or *-mu* for direct objects, preferring instead to use independent pronouns. This is why only *-nya* is mentioned in the text.

5. Readers with a richer typology of clause types may wonder why other alternatives are not considered; i.e. the possibility that the stem construction might be an antipassive, an impersonal passive, and so forth. In general, I have tried not to clutter the exposition with alternatives which would ultimately have to be rejected. Arguments against an antipassive analysis of stem sentences are given in 3.7. Arguments against an impersonal passive analysis of subject shifting clauses can be constructed by the interested reader from the facts of 3.5., 3.6., and 4.2.

6. The importance of intonation to this paper was pointed out to me by Alan Stevens and Soenjono Dardjowidjojo.

7. Relativisation and clefting also extract cyclic direct objects in informal Indonesian.

8. J.W.M. Verhaar gives a rather different treatment of relativisation of possessors in his paper for this Conference (1978).

9. Many of the relative clauses cited in this subsection were originally produced by speakers with the articles *itu* or *-nya* following the head noun. However, a large number of linguists (including some Indonesian-speakers) have informed me that the articles are ungrammatical in this position. I have therefore excised them from the text. Relative clauses which originally had articles following the head noun are (47b), (48b), (49a), (51b), and (52a).

10. The idea that only possessors of subjects can be relativised receives further support from psychological verbs. Indonesian has a class of psychological verbs which are transitive but do not take the transitive prefix (see Stevens 1970 and Section 6 of this paper). Objects of these verbs are introduced by optional prepositions in formal speech and are prepositionless in informal speech. Their direct objecthood is established by their ability to undergo object preposing (for some speakers), and relativisation and clefting (for all speakers in informal Indonesian).

A few psychological verbs are unusually resistant to object preposing; *lupa* 'forget', for instance, does not govern object preposing in the speech of most Indonesians:

- (a) *Anda lupa payung dia.*
 '*You forgot his umbrella*'.
- (b) **Payung dia anda lupa.*
 '*His umbrella you forgot*'.)

This means that the underlying direct object of (a) cannot be interpreted as the derived subject of an object preposing clause that has been moved rightward by subject shifting.

Now if only possessors of subjects can be relativised, then we would expect not to be able to relativise the possessor of the underlying direct object of *lupa* in (a), even though this clause otherwise has no distinctive properties of an active clause. This prediction is borne out: relative clauses like (c) are ungrammatical for those Indonesians who do not allow *lupa* to govern object preposing in the first place:

- (c) **Apa yang terjadi terhadap anak yang anda lupa payungnya?*
 '*What happened to the child whose umbrella you forgot?*')

11. Now may be the time to acknowledge that subject shifting should probably be related to the larger Indonesian process that shifts intransitive subjects to the right of the verb, under discourse conditions like those described for subject shifting in the text. This process does not, to my knowledge, affect subjects of superficially transitive verbs; and it has been rather more difficult for me to elicit than what I have described as subject shifting in the text. More investigation of this area is needed.

BIBLIOGRAPHY

ANDERSON, S.R.

- 1977 'On Mechanisms by Which Languages Become Ergative'. In: C.N. Li, ed. *Mechanisms of Syntactic Change*, 317-63. Austin, TX: University of Texas Press.

CHUNG, S.

- 1976a 'An Object-creating Rule in Bahasa Indonesia'. *Linguistic Inquiry* 7:41-87.
- 1976b 'On the Subject of Two Passives in Indonesian'. In: C.N. Li, ed. *Subject and Topic*, 57-98. New York: Academic Press.
- 1978 *Case Marking and Grammatical Relations in Polynesian*. Austin, TX: University of Texas Press.

DARDJOWIDJOJO, Soenjono

- 1977 The Semantic Structures of the Adversative ke- -an Verbs in Indonesian. Paper presented at the Austronesian Symposium, University of Hawaii, August 1977.

DYEN, I.

- 1964 *Beginning Indonesian, Lessons 1-24*. 4 vols. U.S. Department of Health, Education, and Welfare.

GIBSON, Jeanne D.

- 1978 'Surface and Derived Structure in Indonesian'. See pp.537-57 in this volume.

GONDA, J.

- 1952 'Indonesian Linguistics and General Linguistics II'.
Lingua 3:17-51.

STEVENS, A.M.

- 1970 'Pseudo-transitive Verbs in Indonesian'. *Indonesia* 9:
67-72.

VERHAAR, J.W.M.

- 197 'Syntactic (in)alienability in Indonesian'. See pp.317-
25 in this volume.

