1988

Maithili Verb Agreement and the Control Agreement Principle

Gregory Stump
University of Kentucky, gstump@uky.edu

Ramawatar Yadav
Tribhuvan University

Right click to open a feedback form in a new tab to let us know how this document benefits you.

Maithili Verb Agreement and the Control Agreement Principle

Maithili Verb Agreement and the Control Agreement Principle*

Gregory T. Stump
University of Kentucky

Ramawatar Yadav
Tribhuvan University, Kathmandu

Keenan (1974:302) first set forth an important generalization about the appearance of agreement morphology in natural language:

(1) Function symbols may present a morpheme whose form is determined by the noun class of the argument expression.

That is, assuming that linguistic expressions denote functions and arguments in various combinations, the agreement morphology borne by a given functor expression may be (partially or wholly) determined by its nominal argument(s). Thus, in each of the constructions listed in (2)-(8), the underlined functor may be marked for agreement with its nominal argument, as the accompanying examples illustrate.

(2) [NP VP]:   John snore-s.
                        3SG   *3SG*

(3) [V NP]: e.g. Swahili: U-me-ki-leta   chakula?
                               2SG-TNS-3SG-bring food
                               'Have you brought the food?'

(4) [Det N]: e.g. French: la   fille
                               the(FSG) girl(FSG)

(5) [Adj N]: e.g. French: petites   filles
                               little(FPL) girls(FPL)

(6) [Gen N]:[1] e.g. Hindi: Rām-kī   bahan
                               Ram-FSG sister(FSG)
                               'Ram's sister'

(7) [N Rel]: e.g. Dyirbal:

bayi   yaṛa   baŋgun   ḍugumbiṛu [wayṇḍi-ṇu-ru   ] buṛan.
NM(ABS) man(ABS) NM(ERG) woman(ERG) go=uphill-REL-ERG saw
'The woman who was going uphill saw the man.'

(8) [P NP]: e.g. Welsh: iddi   hi
                               to(3SGF) her

Note that (1) doesn't actually rule out the possibility that a functor might agree with a nominal expression other than one of its arguments; it would, however, be possible to strengthen Keenan's generalization so as to rule out any agreement relations which it does not specifically license. This is essentially the form in which Keenan's generalization has been reconstructed within the framework of Generalized Phrase Structure Grammar (Sag & Klein (1982); Gazdar, Klein, Pullum & Sag (1985)). In this framework, the *Control Agreement Principle* (CAP) requires that every agreement relation between separate constituents be licensed by a syntactic relation of *control*. The latter relation is defined in such as way that A controls B if A and B form a constituent whose interpretation is the functional application of B's meaning to A's meaning. Thus, the CAP entails that in each of the constructions in (2)-(8), an agreement relation between the two constituents is possible only because one constituent controls the other.

The CAP makes very specific predictions about possible patterns of verb agreement in simple sentences. It predicts that verbs should only be able to agree with two sorts of NPs. They may, of course, agree with an object NP by which they are controlled; and because they carry the inflectional features of the VP which they head, they may also agree with *its* controller, namely the subject. Other imaginable patterns of verb agreement are ruled out by the CAP. Thus, as a universal, the CAP would be disconfirmed if a language were found in which a verb could agree not only with its arguments, but also with possessive NPs modifying the heads of these arguments.

Languages have, of course, been identified in which a verb may agree with a NP whose *logical* function is that of a possessive modifying one of the verb's arguments. Consider, for example, the following pair of sentences from Chickasaw, a Western Muskogean language (cited from Munro (1984:646)):

(9)   Sa-pãsh-at   litiha.   (10)   Sa-pãsh-at   ã-litiha.
        1SG-hair-SU dirty   *1SG-hair-SU 1SG-dirty*
        'My hair is dirty.'   'My hair is dirty.'

In (9), the verb agrees in person and number with the subject NP **sa-pãsh-at** 'my hair'; in this case, the agreeing verb remains in its unmarked form. (10) is truthconditionally equivalent^2 to sentence (9); in (10), however, the verb agrees not with **sa-pãsh-at**, but with the first person singular possessor (whose sole realization in (10) is as the possessive prefix **sa-** 'my'). Similar facts have been observed in a number of diverse languages.

Verb-possessor agreement of this sort would appear to be inconsistent with the CAP. It has been argued, however, that languages exhibiting this kind of agreement pattern do so because they have a rule of Possessor Raising, whose effect is to raise possessors out of argument NPs and to give them argument status. For example, Munro and Gordon (1982:95ff) and Munro (1984:636ff) argue that sentence (10) derives from (9) by means of a Possessor Raising rule, so that despite their logical equivalence, the two sentences differ in structure: whereas (9) has the NP **sa-pãsh-at** as its subject, (10) is claimed to have the understood first person singular possessor as its subject. Thus, languages showing verb-possessor agreement patterns such as that in (10) need not be viewed as disconfirming the CAP, provided that they afford sound independent motivation for postulating a Possessor Raising rule. Independent arguments for a rule of Possessor Raising have been proposed for a variety of languages.

Here, we show that the Maithili language presents genuine counterevidence to the CAP. In particular, we demonstrate that despite the widespread incidence of verb-possessor agreement in Maithili, there is

no independent evidence for a rule of Possessor Raising in this language; on the contrary, there is clear evidence against any such rule. (Throughout our discussion, rules of Possessor Raising will be described in the familiar terminology of transformational grammar, for expository reasons; but the evidence discussed here casts doubt on the validity of any sort of 'raising' analysis, whether this involves transformations, lexical rules, or GPSG-style metarules.)

