Quantificational properties of *ne wh* items in Russian

Background. It is often assumed that natural language exploits two mechanisms for quantification: quantifier raising (QR) and unselective binding (UB). Under QR (May 1977) the quantificational expression is a generalized quantifier base generated within the vP and subsequently raised (at LF) to the position of interpretation. Under UB (Heim 1982, Nishigauchi 1990, Diesing 1992) the quantificational expression is a functional head (often associated with an adverbial) which is base generated in the functional clausal domain, from which it indiscriminately binds all free variables. In this talk, we explore the possibility of a "hybrid" quantificational mechanism, combining the properties of both QR and UB. We propose that such a mechanism is employed in Russian modal existential constructions (MEC, cf. Grosu 2004), and argue that *ne wh* items (3) (Rappaport 1986) present an example of such a "hybrid" quantifier.

Empirical puzzle. Russian MECs can license multiple bare *wh*-words (1), (2). However, MECs involving the *ne wh* item, despite the semantic and structural affinity to (2), fail to license additional wh-words (3). The facts in (1) and (2) are captured if we assume that both *wh*-words are unselectively bound by a quantifier, expressed by the existential BE, as proposed e.g. in Izvorski (1998). On the other hand, when a *ne wh* item is present, unselective binding becomes impossible in MECs (3). This means that in such cases the existential quantifier which must be present in MECs is of a selective generalized quantifier type (this analysis is in line with Rappaport's (1986) proposal that *ne wh* items are lexicalized). Given these facts, the structures in (1) and (2) seem to be of a different type than the one in (3).

Proposal. We propose a unified analysis of all three types of MECs (1) through (3). All structures are monoclausal (Kondrashova 2008, Šimík 2008) and have the following underlying ingredients: (i) *wh*-words denote sets of Hamblin alternatives (Kratzer & Shimoyama 2002, Šimík 2009); (ii) *wh*-words are generated in their respective base positions within the vP; (iii) the existential quantifier is base-generated in a designated position in the functional domain of the vP (Kondrashova 1996); (iv) negation is a functional head generated directly above the existential quantifier. We derive the difference between (1) and (2) on the one hand and (3) on the other by assuming that there are two quantifiers that can head the existential projection, $\exists_w$ (4) and $\exists_s$ (5), differing in their semantic and morphophonological properties. $\exists_w$, being semantically a determiner and morphologically null, requires a semantic restriction in its complement position and morphological support. The *wh*-word moves to satisfy these interface requirements; see (6a). $\exists_s$ is semantically a Hamblin alternative quantifier and is morphologically realized as the copula BE, in which case the *wh*-movement is motivated by information structure reasons (escaping focus); see (6b). The negation cliticizes on the existential quantifier. In the presence of $\exists_s$, we get *ne* BE, in the presence of $\exists_w$, we derive the *ne wh* item. Finally, notice that the derivation of the *ne wh* items (3) combines the properties of QR and UB: there is a syntactic movement of a *wh*-element (semantically a set/property), creating an operator-variable dependency (à la QR) and at the same time the quantificational element originates in the functional domain (à la UB).

Implications. One important property of the present analysis is that the quantificational part of *ne wh* items originates in the functional domain of the vP. We therefore predict that multiple *ne wh* items per MEC are impossible (given that there is no clause-internal recursion of the relevant functional projections); see (7). Notice that the lexicalist analysis of *ne wh* items cannot explain this effect, since nothing prevents two generalized quantifiers of the same type to co-occur in one clause. Another important and conceptually appealing feature of the present analysis is a high degree of lexical and structural uniformity of (1)–(3). This implies that (idiosyncratic) restrictions on *wh*-words in (1) and (2) carry over to *ne wh* items, which appears to be empirically correct. For instance, *wh*-words cannot be postmodified in all three types of MECs (8) and lexical restrictions of individual *wh*-items are manifested uniformly across different types of MECs (9).

(1) Mashe bylo **s kem** (**o čem**) pogovorit'.
Masha:DAT BE:PAST with who (about what) talk
'There was someone for Masha to talk with (about something).'

