

On Relativization Strategies and Resumptive Pronouns

1. Introduction

Goodluck and Stojanović (1996) argue that there are three strategies for forming relative clauses in Serbo-Croatian (SC):

- (a) wh-pronoun (*koji* ‘who’) relatives, which are island sensitive and disallow resumptives (1);
- (b) complementizer *što* ‘that’ relatives, which are island sensitive and require resumptives (2);
- (c) relatives involving the accusative form of *koji* ‘who’ preceded by the preposition *za* ‘for’, which are island-insensitive and require resumptives (3).¹

The above classification indicates that there are two types of resumptives in SC which differ with respect to sensitivity to islandhood.

- (1) a. čovjek koga (*ga) mrzi
man who him hates
‘the man who he hates’
b. *čovjek koga je zaboravio gdje je upoznao
man who is forgotten where is met
‘the man who he forgot where he met’
c. čovjek koga želi da upozna
man who wants that meets
‘the man who he wants to meet’
- (2) a. čovjek što *(ga) mrzi
man that him hates
b. *čovjek što je zaboravio gdje ga je upoznao
man that is forgotten where him is met
c. čovjek što želi da ga upozna
man that wants that him meets
- (3) a. čovjek za koga zna da *(ga) oni mrze
man for whom knows that him they hate
‘the man who he knows that they hate’
b. čovjek za koga zna gdje su ga upoznali
man for whom knows where are him met
‘the man who he knows where they met’

In this paper I examine the behavior of SC relatives with respect to islandhood and resumptivization, arguing that the three classes noted above should be reduced to two, which will eliminate the need to posit two types of resumptives with respect to sensitivity to islandhood in SC. In the course of the discussion we will also see additional evidence for the NP analysis of SC traditional Noun Phrases (TNPs) argued for in Bošković (2008a) as well as

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¹ For additional ways of forming relatives in SC, as well as semantic differences between the (a) and the (b) class, see Browne (1986); see also Kordić (1995) and Herdan (2008) for discussion of SC relatives. (Browne 1986 is a particularly rich source on the topic.)

evidence for the existence of differential object marking (which will be extended to Bulgarian) and verbs that are similar to English *wager*-class verbs in SC. I will start the discussion with *što* relatives.

2. *Što* Relatives

2.1 Islandhood

An obvious question that arises with respect to *što* relatives is whether their island-sensitivity can be captured by assuming that the resumptive is merely a spell-out of a trace, which would have no effect on syntactic locality (under this analysis, the resumptive would arise through a PF process and locality would be considered to be a strictly syntactic phenomenon). There is, however, evidence against this analysis. Progovac (1993) shows that SC clitics can climb out of certain apparent finite clauses. Thus, they can climb out of the finite complement of *željeti* ‘want’, but not *tvrditi* ‘claim’, as shown in (4). Significantly, the resumptive of *što* relatives exhibits exactly the same behavior (5).

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|--------|---|----|------------------------------|
| (4) a. | *On ga tvrdi da mrzi he him claims that hates ‘He claims to hate him’ | b. | cf. On tvrdi da ga mrzi |
| c. | On ga želi da upozna he him wants that meets ‘He wants to meet him’ | d. | cf. On želi da ga upozna |
| (5) a. | *čovjek što ga tvrdi da mrzi man that him claims that hates | b. | čovjek što tvrdi da ga mrzi |
| c. | čovjek što ga želi da upozna man that him wants that meets | d. | čovjek što želi da ga upozna |

The above data provide evidence that the resumptive is not a spell-out of a trace but an independent clitic pronoun, subject to usual constraints on cliticization which cannot be accounted for if the resumptive is simply a spell-out of a trace. Since a trace of successive cyclic *wh*-movement should be present in the higher clause of both (5)a and (5)c, under the spell-out-of-a-trace analysis we would expect the constructions not to differ in their grammaticality status. On the other hand, under an independent clitic pronoun analysis we would expect (5) to pattern with (4) in the relevant respect.