1. The Maithili verb agreement system

Maithili is a modern Indo-Aryan language in the Bihari group; it is spoken by approximately 23 million people in the Bihar state of India and in the southeastern plains of Nepal. The variety of Maithili discussed here is the dialect of Janakpur, Nepal, spoken natively by Professor Yadav.

In Maithili, verbal agreement inflections encode the person and the honorific grade of the controlling NP. Consider, for instance, the present tense forms of **aich** 'to be' in (11); in each of these examples, the form of the verbal agreement inflection is determined by the person and the honorific grade of the subject NP.

(11) a. ham chi
      I   am(1)

    b. ahã chi
      you(H) are(2H)

    c. tõ   cha(h)
      you(MH) are(2MH)

    d. tõ   che
      you(NH) are(2NH)

    e. o   chaith
      he(H) is(3H)

    f. u   aich
      he(NH) is(3NH)

Note that Maithili verbal inflection distinguishes three honorific grades in the second person (namely, honorific, mid-honorific, and non-honorific)[3] and two grades in the third person (honorific and non-honorific); note in addition that neither the gender[4] nor the number of the controlling NP is reflected in a verb agreement inflection.

In a thorough description of Maithili verb morphology, two kinds of agreement inflections must be distinguished. A verb's *primary* agreement inflection is controlled by its subject, and is obligatory; thus, in each of the examples in (11), the personal inflection of the verb is primary.

In addition to its primary inflection, a Maithili verb may optionally bear a *secondary* agreement inflection. The latter is frequently controlled by one of the verb's object arguments; in each of the examples in (12), for instance, the verb bears a secondary agreement inflection controlled by the direct object NP. (In these examples--and throughout--agreement inflections are glossed in the sequence 'primary + secondary'.)

(12) a. dekhal-thun.
      saw-3H+2MH
      'He (H) saw you (MH).'

    b. dekhal-iain.
      saw-1+3H
      'I saw him (H).'

    c. dekhl-ahun.
      saw-2MH+3H
      'You (MH) saw him (H).'

    d. dekhal-ia.
      saw-1+2MH
      'I saw you (MH).'

As these examples show, Maithili verbal morphology is highly fusional: in general, it isn't possible to distinguish separate primary and secondary agreement affixes on the verbs in (12); on the contrary, both the primary and the secondary inflection may be embodied in a single affix, such as **-thun** ('3H + 2MH') in (12a). Moreover, the exact form of these agreement affixes may vary with the tense of the verb. The inventory of regular past tense agreement inflections is given in Table I (cf. Williams (1973:361)).

Subject	Nonsubject					
	3H	3NH	2H	2MH	2NH	1
3H	khin(h) thin(h)	khin(h) thin(h)	ain(h) Ø	khun(h) thun(h)	khun(h) thun(h)	ain(h) Ø
3NH	kain(h)	kai(k)	Ø	ka(h)	kau(k)	Ø
2H	iain(h)	iai(k)	——	——	——	Ø
2MH	ahun(h) aha(h)	aha(k) aha(h)	——	——	——	Ø
2NH	ahun(h)	ahi(k)	——	——	——	Ø
1	iain(h)	iai(k)	Ø	ia(h) io	iau(k)	——

Table I - Composite past tense agreement inflections in Maithili
[Ø = no overt marking; ___ = does not exist]

The principles governing the employment of secondary inflections are fundamentally pragmatic in nature. According to Jhā (1958:472), a secondary inflection encodes the 'most prominent' NP in the clause other than the subject itself. Thus, in the examples in (12), the direct object argument is necessarily the most prominent nonsubject NP, and thus controls the secondary agreement inflection. In (13), on the other hand, it is the instrumental object **hunkā** that is the most prominent nonsubject NP and thus controls secondary agreement.

(13)   tõ hunkā-sa   kiæ khisiæl chahun?
      you him(H)-INSTR why angry   are(2MH+3H)
      'Why are you angry with him?'

The 'prominence' of a NP seems to be a function of three interrelated factors: (i) the extent to which the speaker desires to focus on or emphasize that NP; (ii) the honorific grade of that NP; and (iii) the animacy of the referent of the NP. To see the influence of each of these factors, consider the following examples.

(i) The expressions in (14) could both be used as (loose) translations of the English sentence **I saw him**; nevertheless, they differ in their emphasis, and hence also in their agreement patterns. In (14a), there is no particular emphasis on any possessor linked to the direct object; thus, the direct object controls the secondary agreement in this instance. In (14b), on the other hand, the speaker focusses on the addressee as a possessor associated with the direct object; accordingly, it

is the possessor which here controls the secondary agreement.

(14) a. dekhal-iai.   b.   dekhal-iau.
       saw-1+3NH   *saw-1+2NH*
       'I saw him (NH)'   'I saw one of yours (NH)'

(ii) The 'higher' the honorific grade of a nonsubject NP, the more likely it is to control secondary agreement. The third person honorific is the highest honorific form, and the first person is the lowest. Quite surprisingly, the second person honorific is no more likely to control secondary agreement than the first person; as Williams (1973:359) notes, this may be a consequence of the fact that the second person honorific agreement inflections are always identical to those of the first person. Thus, the various combinations of person and honorific grade can be viewed as constituting a hierarchy something like (15); the higher the ranking of a NP within this hierarchy, the more likely that NP is to trigger secondary agreement.

(15)   3H < 2MH < 2NH, 3NH < 1, 2H

As Williams (1973:359,396) observes, a NP at the lowest rank in this hierarchy does not ordinarily control secondary agreement--that it does so only 'when it occurs alone in the Object position and is being focussed upon.' This can be seen in the following contrasting examples: in each of (16a-d), the verb **aich** 'to be' shows a secondary agreement inflection encoding the possessor modifying the predicate nominal; but when this possessor is first person or second person honorific, as in (16e,f), no secondary agreement inflection is used.[5]   (Cf. also Jhā (1958:474).)

