

## On the derivation of distributive *po*-phrases in Russian

This paper presents a new syntactic explanation for the distribution and Case-marking of NPs and QPs in distributive *po*-phrases in Russian, accounting for a set of previously unexplained data from unergative and transitive constructions. Pesetsky (1982) first pointed out that like genitive NPs under negation in Russian, distributive *po*-phrases are limited to non-oblique VP-internal NPs, making this construction a syntactic diagnostic for unaccusativity in Russian, as shown in (1).

Following Babby (1980), Pesetsky argues that distributive *po* is a quantifier and that it obligatorily undergoes QR at LF. Similar to its use as a preposition in Russian, as a distributive quantifier, *po* assigns dative Case to its complement, as shown in (1a-b). Note that when subjects of unaccusative predicates appear in distributive *po*-phrases, as in (1b), the verb displays a lack of subject-verb agreement, evidenced by the impersonal *-o* ending in the past tense. In this paper, I show that previous analyses of distributive *po*-phrases cannot account for the examples shown in (2-3) and suggest a new syntactic configuration to account for these data.

Borik (1995) points out that when a numeral is inserted inside the *po*-phrase, as in (2-3), *po* no longer assigns DAT Case to its complement. In addition, note that distributive *po*-phrases containing a numeral cannot be used as a diagnostic for unaccusativity in Russian since (2) is an example where the subject of a transitive predicate, i.e., an **external** argument, contains a distributive *po*-phrase. Moreover, note that in (2) the verb *smotreli* ‘watched’ agrees with the plural subject *pjat’ turistov* ‘five tourists’. This suggests that *pjat’* receives nominative Case via feature-matching with T. In (3), the *po*-phrase functions as the direct object, but as in (2), insertion of a numeral prohibits assignment of DAT Case to the NP.

In order to account for these data, I argue that when a distributive *po*-phrase contains a numeral, the numeral constitutes the head of the phrase and therefore determines the Case marking on the NP complement. In (2), the numeral *pjat’* requires a genitive plural complement; therefore, *turistov* is genitive plural. Moreover, since the numeral itself constitutes the head of the phrase in (2), it receives nominative Case as the canonical subject. Thus, I argue that the word order [*po*-Q-NP] in Russian is in fact a **derived** word order, and that it is derived from the underlying order [Q-*po*-NP]. I argue that *po* is syntactically proclitic and must raise overtly, adjoining to the head of the QP. This structure is shown in (4).

This analysis suggests that English distributive XPs actually represent the underived word order in phrases such as *two different boys*. It also suggests that in (2-3) above, the QPs *pjat’ turistov* and *dva klienta* do not constitute constituents in their base-generated positions since *po* is inserted in the derivation prior to merging of the numeral. Empirical evidence for this proposal is shown by the examples in (3a-b). If *dva klienta* ‘two clients’ were a proper syntactic constituent, we would expect (3b) to be grammatical, since masculine animate direct objects in Russian canonically receive genitive Case, as shown in (5).

I argue that since *po* is the head of the phrase containing *klienta* in (3a), it functions as the direct complement of the quantifier, rendering the animacy feature of the NP invisible to Q°. Consequently, the entire QP is treated as an inanimate direct object and the numeral receives accusative Case as the direct object of the verb *prinimala* ‘took’.

Finally, I argue that the reason distributive *po*-phrases containing a numeral are allowed to appear as subjects of transitive and unergative predicates is due to the fact that numerals are categories that show subject-verb agreement with their predicates. I claim that in Russian, only unaccusative predicates license non-agreement in the lack of a nominative subject. I show that this generalization accounts not only for the distribution of distributive *po*-phrases in Russian but also for the distribution of genitive of negation on subjects of unaccusative predicates.

(1) a. Transitive predicate  
 Ja dal kazhdomu mal'chiku **po jabloku**. (Pesetsky 1982:69)  
 I gave every boy *po* apple-DAT  
 'I gave every boy a (different) apple.'

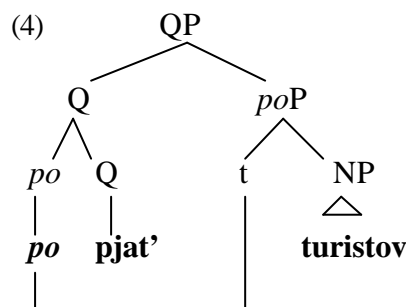
b. Unaccusative predicate  
**Po jabloku** upalo s kazhdogo dereva. (Babby 1980:45)  
*po* apple-DAT fell from every tree  
 'A (different) apple fell from every tree.'

c. Unergative predicate  
 \*V kazhdoy komnate smejalos' **po devushke**.  
 in every room laughed *po* girl-DAT  
 'A (different) girl laughed in every room.'

(2) **Po pjat' turistov** kazhdyj den' smotreli fil'my. (Borik 1995:29)  
 Po five-NOM tourists-GEN PL every day watched films  
 'Five (different) tourists watched films every day.'

(3) a. Kazhdaja prostitutka prinimala **po dva klienta** v den'.  
 Every prostitute took *po* two-ACC clients-GEN SG in day  
 'Each prostitute took two (different) clients a day.'

b. \*Kazhdaja prostitutka prinimala **po dvux klientov** v den'.  
 Every prostitute took *po* two-GEN clients-GEN PL in day



(5) a. Ja uvidel dvux mal'chikov. (Babby 1987:111)  
 I saw two-GEN boys-GEN PL

b. Ja uvidel dva stola.  
 I saw two-ACC tables-GEN SG

### References

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