Let us now consider more closely island sensitivity of *što* relatives. Boeckx (2003) notes that while in many languages resumptive constructions are island-insensitive, in some languages they are island-sensitive. Thus, Irish and Hebrew resumptives are completely island-insensitive. On the other hand, Scottish Gaelic, Greek, and Romanian show strong, but not weak island effects under resumption. What about SC? The fact that (2)b, which involves extraction out of a weak island, and Boeckx’s example in (6), which involves extraction out of a strong (adjunct) island, are both unacceptable provides evidence that the resumptive in SC *što* relatives is sensitive to both strong and weak islands.²

- (6) *čovjek što si otišao zato što ga je Petar otpustio
man that are left because him is Peter fired
‘the man that you left because Peter had fired him.’

² Vata resumptives are also considered to show both strong and weak island effects (see Koopman 1983). However, Boeckx shows that the relevant weak island in Vata may actually be a strong island.

Boeckx (2003) ties the crosslinguistic difference regarding strong islands under resumption noted above to the type of the relative clause complementizer (whether the complementizer is agreeing or matching; see Boeckx 2003 for details of the analysis). As discussed in Boeckx (2003), in contrast to strong islands, resumptives should never be sensitive to weak islands. Rizzi (1990), Cinque (1990), and Starke (2001) note that weak islands force a specific (i.e. DP) reading on the extractee. One way of interpreting this is that DPs with a particular kind of D are not sensitive to weak islands. Since Boeckx basically treats resumptive constructions as involving extraction of a specific DP such constructions should then be insensitive to weak islands. Why do we find a weak islandhood effect with SC *što* relatives? Boeckx notes that the exceptional behavior of these relatives with respect to weak islands can be accounted for if DP is lacking in SC traditional Noun Phrases (TNPs), as argued extensively in Bošković (2008a). Extraction of any TNP out of a wh-island in SC may then be expected to pattern with extraction of non-specific TNPs in English, which are sensitive to wh-islands.³

We then have here an additional argument for the NP analysis of SC TNPs. The argument is particularly interesting, since the lack of DP has been argued to make SC more liberal with respect to extraction than English. Thus, as discussed in Bošković (2008a) and references therein, the lack of DP is responsible for the possibility of left-branch extraction, adjunct extraction out of TNPs, and the relaxation of Specificity effects in SC. In all these cases, which result in unacceptable constructions in English, the “trouble maker” in English is DP, which is missing in SC. However, the case in question (extraction out of weak islands) actually requires DP (more precisely, a particular kind of DP) to void a locality effect. Since SC does not have it, the locality effect cannot be voided.⁴

2.2 Obligatoriness vs Optionality of Resumptives

An overt resumptive is actually impossible in subject relatives like (7). This can be related either to the subject *pro*-drop status of SC given the Avoid Pronoun Principle (under this analysis there would be a resumptive in (7), but it would have to be a *pro* due to the Avoid Pronoun Principle) or the well-known ban on local subject resumptives (see Boeckx 2003:83-91 and references therein, especially McCloskey 1991). I will not have much to say here about this effect, merely noting that under the *pro*-drop/Avoid Pronoun Principle account of (7) we would not expect the example to improve with long-distance relativization, while

³ Specificity is one way of voiding the weak islandhood effect. I do not rule out the possibility that there are other ways of voiding it, especially in relatives involving resumptives. To mention just one way here (there could be other ways too), the possibility of an intrusive pronoun would be enough to void the islandhood effect. (See Sells 1984 and Boeckx 2003 for discussion of intrusive pronouns and tests for differentiating intrusive and resumptive pronouns. Intrusive pronouns are found only in islands or really complex sentences; they are real pronouns, not resumptives (English “resumptives”, which are restricted to the contexts in question (compare, e.g., *the man who you wonder why Mary asked who should fire him* with **the man who you met him*) are examples of intrusive pronouns)). I am thus not predicting that resumptives in all NP languages should be sensitive to weak islands (they may in fact not be sensitive to them in Czech, see Toman 1998). However, we do have here a one-way correlation, where such effects are expected to be found only in NP languages (the conclusion may in fact not be limited to resumptive relatives; it should hold for all kinds of A' extraction of specific TNPs).