(16) a. i   hunkar kukur chain.
         this(NH) his(H) dog is(3NH+3H)
         'This is his (H) dog.'
     b. i tohar   kukur cha(h).
         your(MH)   is(3NH+2MH)
         'This is your (MH) dog.'
     c. i tohar   kukur chau.
         your(NH)   is(3NH+2NH)
         'This is your (NH) dog.'
     d. i okar   kukur chai.
         his(NH)   is(3NH+3NH)
         'This is his (NH) dog.'
     e. i hamar kukur ai.
         my   is(3NH)
         'This is my dog.'
     f. i ahāke   kukur ai.
         your(H)   is(3NH)
         'This is your (H) dog.'

(iii) The relative prominence of a NP also depends upon the animacy of its referent: in determining a secondary agreement inflection, a NP

with an animate referent will ordinarily take precedence over a nominal with inanimate reference, even if the latter is more heavily emphasized (Jhā (1958:473)); for example, in sentence (17), **hunkar** controls the secondary agreement inflection even if **ghar** is what is emphasized.

(17)   i   hunkar ghar   chain.
            this(NH) his(H) house is(3NH+3H)
            'This is his (H) house.'

Notwithstanding the clearly pragmatic nature of the notion 'prominence', there are certain strictly grammatical constraints on the use of secondary verb agreement inflections. For example, these inflections generally cannot be controlled by the object of a postposition; thus, the sentences in (18) have no analogue in which the secondary agreement inflection is controlled by the object of **me** 'in'.

(18)   torā   hamrā / hunkā / okrā   me visvās cha(h).
            you(MH) me   him(H) him(NH) in faith   is(3NH+2MH)
            'You (MH) have faith in me/him (H)/him (NH).'

In addition, secondary agreement inflections generally cannot be controlled by a NP coindexed with the subject NP.

The fundamental problem which we shall address in this paper concerns examples such as (19)-(21).

(19)   tohar   bāp   aelthun.
            your(MH) father came(3H+2MH)
            'Your (MH) father (H) came.'
(20)   ham torā   beţā-ke   dekhaliau.
            I   your(NH) son-OBJ saw(1+2NH)
            'I saw your (NH) son.'
(21)   tohar   bābu   Mohan-ke dekhalthun.
            your(NH) father(H) Mohan-OBJ saw-(3H+2NH)
            'Your father saw Mohan.'

In each of these examples, the verb bears a secondary agreement inflection encoding the person and honorific grade of a possessive NP modifying one of the verb's arguments: in (19) and (21), the verb agrees with the second person possessor modifying the subject, and in (20), the verb agrees with a possessor modifying the direct object. Each of these examples appears to counterexemplify the CAP: in each case, the NP controlling the secondary verbal agreement inflection is apparently something other than an argument of the verb.

The important question to ask, at this juncture, is whether (19)-(21) are genuine counterexamples to the CAP. Could it be that although they are interpreted as possessors, the NPs controlling the secondary agreement inflections in these sentences are in fact superficial arguments of the verb? That is, could it be that Maithili has a rule converting possessive NPs into arguments of a higher verb? The question is one which must be taken seriously, since a number of languages have been claimed to have a Possessor Raising rule of just this kind.

In the following two sections, we shall address this question in detail. In particular, we shall survey the kinds of evidence that have been cited in favor of postulating rules of Possessor Raising in various languages; then we shall consider whether analogous evidence exists in Maithili. As we shall show, there do not, in fact, appear to be good grounds for claiming that Maithili has a rule of Possessor Raising.

2. Possessor Raising rules

Many languages have been claimed to have rules of Possessor Raising, whose intuitive effect is to convert a possessive NP modifying the head of a 'host NP' into an independent argument within the clause containing the host NP. In fact, two rather different sorts of Possessor Raising rules have been proposed:

(i) On the one hand, it has been argued that some languages have a Possessor Raising rule that assigns a raised possessor the argument status which its host NP previously held (causing the head of the host NP to be assigned some other, subsidiary status); for example, given a possessor whose host NP is the subject of a sentence, this kind of rule raises the possessor to subject status. This sort of Possessor Raising rule will be referred to as a rule of *Possessor-to-Host Raising*.

(ii) A second kind of Possessor Raising rule has been proposed whose effects are rather different: this sort of rule raises a possessor out of its host NP and assigns it the status of a dative object, allowing the host NP to retain whatever argument status it previously held. For example, given a possessor whose host NP is the subject of a sentence, this kind of Possessor Raising rule raises the possessor to dative object status, leaving the host NP in other respects intact. This kind of Possessor Raising rule will be referred to as a rule of *Possessor-to-Dative Raising*.

In this section, we shall survey the kinds of arguments that have been advanced in favor of Possessor Raising rules; since the arguments that have been offered are in many cases similar from language to language, we shall, for purposes of exemplification, focus on evidence from Chickasaw and Tzotzil.[6]

Chickasaw verb agreement inflections may encode the person and number of subjects as well as of direct and oblique objects; verbs are, however, never inflected for agreement with more than two of their arguments. Chickasaw has three distinct series of agreement affixes, which Munro & Gordon (1982:83) label I, II, and III. (The factors that determine which series will be employed in a given case are fairly intricate, but needn't concern us here; see Payne (1982) and Munro & Gordon (1982) for discussion.) Besides functioning as verbal inflections, the affixes in series II and III are used to inflect nouns for agreement with inalienable and alienable possessors, respectively. Thus, the subject of (22a) is marked for a first person singular inalienable possessor; similarly, in (23a), **ihoo** 'woman' is identified as an alienable possessor by the concording prefix **im-** on the possessed noun.

