

Tongan Bound Pronouns

The nature of quantification in natural languages has been a central issue in the development of formal semantics and syntax. Since Partee (1987) bound pronouns have been used as a diagnostic for quantification. Bound pronouns have also played a prominent role in syntactic treatments of cross-over and ellipsis phenomena (cf Chomsky (1981)). Considerable effort has been devoted to determining whether indefinite expressions like *a book* inherently introduce a restricted quantifier or only a restricted variable. Recently Kratzer (2004) has speculated that there are no true cases of quantification in natural language. This paper aims to describe special uses of third person pronouns in Tongan that fail to agree in number with their antecedent. I argue that these forms are bound pronouns that must be c-commanded by quantifiers. My argument that a range of phenomena in Tongan require quantifiers, bound pronouns, and type shifting operations for DPs poses an empirical challenge to skepticism about quantification in natural languages. This analysis corroborates the view that binding applies at LF where restrictors of quantifiers are interpreted at the tail of a chain, as argued in Fox (1999).

In familiar English structures like 1 a bound pronoun agrees in person but not number with its antecedent. In Tongan a bound pronoun is an invariant third person singular regardless of its antecedent as illustrated by 2-5. It is common to claim since Evans (1980) that a bound pronoun must have a c-commanding antecedent, and the use of the Tongan third person singular pronoun as a bound pronoun is subject to the same restriction. Thus we find a contrast between 6 and 7 depending on whether the distributed quantifier *taki taha* c-commands the third person pronoun as in 7 or appears within the antecedent of a conditional, as in 6, where it cannot c-command the third person pronoun.

Tongan contains a type shifting operation which allows the non-distributed expression such as *kotoa* (*all*) to be used either as denoting (group) entities or as quantifiers. This ambiguity is responsible for their ability to appear in the Tongan existential construction and to license bound pronouns (as in 8). They contrast with the distributed *taki taha* which is unable to appear in the existential construction and always binds a bound pronoun.

Important evidence suggests that expressions like *taki taha* are quantificational. Expressions of quantify can appear as predicates in Tongan and are not restricted to appearing within DPs. When expressions like *taki taha* appear within DPs they license bound pronouns, but not if they appear as predicates. This difference can be attributed to a semantic type distinction between predicates and quantifiers.

DPs containing a third person pronoun appear in sentence initial position, as in 9. However, bound pronoun interpretations are possible only where the dislocated DP is linked to a gap rather than a resumptive pronoun in argument position. Thus, 9 has a bound pronoun interpretation, but 11 lacks one. This contrast follows if bound pronouns are licensed in the tail of a movement chain. On the assumption that resumptive pronouns are not a consequence of movement the contrast between 9 and 11 follows.

- (1) Each woman loves her mother.
- (2) *Na'a mau taki taha 'alu ki hono kolo.*
 PAST we each one go to 3-SNG village.
 'We each went to our (respective) villages.'
- (3) *Na'a mau taki taha inu 'ene sota.*
 PAST we each one drink 3-SNG soda.
 'We each drank our (own) soda.'
- (4) *'E foki 'a Lili mo Topou ki hono kolo.*
 FUT go ABS Lili with Topou to 3-SNG village.
 'Lili and Topou will go to her village.'
- (5) *'E taki taha foki 'a Lili mo Topou ki hono kolo.*
 FUT go each one ABS Lili with Topou to 3-SNG village.
 'Lili and Topou will go to their respective villages.'
- (6) *Kapau 'e 'ikai ke mau fe'ofa'ofani, te mau taki taha*
 If FUT NEG C we get-along FUT we each one
'alu ki hono kolo.
 go to 3-SNG village.
 'If we don't get along we will each go to our village.'
- (7) **Kapau 'e 'ikai ke mau taki taha fe'ofa'ofani, te mau*
 If FUT NEG C we each one get-along, FUT we
'alu ki hono kolo.
 go to 3-SNG village.
 'If we each don't get along we will go to our village.'
- (8) *Ko e tangata mo e fefine kotoa pe na'e vahe*
 PRT the man with the woman PRT PAST allot 3-SNG
hono fatongia ke ne tauhi ki ai...
 duty C 3-SNG uphold to it.
 'Every adult male and female was given his/her duty to perform.'
- (9) *Ko 'ene sota 'oku inu e he toko taha kotoa.*
 PRT 3-SNG soda PRES drink ERG the people one all.
 'His soda, everyone will drink.'
- (10) *'Oku inu e he toko taha kotoa 'ene sota.*
 PRES drink ERG the people one all 3-SNG soda.
 'Everyone will drink his soda.'
- (11) *Ko hono kolo na'a mau taki taha 'alu ki ai.*
 PRT 3-SNG village PAST we each one go to it.
 'Our village, we each went to it.'

References

- CHOMSKY, NOAM. 1981. *Lectures on Government and Binding*. Dordrecht, the Netherlands: Foris.
- EVANS, GARETH. 1980. Pronouns. *Linguistic Inquiry* 11.337–362.
- FOX, DANNY. 1999. Reconstruction, binding theory, and the interpretation of chains. *Linguistic Inquiry* 30.157–196.
- KRATZER, ANGELIKA. 2004. Indefinites and operators they depend on: From japanese to salish. In *Reference and Quantification: The Partee Effect*, ed. by G. N. Carlson F. J. Pelletier.
- PARTEE, BARBARA H. 1987. Noun phrase interpretation and type-shifting principles. In *Studies in discourse representation theory and the theory of generalized quantifiers*, ed. by Jeroen Groenendijk, Dick de Jongh, Martin Stokhof, 115–143, Dordrecht, the Netherlands. Foris.