⁴ Particularly interesting is the contrast with Specificity effects, where, exactly opposite to the case under consideration, specificity of a DP raises a problem with respect to locality. This is the case in English, where extraction out of specific DPs is not allowed. However, as noted in Bošković (2008a), this type of effect is often voided in SC (see also Willim 2000 for Polish).

(i) O kojem piscu je pročitao [svaku knjigu/sve knjige/ tu tvoju knjigu t_i]
 about which writer is read every book/ all books/ that your book
 ‘*About which writer did he read every book/all books/this book of yours?’

under the ban on local subject resumptives account we would expect such constructions to be better than (7). The relevant data are, unfortunately, unclear. While (8) is better than (7), it is still degraded.

- (7) čovjek što je sreo Petra/*čovjek što je on sreo Petra
 man that is met Peter man that is he met Peter
 ‘the man that met Peter’
- (8) čovjek što tvrdiš da je sreo Petra/?? čovjek što tvrdiš da
 man that claim that is met Peter man that claim that
 je on sreo Petra
 is he met Peter
 ‘the man that you claim met Peter’

Another context where the ban on overt subject resumptives is lifted involves placement of an object in front of the subject resumptive (see Boeckx 2003:84). Such examples are also better than (7), though not fully acceptable in SC. Nevertheless, the fact that (9) and (8) are better than (7) can be taken to indicate that accounting for (7) in terms of a ban on local subject resumptives (see Boeckx 2003 for an account of the contrast between (9) and (7) along these lines, where the ban is actually deduced) is preferable to the *pro*-drop/Avoid Pronoun Principle account of (7).

- (9) ?čovjek što samo Mariju on voli
 man that only Marija he loves
 ‘that man that loves only Marija’

Turning to object relatives, there is a very interesting animacy effect at work here. Browne (1986), Kordić (1995), and Goodluck and Stojanović (1996) observe that while a resumptive is obligatory with animate objects, it is optional with inanimate objects.⁵

- (10) čovjek što ga je sreo/*čovjek što je sreo
 man that him is met
 ‘the man that he met’
- (11) auto što ga je kupio/auto što je kupio
 car that him is bought
 ‘the car that he bought’

There is a potentially very interesting link here with the phenomenon of differential object marking (DOM), where animacy is crucially involved (see Boeckx 2003; see also Rodríguez-Mondoñedo 2007 for a recent crosslinguistic approach to DOM). DOM is illustrated by the following examples from Spanish, where the animate object *María* requires *a*-marking, which is not the case with the inanimate object *una ciudad* (inanimates may actually get *a* under certain conditions, see Rodríguez-Mondoñedo 2007 and references therein).

⁵ Polish and Czech seem freer with respect to the resumptive drop than SC, though there could be some animacy effects in Czech (see Szczegielniak 2004 for Polish and Toman 1998 for Czech).

- (12) a. Juan besó a María./*Juan besó María.
 Juan kissed Maria
 ‘Juan kissed Mary.’
 b. Juan destruyó una ciudad./*a una ciudad.
 Juan destroyed a city

It is often noted that notions like specificity/definiteness/referentiality are also relevant to DOM. (DOM is found in a number of languages. However, languages differ in the exact factors governing DOM; see, e.g., Aissen 2003 and Rodríguez-Mondoñedo 2007. SC obviously does not completely behave like Spanish in the relevant respect.)

Interestingly, we find this type of effect regarding the head of the SC relatives in question, which can be taken to provide evidence that we are indeed dealing here with a DOM-style effect.⁶ Thus, while in (13) the resumptive is optional, the resumptive in (14) is compatible only with the specific reading of *neki brod* ‘some ship’. In fact, there is an effect even in (13): if the ship is pointed at the resumptive is obligatory. Notice also that (15), which contains a strong quantificational determiner, is degraded with the resumptive (see Suñer 1988 for discussion of non-specificity of some strong quantifiers in the context of clitic doubling in Spanish).