(22) a. Sa-pãsh-at   litiha.
    1SGII-hair-SU   dirty
    'My hair is dirty.'

    b. Sa-pãsh-at   ã-litiha.
    1SGII-hair-SU   1sIII-dirty
    'My hair is dirty.'

(23) a. Ihoo   im-ofi'-at   ishto.
    woman 3SGIII-dog-SU big
    'The woman's dog is big.'

    b. Ihoo-at   ofi'-at   im-ishto.
    woman-SU dog-SU 3SGIII-big
    'The woman's dog is big.'

(24) a. Ofi'-at   ihoo   im-pask-ã   apatok.
    dog-SU woman 3SGIII-bread-NS ate
    'The dog ate the woman's bread.'

    b. Ofi'-at ihoo-ã   paska im-apatok.
    dog-SU woman-NS bread 3SGIII-ate
    'The dog ate the woman's bread.'   (Munro (1984:637))

Chickasaw presents several sorts of evidence for a rule of Possessor Raising--that is, for a rule which allows the possessors in (22a)-(24a) to function as arguments of the verb, as in (22b)-(24b). Consider first the examples in (22) and (23); in these instances, Possessor Raising is claimed to convert the possessors into subjects. This claim is, of course, supported by the fact that like subjects, the possessors in (22b) and (23b) trigger verb agreement; specifically, they require the use of concording class III affixes.[7] But there is additional evidence for Possessor-to-Subject Raising in these examples:

(i) The possessor in (23b) shows the subject case-marking suffix -at,[8] and although the possessed noun **ofi'** 'dog' does retain its own subject case-marking in this example, it needn't do so, according to Munro & Gordon (1982:95ff).[9]

(ii) In (23b), the possessed noun **ofi'** 'dog' loses its possessor-coding prefix **im-**, suggesting that the logical possessor in (23b) no longer has the syntactic status of a possessive modifier of **ofi'**. (This option is apparently present only in cases of alienable possession--Munro (1984:646).)

Turn now to the examples in (24), in which Possessor Raising is claimed to convert the possessor into an object.[10] Like an ordinary object argument, the logical possessor in (24b) triggers verb agreement.[11] But here, too, the possessor shows additional signs of having become an argument of the verb:

(i) The possessor in (24b), unlike that in (24a), shows the positional mobility typical of an independent argument constituent:

(25) Ofi'-at paska im-apatok ihoo-ã.
    Ihoo-ã ofi'-at paska im-apatok.
    Ofi'-at pask-ã ihoo im-apatok.   (Munro (1984:638))

(ii) Like an object argument, the possessor in (24b) may, optionally, bear the 'nonsubject' suffix -ã. (Observe that in (24b) and (25), only one

of the two object NPs bears the nonsubject marker; see Munro (1984:638) for the rather complicated distributional properties of this affix.)

Another sort of evidence for Possessor Raising is vividly exemplified by some data from Tzotzil, a Mayan language discussed by Aissen (1979, 1983, 1985).

(26) a.   L-i-s-maj-ik.
           ASP-1ABS-3ERG-hit-PL
           'They hit me.'   (1985:13)

      b.   Ch-a-k-ak'-be   kremotik.
           ASP-2ABS-1ERG-give-B boys
           'I'll give you the boys.'   (1985:13)

      c.   Chotan-at.
           seat-PASS
           'She was seated.'   (1979:94)

      d.   Ch-i-k'elan-b-at   jun tzeb.
           ASP-1ABS-present-B-PASS one girl
           'I'm being presented with a girl.' (1979:94)

(27) a.   Ch-i-s-tzak-be   li   j-k'ob-e.
           ASP-1ABS-3ERG-grab-B the 1POSS-hand-PCL
           'She grabs my hand.'   (1979:95)

      b.   L-i-k'as-b-at   j-k'ob.
           ASP-1ABS-break-B-PASS 1POSS-hand
           'My hand was broken.'   (1979:95)

Tzotzil has an ergative agreement system in which verbs agree with their grammatical subject and direct object arguments, as in (26a). Aissen (1983) argues, in addition, that Tzotzil possesses an obligatory rule of Indirect Object Advancement, which converts indirect objects into direct objects and whose application is signalled by a verbal suffix -be (glossed in (26) and (27) as 'B'); thus, although the second person argument in (26b) is logically an indirect object, it has been advanced to direct object status (as the suffix -be indicates) and thus controls verb agreement.

Tzotzil also possesses a rule of Passive, which converts direct objects into subjects and concomitantly introduces the verbal affix -at, as in (26c). (There is no overt agreement affix in (26c) because the third person absolute is unmarked.) Not unexpectedly, Indirect Object Advancement 'feeds' Passive, producing sentences in which a logical indirect object serves as the grammatical subject of a verb marked with both -be and -at (→ -b-at), as in (26d).

Now, Aissen (1979, 1982, 1985) argues that Tzotzil has a rule of Possessor-to-Dative Raising which affects possessors in direct object hosts (obligatorily, in the case of third person possessors, but never if the possessor is coreferential with the subject of the given clause). Like other indirect objects, a raised possessor is obligatorily advanced to direct object status, and thus triggers be-marking and object-agreement in the governing verb, as in (27a); moreover, a raised possessor which has acquired direct object status may passivize, so that it functions as the subject of a -b-at-marked verb; an example is the first person subject of (27b). Thus, in Aissen's analysis, a raised possessor behaves like an object argument with respect to at least two different relation-changing

rules: Indirect Object Advancement and Passive.

