

## Quantifier float is only possible with unaccusative predicates in Indonesian<sup>1</sup>

Ivan Netkachev

Laboratory of Formal Models in Linguistics, HSE university, Research assistant

This paper focuses on clauses with floating quantifiers in Indonesian (< Malayo-Polynesian < Austronesian). By floating quantifiers, I mean constructions whereby the quantifier is separated from the noun over which it quantifies by the main clause predicate (cf. Cirillo 2012). For instance, in (1), the numerative complex (numeral + classifier) *dua ekor* ‘two CLF’ is separated from the nominal *udang purba itu* ‘shrimp ancient that’ by the verb.

- (1) *udang purba itu tinggal dua ekor*  
shrimp ancient that remain two CLF  
‘Only TWO ancient shrimps remain.’

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I show that, in Indonesian, quantifier float is more restricted than in other languages (e.g. in English): it is only possible with unaccusative predicates, and impossible with unergative or transitive predicates. For example, in (2), the main clause predicate is unergative (Vamarasi 1999); the noun *pekerja* ‘worker’ is separated from the numerative complex by the verb, and the sentence is ungrammatical.

- (2) \**pekerja hanya bekerja tiga orang saja*  
worker only work three CLF only  
‘int. meaning: ‘Only three workers worked {while the others did nothing}.’

The same holds for transitive sentences, as the example in (3) shows: the verb *membeli* ‘buy’ is transitive, and the floating of quantifiers is illicit: the noun *keranjang* ‘basket’ cannot be separated from the numerative complex.

- (3) \**keranjang saya membeli tiga buah*  
basket I buy three CLF  
int. meaning: ‘I bought three baskets.’

However, the floating of quantifiers is perfectly grammatical with unaccusative predicates. In (1) above, the verb *tinggal* ‘remain’ is unaccusative (see Vamarasi 1999, Nomoto 2006 for details), and the floating of quantifiers is licit. The sentence in (4) below is a similar example.

- (4) <sup>ok</sup> *tamu hanya datang tiga orang saja*  
guest only come three CLF only  
‘Only THREE guests came.’

Importantly, the clauses with floating quantifiers have special information structure: the sentence in (1) answers the QUD ‘How many ancient shrimps remain?’, and the sentence in (4) is an answer to the QUD ‘How many guests came?’ (see Velleman & Beaver 2015 on Questions Under Discussion). This means that, in these examples, the noun, which is clause-initial, is **in topic**, while the quantifier is **focused**.

With these facts in mind, I suggest the following analysis for the Indonesian floating quantifiers. The quantifier float is licit only with unaccusatives because the subjects of unaccusative verbs are **base-generated as VP-internal arguments** (which is a standard assumption for unaccusatives, cf. Levin & Rappaport Hovav 1995). After that, the nominal head undergoes

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movement to the Spec TP; the movement is motivated by topicalization of the noun (in Indonesian, the Spec TP is a topical position). The quantifier phrase, however, does not undergo movement, and stays *in situ*, or, put differently, gets stranded (cf. Sportiche 1988). This is shown in (5): *tamu* ‘guest’ is moved out of the noun phrase to the specifier of TP.

- (5) [TP *tamu hanya* [VP *datang* [NP [NumP *dua orang*] ~~*tamu*~~] *saja*]]  
 guest only come two CLF guest only  
 ‘Only TWO guests came.’

It is important to bear in mind that Indonesian has the same clause structure as English (cf. Chung 2008): the only movement that occurs is the movement of the sentential subject from Spec vP to Spec TP. There is no V-to-T movement, which means that the verb stays relatively low.

If the same kind of movement occurs with unergative predicates, the quantifier and the noun still occur to the left of the predicate, since the only argument of unergatives is VP-external; hence, it is impossible to observe the quantifier float. Both the noun and the quantifier stay to the left of the main clause predicate.

As for the transitive verbs, the movement of the VP complement (or some part of it) to the Spec TP is not possible at all, since the Spec TP is already occupied by the sentential subject.

## References

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