- (13) taj brod što su kupili/ taj brod što su ga kupili
 that ship that are bought/ that ship that are him bought
 ‘that ship that they bought’
- (14) neki brod što su kupili/ neki brod što su ga kupili
 some ship that are bought/ some ship that are him bought
 ‘some ship that they bought’
- (15) svaki brod što su kupili/ ?? svaki brod što su ga kupili
 every ship that are bought/ every ship that are him bought
 ‘every/each ship that they bought’

The definite article in English superlatives is often treated as an indefinite (for relevant discussion, see Heim 1999; Selkirk 1977; Sharvit and Stateva 2000; Szabolcsi 1986).⁷ Interestingly, a resumptive is dispreferred with the superlative in (16).

- (16) najveći brod što su kupili/ ?? najveći brod što su ga
 biggest ship that are bought/ biggest ship that are him
 kupili
 bought
 ‘the biggest ship that they bought’

Note that with animates, the resumptive is obligatory in all these contexts.

⁶ It is worth noting here that judgments regarding *što* relatives are often not very firm, since wh-relatives are preferred to *što*-relatives. Note also that my goal here is not to provide an explanation for the SC facts about to be discussed, but simply to establish a parallelism between the SC phenomenon under consideration and the factors governing DOM crosslinguistically. (I refer the reader to Rodríguez-Mondoñedo 2007 for a comprehensive analysis of the factors governing DOM which should also be applicable to SC.)

⁷ I am focusing here on the comparative superlative reading, see Bošković and Gajewski (2008).

- (17) neki advokat što su ga otpustili/*neki advokat što su otpustili
 some lawyer that are him fired
- (18) taj advokat što su ga otpustili/*taj advokat što su otpustili
 that lawyer that are him fired
- (19) svaki advokat što su ga otpustili/*svaki advokat što su otpustili
 every lawyer that are him fired
- (20) najgori advokat što su ga otpustili/*najgori advokat što su otpustili
 worst lawyer that are him fired
 ‘some/that/every/the worst lawyer that they fired’

Turning now to the *de dicto-de re* reading distinction, in a context where a *de re* reading is forced, as in (21), a resumptive is obligatory even with inanimates. This is significant, since *de re* contexts are often linked to specificity.⁸

- (21) Milan, who does not know that the ship that they are looking at is being sold by Petar, shouts: I want to buy that ship! Ana then says:
 Milan želi da kupi brod što ga Petar prodaje./*što Petar prodaje.
 Milan wants that buys ship that him Peter is-selling
 ‘Milan wants to buy the ship that Peter is selling.’

It has gone unnoticed that a resumptive is obligatory with plural inanimates in SC *što* relatives.

- (22) brodovi što su ih kupili/??brodovi što su kupili
 ships that are them bought
 ‘ships that they bought’

Significantly, exactly the same number sensitivity is found with DOM in Kannada, where all plural NPs are subject to DOM, even those that are not subject to it when singular.⁹ (Interestingly, Kannada is a language without articles, which may be significant here; see in this respect Rodriguez-Mondoñedo 2007 for an account of Kannada which does not assume DP for Kannada, following Bošković’s 2008a no-DP analysis for languages without articles).

The above facts indicate that we may have at work here a DOM system. Following the analyses proposed for Spanish DOM (see Rodriguez-Mondoñedo 2007 and Torrego 1998), animate objects would then be raising higher than inanimate objects (prior to relativization).¹⁰

The claim that at least some Slavic languages may have DOM may help us explain some otherwise puzzling animacy effects noted in the literature, given the structural height-animacy link of DOM. Notice first that Bulgarian *deto* ‘that’ relatives for the most part behave like SC *što* relatives with respect to the distribution of the resumptive pronoun, which can be interpreted to indicate that they also involve DOM. Thus, the pronoun is obligatory with the

⁸ Note, however, that while *de dicto* is always non-specific and *de re* is usually specific, there are non-specific *de re* readings.

⁹ Animates are always marked and specific non-animates are optionally marked in the singular in Kannada. (The accusative case is the DOM marker in this language, non-DOM objects not having accusative.)