It will prove helpful at this juncture to summarize the kinds of evidence that have been cited in favor of postulating rules of Possessor Raising:

(A) **verb agreement:**
    (i)   a logical possessor may control verb agreement;
    (ii) a possessed nominal may fail to control verb agreement despite its logical status as an argument of the verb;

(B) **case marking:**
    (i)   a logical possessor may show the case marking of an argument NP rather than that of a possessive modifier;
    (ii) a possessed nominal may fail to show the expected case marking despite its logical status as an argument of the verb;

(C) **noun-possessor agreement:**
    a logical possessor may fail to trigger the appearance of a concording possessive affix on the possessed nominal;

(D) **the constituent structure of the possessor and the possessed nominal:**
    a possessor and the corresponding possessed nominal may show the positional mobility of independent constituents;

(E) **relation-changing rules:**
    a logical possessor may function as an argument NP with respect to a variety of relation-changing rules, such as Indirect Object Advancement, Passive, etc.

Needless to say, one would not have to adduce evidence of all five kinds in order to justify postulating a rule of Possessor Raising for some language; it is significant, however, that evidence of the kinds listed in (A)-(E) does tend to show up in clusters in the languages for which such a rule has been proposed. Nevertheless, if a language were to present only a single kind of evidence in favor of a Possessor Raising rule, this could hardly be considered a compelling reason for postulating such a rule for that language; indeed, the weight of the evidence would appear to militate against doing so. As we shall now show, Maithili is a language which, despite its pattern of verb-possessor agreement, provides no additional evidence for a Possessor Raising rule, and in fact provides abundant evidence against such a rule.

3. Evidence against Possessor Raising in Maithili

Most of the relevant morphological evidence is clearly embodied in sentence (28).

(28)   tohar   bāp   aelthun.
         your(MH) father came(3H+2MH)
         'Your (MH) father (H) came.'

The patterns of verb agreement and case inflection in this sentence both cast doubt on the claim that verb-possessor agreement is the consequence of a rule of Possessor-to-Host Raising in Maithili; the pattern of case inflection, moreover, casts equal doubt on the claim that it is the

consequence of a rule of Possessor-to-Dative Raising.

Consider first the agreement pattern in sentence (28). In this sentence, **tohar bāp** 'your father' is the logical subject, but both elements in this combination trigger verb agreement: **bāp** controls a primary, third person honorific inflection, while **tohar** controls a secondary, second person mid-honorific inflection. Since it is always the superficial subject of a Maithili sentence which controls primary agreement inflections, the pattern of verb agreement in (28) entails that **tohar** is not the superficial subject of this sentence--on the contrary, **bāp** must be viewed as the (head of the) subject; accordingly, the fact that **tohar** controls secondary verb agreement in (28) cannot be viewed as the effect of a rule of Possessor-to-Host Raising.

Consider now the pattern of case inflection in (28): **tohar** is in the genitive case, while **bāp** is in the (unmarked) nominative case. If the pattern of verb-possessor agreement in (28) were attributed to the operation of a Possessor-to-Host Raising rule, then one would expect the logical possessor in (28) to appear in its nominative form **tõ**; yet, (29) is ungrammatical.

(29)   *tõ   bāp aelthun.
          you(NOM)

Thus, the patterns of case marking and verb agreement in sentence (28) lead inevitably to the conclusion that **bāp** is the (head of the) superficial subject of (28), and hence that the pattern of verb-possessor agreement in (28) is not the effect of a Possessor-to-Host Raising rule.

Similar evidence against a rule of Possessor-to-Host Raising is found in (30) and (31):

(30)   ham torā   betā-ke   dekhaliau.
          I   your(NH) son-OBJ saw(1+2NH)
          'I saw your (NH) son.'

(31)   ham Jibach-ak   kukur-ke   dekhaliain.
          I   Jibach-GEN dog-OBJ   saw(1+3H)
          'I saw Jibach's (H) dog.'

Here, **torā betā-ke** 'your son' and **Jibach-ak kukur-ke** 'Jibach's dog' are the logical direct objects. If the verb-possessor agreement in these sentences were attributed to a rule of Possessor-to-Host Raising, one would expect (i) that the logical possessor would take on objective case marking, and (ii) that the possessed noun would lose its objective case marking. Prediction (i) cannot be verified in the instance of (30), since the genitive and objective cases are ordinarily syncretized in Maithili pronouns (but see below). In (31), however, prediction (i) is not borne out: **Jibach** must retain its genitive case marking, and so cannot take on its objective form--

(32)   *ham Jibach-ke kukur-ke dekhaliain.
                          OBJ
          'I saw Jibach's (H) dog.'

Prediction (ii) is likewise unconfirmed: **betā** 'son' retains its objective case marking in (30), and is in fact ungrammatical without it--

(33)   *ham torā betā dekhaliau.

The objective case marker -**ke** does happen to be omissible in (31), but only because this affix is always optional as a marker of nonpersonal animate direct objects; its presence in such cases generally correlates with the definiteness of the object--see Jhā (1958:591).)

The pattern of case-inflection in (28) also suggests that the verb-possessor agreement in this sentence is not the consequence of a rule of Possessor-to-Dative Raising. As noted above, the genitive and objective forms of a pronoun are ordinarily syncretized; for example, **torā** functions as a genitive in (30) but as an object in (34).

(34)   ham torā   kahaliau.
          I   you(NH) told(1+2NH)
          'I told you.'