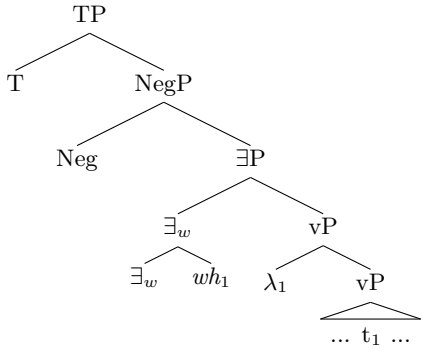
(2) Mashe **ne** bylo **s kem** (**o čem**) pogovorit'.
Masha:DAT NEG BE:PAST with who (about what) talk
'There was noone for Masha to talk with (about something).'

(3) Mashe bylo **ne s kem** (* **o čem**) pogovorit'.
Masha:DAT be:PAST NEG with who (about what) talk
'There was noone for Masha to talk with (about something).'

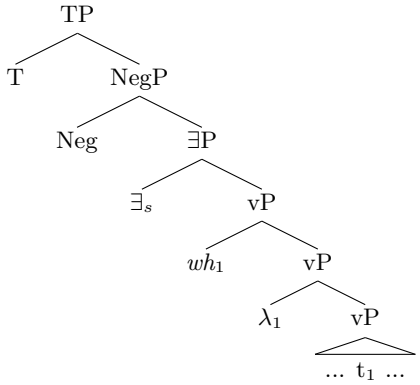
(4) Semantics: $[\![\exists_w]\!] = \lambda P_{\langle et\rangle} \lambda Q_{\langle et\rangle} \exists x.P(x) \wedge Q(x)$
Morphology: $\exists_w \leftrightarrow \emptyset$

(5) Semantics: $[\![\exists_s]\!] = \lambda \pi_{\langle st,t\rangle} \exists p_{\langle st\rangle}.p \in \pi \wedge {}^{\vee}p = 1$
Morphology: $\exists_s \leftrightarrow$ {est', bylo, budet}

(6) a.



b.



(7) *Mne budet **nekomu nechego** podarit'.
I:DAT be:FUT NEGwho NEGwhat give
'There will be nobody whom I can give nothing.'

(8) a. *Mashe (**ne**) bylo **s kem** *umnym* pogovorit'.
Masha:DAT (NEG) BE:PAST with who smart talk
'There was someone/noone smart for Masha to talk with.'

b. *Mashe bylo **ne s kem** *umnym* pogovorit'.
Masha:DAT be:PAST NEG with who smart talk
'There was noone smart for Masha to talk with.'

(9) a. Kole est' **začem** /* **počemu** ženit'sja.
Kolja:DAT BE:PRES why$_1$ / why$_2$ marry
'Kolja has a reason to get married.'

b. Kole **nezačem** /* **nepočemu** ženit'sja.
Kolja:DAT NEGwhy$_1$ / NEGwhy$_2$ marry
'Kolja has no reason to get married.'

References: Diesing, M. 1992. *Indefinites.* MIT Press. **Grosu, A. 2004.** The syntax-semantics of modal existential *wh* constructions. *Balkan syntax and semantics,* 405-438. John Benjamins. **Heim, I. 1982.** The semantics of definite and indefinite noun phrases. PhD Dissertation, UMass. **Izvorski, R. 1998.** Non-indicative wh-complements of possessive and existential predicates. *NELS* 28, 159-173. **Kondrashova, N. 1996.** The syntax of existential quantification. PhD Dissertation, University of Wisconsin. **Kondrashova, N. 2008.** Negated wh-items in Russian: Syntactic and semantic puzzles. Presented at *SLS* 4. **Kratzer, A. and J. Shimoyama. 2002.** Indeterminate pronouns: The view from Japanese. *Proceedings of the Third Tokyo Conference on Psycholinguistics,* 1-25. Hituzi Syobo. **May, R. 1977.** The grammar of quantification. PhD Dissertation, MIT. **Nishigauchi, T. 1990.** Quantification in the theory of grammar. Kluwer. **Rappaport, G. C. 1986.** On a persistent problem of Russian syntax: Sentences of the type 'mne negde spat'. *Russian Linguistics* 10:1-31. **Šimík, R. 2008.** Czech modal existential wh-constructions as vP-level free relatives. *Linguistics in the Netherlands*, 121-132. John Benjamins. **Šimík, R. 2009.** Hamblin pronouns in modal existential wh-constructions. *FASL* 17, 187-202. Michigan Slavic Publications.