¹⁰ There is tension that may be worth investigating between this approach to DOM, where structural height correlates with appearance of additional morphology, and a rather interesting approach to Case morphology developed in Caha (2006), where structural height correlates with disappearance of additional morphology.

animates in (23), and optional with the inanimates in (24)-(25). As in SC, the specific reading is forced in the presence of the resumptive in (25) and the resumptive is obligatory in (26) in the context given in (21). It is also obligatory with plural inanimates (27).¹¹

- (23) a. njakakuv advokat, deto sa ??(ga) uvolnili
 some lawyer that are him fired
 ‘some lawyer that they fired’
 b. advokatut deto ??(go) uvolnixa
 the-lawyer that him fired
 ‘the lawyer that they fired’
- (24) kolata deto (je) kupi
 the-car that it bought
 ‘the car that he bought’
- (25) njakakuv korab, deto sa (go) kupili
 some ship that are it bought
 ‘some ship that they bought’
- (26) Milan iska da kupi toja korab deto Petâr ??(go) prodava.
 Milan wants to buy that ship that Peter it is-selling
 ‘Milan wants to buy that ship that Peter is selling.’
- (27) korabi deto sa ??(gi) kupili na bezcenica
 ships that are them bought very-cheap
 ‘ships that they bought very cheaply’

I now return to the structural height-animacy link proposed for Spanish DOM, showing how it can be used to explain some otherwise rather puzzling data regarding multiple *wh*-fronting in Bulgarian and SC. For many Bulgarian speakers for whom an animate *wh*-direct object must precede adverbials like *kâde* ‘where’ (28), an inanimate *wh*-direct object can either follow or precede *where* (29). (The order of fronted *wh*-phrases in Bulgarian is standardly treated in terms of Superiority, where the *wh*-phrase that is first in the linear order is the one that moves first to SpecCP; the second *wh*-phrase either right-adjoins to the first *wh*-phrase, as in Rudin 1988, or moves to a lower SpecCP, as in Richards 2001.)¹²

- (28) a. Kogo kâde e vidjal čovekât?
 whom where is seen the-man
 ‘Who did the man see where?’
 b. ???Kâde kogo e vidjal čovekât?

¹¹ Thanks are due to Roumyana Slabakova for providing Bulgarian judgments. Bulgarian does differ from SC in that the resumptive is degraded with animate superlatives (though interestingly it is acceptable in the Bulgarian counterpart of (16).)

(i) naj-lošijat advokat deto sa (?? go) uvolnili
 the-worst lawyer that are him fired
 ‘the worst lawyer that they fired’

¹² In Bošković (1997b) I suggested that the reason for the height difference between *kogo* and *kakvo* is that while the former receives structural accusative, which requires Case-movement prior to *wh*-movement, the latter can receive inherent case, which is assigned in situ. However, no independent evidence was given for this distinction.

- (29) a. Kakvo kâde e vidjal čovekât?
 what where is seen the-man
 'What did the man see where?'
 b. Kâde kakvo e vidjal čovekât?

Although the relevant contrasts are rather subtle, we do find the same type of animate/non-animate contrast in SC in the contexts where SC is sensitive to Superiority effects.¹³

- (30) a. Koga gdje tvrdiš da tuče?
 whom where claim that beats
 'Who do you claim that he is beating where?'
 b. ??Gdje koga tvrdiš da tuče?
- (31) a. Šta gdje tvrdiš da popravlja?
 what where claim that fixes
 'What do you claim that he is fixing where?'
 b. Gdje šta tvrdiš da popravlja?

This otherwise puzzling paradigm can be easily captured under a DOM-style analysis, where we have two positions for objects, H1 and H2, H1 being higher than H2. If we take the distribution of resumptives in the relatives under consideration as an indication of how DOM works in South Slavic, animate objects always move to H1, while inanimate objects can either move to H1 or stay in H2. If *where* is located in between H1 and H2 the data in (28)-(29)/(30)-(31) follow immediately: the animate object is always higher than *where* prior to wh-movement, hence must move to SpecCP before *where*, while the inanimate object can be either higher or lower than *where* prior to wh-movement; either *what* or *where* can then move first to SpecCP.¹⁴

- (32) H1 where H2

A question that arises now is whether other animacy effects noted in the literature on Slavic languages can be explained in terms of a DOM analysis. I leave investigating this possibility for future research.¹⁵

Before concluding this section, let me note a final complication in the SC resumptive paradigm, which can be considered to be a quirk of SC DOM: with feminine inanimates the resumptive seems to be obligatory.¹⁶ Thus, while the resumptive is optional with the

¹³ SC wh-phrases are sensitive to Superiority effects in some, but not all contexts (see Bošković 2002).