Most pronouns, however, have a distinct, unambiguously genitive case-form used to modify nominals which themselves lack case affixation. Thus, because the subject of (28) is in the unmarked, nominative case, the possessive pronoun assumes its unambiguously genitive case-form **tohar**. This makes it doubly implausible to assume that the pattern of verb-possessor agreement in (28) is the effect of a rule of Possessor-to-Dative Raising: not only is the logical possessor in (28) unequivocally genitive rather than dative in case--it is, in addition, explicitly marked as modifying the unmarked nominative form **bāp**.

Thus, the patterns of verb agreement and case marking in Maithili provide a variety of reasons for doubting the existence of a Possessor Raising rule in this language (whether this be a rule of Possessor-to-Host Raising or Possessor-to-Dative Raising); moreover, Maithili seems to lack any other sort of inflectional evidence which could potentially bear on this matter. Recall that in Chickasaw, the absence of a possessor-coding inflection on an alienably possessed noun (such as **ofi'** 'dog' in (33)) constitutes evidence for a Possessor Raising rule, since possessed nouns are ordinarily inflected for agreement with their possessors in Chickasaw; in Maithili, however, possessed nouns are never inflected in this way--for this reason, the absence of a possessor-coding inflection on the possessed nouns in (28), (30), and (31) fails to provide evidence for or against a Possessor Raising rule in Maithili. In short, notwithstanding the fact that logical possessors may control secondary verbal agreement inflections in Maithili, the remaining inflectional evidence implies that there is no Possessor Raising rule in this language.

This implication is clearly confirmed by a number of different syntactic phenomena. Take the question of constituent structure. Ordinarily, the linear ordering of constituents in a Maithili sentence shows a great deal of freedom, as the examples in (35) show.

(35) a. hamrā   pā̃ctā   beṭā aich.
          me(DAT) five-CLASS sons are(3NH)
          'I have five sons.'
      b. beṭā hamrā pā̃ctā aich.
      c. aich hamrā beṭā pā̃ctā.
      d. beṭā hamrā aich pā̃ctā.

But consider sentence (30), which shows verb-possessor agreement. Any reordering of the constituents in this sentence in which **torā** 'your' does not immediately precede **beṭā-ke** 'son' is ungrammatical, as the examples (36) suggest.

(36) a. *ham torā dekhaliau beṭā-ke.
      b. *ham beṭā-ke torā dekhaliau.
      c. *ham beṭā-ke dekhaliau torā.
      d. *ham dekhaliau beṭā-ke torā.
      e. ham dekhaliau torā beṭā-ke.

Thus, logical possessors which control verb agreement do not show the positional mobility of independent argument constituents in Maithili; nor do the corresponding possessed nominals show any sign of losing their status as (heads of) argument constituents.

Other syntactic evidence casts similar doubt on the validity of a Possessor Raising analysis for Maithili. Consider, for example, the transitivizing process which relates such verb pairs as those in (37); however this process is to be described formally, it has the effect of allowing the subject of an intransitive clause such as (38a) to be realized as the direct object of the corresponding transitive clause, as in (38b). Similarly, a more general derivational process of causativization[12] allows the subject of a transitive clause such as (39a) to be realized as the indirect object of the corresponding causative clause, as in (39b). What is significant here is that a possessor modifying the logical subject of a clause never behaves as a subject for the purposes of transitivization or causativization; thus, it is the logical subject rather than the possessor in sentences (40a) and (41a) which appears as an object argument in the corresponding transitive/causative clauses in (40b) and (41b).

(37) a. charab   'to get thatched'   chārab   'to thatch'
      b. marab   'to die'   mārab   'to kill'
      c. nikalab 'to come out'   nikālab 'to bring out'
      d. sanab   'to get mixed'   sānab   'to mix'
      e. sudharab 'to improve (intr.)'   sudhārab 'to improve (tr.)'
(38) a. ghar charal.
          house got=thatched(3NH)
          'The house got thatched.'
      b. jan   ghar chārlak.
          laborer house thatched(3NH)
          'The laborer thatched the house.'
(39) a. Rames kitāb paṛhlain(h).
          Ramesh book read(PAST-3H)
          'Ramesh read the book.'

(39) b. māsṭar Rames-ke kitāb paṛhɔlain(h).
          teacher Ramesh-OBJ book read(CAUS-PAST-3H)
          'The teacher taught Ramesh the book.'
(40) a. hamar ghar charal.
          my   house got=thatched(3NH)
          'My house got thatched.'
      b. jan   hamrā ghar-ke   chārlak.
          laborer my   house-ACC thatched(3NH)
          'The laborer thatched my house.'
(41) a. tohar   beṭā kitāb paṛhalkau.
          your(NH) son book read(PAST-3NH+2NH)
          'Your son read the book.'
      b. māsṭar torā   beṭā-ke   kitāb paṛhɔlthun.
          teacher your(NH) son-OBJ book read(CAUS-PAST-3H+2NH)
          'The teacher taught your son the book.'

This suggests that the appearance of verb-possessor agreement in (41a) cannot be attributed to a rule of Possessor-to-Host Raising.

A similar conclusion follows from the behavior of possessors in the passive construction, as the examples in (42) show.

(42) a. o   torā   bāp-ke   dekhalthun.
          he(H) your(NH) father-OBJ saw(3H+2NH)
          'He saw your father.'
      b. tohar bāp   dekhal gel.
          your father seen   went(3NH)
          'Your father was seen.'
      c. *tõ   bāp(-ke) dekhal gele.
          you(NOM)   (2NH)

In (42a), the possessor modifying the logical object controls the verb's secondary agreement inflection. Yet, the only possible passive for (42a) is (42b), whose subject is the logical object of (42a); (42a) cannot have a passive such as (42c), whose subject is the logical possessor in (42a). For this reason, it would be implausible to assume that the agreement pattern in (42a) exists as an effect of Possessor-to-Host Raising. Here, as in all other syntactic contexts in which possessors behave differently from a verb's arguments, the Possessor Raising hypothesis is disconfirmed.[13]

5. Conclusion.

We conclude from this that in its strongest form, the CAP is inconsistent with the evidence from Maithili--that a formal description of Maithili verb agreement will require some device which licenses a broader range of agreement relations than are possible under the CAP alone.[14] This conclusion raises several important issues, whose resolution will plainly require further research. Consider, for example, the matter of Possessor Raising. The Maithili facts make it clear that verb-possessor agreement cannot always be viewed as sure evidence for such a rule; this being so, it seems easily possible that there are other languages whose patterns of

verb-possessor agreement do not arise as a consequence of Possessor Raising. More broadly, the Maithili evidence raises the question of whether other sorts of counterevidence to the CAP might exist. Relevant here is the fact (noted by Anderson (1985:196)) that in Chinook and in the Northwest Caucasian languages, verbs may agree with benefactive and instrumental NPs; unless such NPs can be shown to qualify as arguments, this evidence seems to present an independent sort of disconfirmation of the CAP, as Zwicky (1986) has pointed out. Only when these questions are resolved will it be possible to determine exactly how the CAP must be weakened.

Footnotes

*The following abbreviations will be employed in glossing example sentences cited in the text.

Number, gender:
PL	plural
SG	singular
F	feminine

Case:
ABS	absolutive
ACC	accusative
DAT	dative
ERG	ergative
GEN	genitive
INSTR	instrumental
NOM	nominative
NS	non-subject
OBJ	objective
SU	subject

Other noun markers:
NM	Dyirbal noun class marker
POSS	possessor-coding inflection

Person:
1	first person
2	second person
3	third person

Tense, aspect, voice:
PAST	past tense marker
TNS	tense marker
ASP	aspectual marker
PASS	passive marker

Maithili honorific grades:
HH	high honorific
H	honorific
MH	mid-honorific
NH	non-honorific

Chickasaw agreement classes:
I	'active' class of agreement inflections
II	'patient' class
III	'dative' class

Other verb markers:
B	Tzotzil affix coding indirect object advancement
CAUS	causative marker
REL	relative affix

Other grammatical markers:
DET	determiner
PCL	particle
PRED	predicative suffix
CLASS	classifier

1. Limiting consideration to those cases in which the head noun is logically relational (e.g. **the inside of the bottle**), Keenan (1974:299) regards the genitive as the argument of the head noun in a genitive-noun construction. In many cases, however, it is preferable to view the genitive as the functor; this makes it possible to

capture the generalization that, semantically as well as syntactically, genitives frequently behave like determiners.

2. (9) and (10) are pragmatically distinct, however: (10) focuses more closely on the first person singular possessor.

3. A fourth, 'high honorific' grade is distinguished in the pronoun system: **apne chi** 'you(HH) are(2H)'. Note, however, that **apne** and **aha** are associated with the same verb agreement inflections.

4. In highly formal and literary styles, a gender distinction between masculine and feminine is shown by intransitive verbs in non-present tense forms of the third person and by transitive verbs in future tense forms of the third person: for example, **rājā aelā(h)** 'the king came', but **rāni aeli(h)** 'the queen came'; **rājā khaetā(h)** 'the king will eat', but **rāni khaeti(h)** 'the queen will eat'.

5. It should be noted that the hierarchy in (15) is systematically subverted in one respect: there is a tendency to upgrade the honorificity of a nominal modified by an honorific possessor when the modified nominal has human reference. Thus, because its possessive modifier is honorific, the noun phrase **hunkar bằp** 'his father' itself functions as an honorific form, as the pattern of verb-object agreement in (i) reveals.

(i) a. ham hunkā bāp-ke dekhaliain.
  I his(H) father-OBJ saw-1+3H
  'I saw his father.'
 b. *ham hunkā bāp-ke dekhaliai.
  saw-1+3NH

6. This is not intended as an exhaustive survey of the evidence for Possessor Raising in Chickasaw and Tzotzil. In particular, we ignore certain evidence (such as the switch reference facts discussed by Munro & Gordon (1982:97)) which provides no useful criterion for evaluating the Maithili data.

7. The third person is unmarked in classes I and II, hence the seeming lack of verb agreement in examples (22a) and (23a).

8. Because the logical possessor in (22b) is pronominal, it receives no overt expression as an independent constituent; accordingly, the case-marking of the possessor is unobservable in this sentence.

9. Munro & Gordon (1982:96) and Munro (1984:646f) point out that possessors sometimes acquire subject case-marking without triggering the appearance of a concording class III affix on the verb.

10. It is unclear whether Munro views 'Object Possessor Raising' in Chickasaw as an instance of Possessor-to-Host Raising or of Possessor-to-Dative Raising. From her discussion, however, the latter analysis seems most fitting; in particular, the possessor in (24b) is like an ordinary indirect object in that it takes precedence over a direct object in controlling verb agreement. Cf. Munro (1984:638).

11. The third person is unmarked in class II, hence the apparent absence of verb agreement in example (24a).

12. See Yadav (1985) for a thorough discussion of transitivization and causativization in Maithili.

13. One might try to argue that the phenomenon of verb-possessor

agreement can be brought into conformity with the CAP without recourse to a rule of Possessor Raising. Tuggy (1980), for example, rejects a Possessor Raising analysis for Spanish sentences such as (i), arguing instead that the logical possessor in such sentences is simply an ethical dative. This analysis is semantically plausible: ethical datives specify that an individual is in some way affected by a particular action, and one of the ways in which a person might be affected by an action could, of course, be for that action to affect one of his possessions. Given the strength of Tuggy's arguments, one might attempt to extend his analysis to the Maithili data; that is, one might propose that the apparent instances of verb-possessor agreement in Maithili are actually cases in which the verb agrees with a phonologically null ethical dative that happens to be coindexed with a possessive modifier. In this way, it could be maintained that there is no verb-possessor agreement in Maithili, and the CAP could therefore seemingly be rescued.

There are compelling reasons to reject this extension of Tuggy's analysis. First, unless it can be shown that ethical datives serve as arguments, then an agreement relation between a verb and an ethical dative is no less problematic for the CAP than is verb-possessor agreement; but even if ethical datives were assumed to be arguments, this would still be a very suspicious analysis, requiring widespread recourse to phonologically empty datives lacking any independent motivation. Moreover, this analysis is dubious on semantic grounds. For example, verb-possessor agreement is perfectly possible in the Maithili sentences in (ii), even though neither clearly describes an action affecting the logical possessor; by way of contrast, note the impossibility of using an ethical dative in the corresponding Spanish sentences in (iii). In addition, possessors which determine secondary verb agreement can be explicitly contrasted with indubitable ethical datives, as in (iv).

(i)   Le   ensuciaron   el   coche.
         him(DAT) they=dirtied the car
         'They got his car dirty.'

(ii) a. tohar   bābu   kitāb dekhalthun.
          your(NH) father(H) book saw(3H+2NH)
          'Your father saw the book.'

      b. i   hunkar kukur chain.
          this(NH) his(H) dog   is(3NH+3H)
          'This is his (H) dog.'

(iii) a. *El padre te vió el libro.   b. *Éste le es el perro.
(iv)   ahā̄ hamrā-lel okar   reḍio marammat ka deliai(k).
          you(H) me-for his(NH) radio repair   do gave(2H+3NH)
          'You repaired his radio for me.'

14. Thus, pursuing a suggestion by Bill Ladusaw, one might treat a verb's secondary agreement inflection as entailing the presence of a concording foot feature F on the dominating sentential node; in order for F to 'terminate' at a NP, its value would have to match that of the NP's AGR feature. Under such an analysis, feature cooccurrence

restrictions could be used to prevent F from being realized by the subject of a clause or by the object of a postposition.

References

Aissen, J. (1979) 'Possessor Ascension in Tzotzil,' in *Papers in Mayan Linguistics*, ed. by L. Martin. Columbia, Missouri: Lucas Brothers.

Aissen, J. (1982) 'Valence and Coreference,' in *Syntax and Semantics, vol. 15: Studies in Transitivity*, ed. by P. J. Hopper and S. A. Thompson. New York: Academic Press.

Aissen, J. (1983) 'Indirect Object Advancement in Tzotzil,' in *Studies in Relational Grammar 1*, ed. by D. M. Perlmutter. Chicago: University of Chicago Press.

Aissen, J. (1985) 'A Theory of Agreement Controllers,' unpublished manuscript.

Anderson, S. R. (1985) 'Inflectional Morphology,' in *Language Typology and Syntactic Description, Vol. III: Grammatical Categories and the Lexicon*, ed. by T. Shopen. Cambridge: Cambridge University Press.

Gazdar, G., E. Klein, G. Pullum, & I. Sag (1985) *Generalized Phrase Structure Grammar*. Cambridge, MA: Harvard University Press.

Jhā, S. (1958) *The Formation of the Maithilī Language*. London: Luzac and Company, Ltd.

Keenan, E. L. (1974) "The Functional Principle: Generalizing the Notion 'Subject of'," *CLS* **10**, 298-309.

Munro, P. (1984) 'The Syntactic Status of Object Possessor Raising in Western Muskogean,' *BLS* **10**, 634-649.

Munro, P. & L. Gordon (1982) 'Syntactic Relations in Western Muskogean: A Typological Perspective,' *Language* **58.1**, 81-115.

Payne, D. L. (1982) 'Chickasaw Agreement Morphology: A Functional Explanation,' in *Syntax and Semantics 15: Studies in Transitivity*, ed. by P. J. Hopper and S. A. Thompson. New York: Academic Press.

Sag, I. & E. Klein (1982) 'The Syntax and Semantics of English Expletive Pronoun Constructions,' in *Developments in Generalized Phrase Structure Grammar (Stanford Working Papers in Grammatical Theory, Vol. 2)*, ed. by M. Barlow, D. P. Flickinger, and I. A. Sag. Distributed by the Indiana University Linguistics Club.

Tuggy, D. (1980) '¡Ethical Dative and Possessor Omission Si, Possessor Ascension No!' *Work Papers* vol. 24. Summer Institute of Linguistics, University of North Dakota session.

Williams, J. (1973) 'Clause Patterns in Maithili,' in *Patterns in Clause, Sentence, and Discourse in Selected Languages of India and Nepal, Part II, Clause* (Summer Institute of Linguistics Publications in Linguistics and Related Fields, Publication Number 41), ed. by R. L. Trail. Norman, Oklahoma: Summer Institute of Linguistics.

Yadav, R. (1985) 'Causativization in Maithili: A Preliminary Enquiry,' in *Sais Arbeitsberichte (aus dem Seminar für Allgemeine und Indogermanische Sprachwissenschaft)* **8**. Kiel: Christian-Albrechts-Universität.

Zwicky, A. M. (1986) 'Imposed versus inherent feature specifications, and other multiple feature markings,' *IULC 20th Anniversay Volume*, 85-106.