¹⁴ Both Bošković (1997b) and Krapova and Cinque (2003) report the contrast in (28). However, Billings and Rudin (1996) consider both (28a) and (28b) acceptable, which can be accounted for if *kâde* 'where' can occur either above H1 or in between H1 and H2 for their informants. They also note that their informants prefer (29b) to (29a) (for relevant discussion, see also Krapova and Cinque 2003). If the preference is real (i.e. if for these speakers (29a) is ruled out, which is not at all clear), this can be interpreted as indicating that *kakvo* 'what' must stay in H2 for these speakers.

¹⁵ For much relevant discussion, see Glushan (in preparation). Billings and Rudin (1996, 1998) claim that inanimate/animate subjects behave similarly to inanimate/animate objects with respect to Superiority effects in (28)-(29). This could be taken to indicate that DOM should be extended to subjects in Bulgarian, which has in fact been suggested for several DOM languages (see, e.g., Aissen 1999 and de Hoop and de Swart 2008 regarding differential subject marking). However, the data Billings and Rudin were relying on to make their claim regarding subjects turn out to be rather controversial (for relevant discussion, see Bošković 1998, Pesetsky 2000:24, and Krapova and Cinque 2003); they also cannot be replicated in SC.

¹⁶ Bulgarian does not pattern with SC in this respect, as shown by (24), where the noun is feminine.

masculine and neuter objects in (11), (14), and (34) (*brod* ‘ship’ is masculine, *selo* ‘village’ is neuter, and *auto* ‘car’ can be either masculine or neuter), it is obligatory with the feminine object in (33).¹⁷

(33) stolica što ju je kupio/??stolica što je kupio
 chair that her is bought
 ‘the chair that he bought’

(34) selo što ga je zavolio/selo što je zavolio
 village that it is fallen-in-love-with
 ‘the village that he fell in love with’

3. *Za-Koga* Relatives

I now turn to *za-koga* ‘for whom’ relatives, i.e. the (c) strategy from section 1. I argue that this relativization strategy involves relativization of a prothetic object (PO), which must be coreferential with a lower clause argument. (PO examples are *We know of Jim that he visited his mother* and *I said of Jim that he never visits his mother*, where the PO *Jim* must be coindexed with *he*). This analysis immediately explains why (c) is limited to a small number of verbs; it is in fact limited exactly to the verbs that allow a PO. Thus, *reći* ‘say’/*tvrditi* ‘claim’/*čuti* ‘hear’/*znati* ‘know’ allow both a PO and *za-koga* relatives, while *mrziti* ‘hate’/*zaboravljati* ‘forget’/*željeti* ‘want’/*sjetiti se* ‘remember’ disallow both (compare (35) with (36) and (37)). (38)-(39) show that the PO object of the verbs that allow a PO can undergo not only relativization, but also wh-movement and topicalization/focalization/scrambling (see Bošković 2004 for ways of differentiating these operations in SC; below I will refer to the process(es) in question simply as topicalization for ease of exposition), which is expected under the PO analysis of *za-koga* relatives. All of these are impossible with verbs that disallow a PO.¹⁸

¹⁷ Note also that the resumptive is quite generally obligatory with inherently Case-marked objects (i.e. with non-accusative objects; see also Toman 1998 for Czech), which may be a result of a more general requirement to morphologically realize such case in Slavic (see Freidin and Sprouse 1991; the requirement has rather strong effects in SC; e.g., it makes it impossible for higher numeral NPs to occur in inherent Case contexts in SC, see Franks 1994 and Bošković 2008b, among others, for relevant discussion).

- (i) a. auto što *(ga) se Ivan boji
 car that it(gen) refl Ivan afraid
 ‘the car that Ivan is afraid of’
 b. selo što je *(njime) rukovodio
 village that is it(instr) managed
 ‘the village that he managed’

¹⁸ In contrast to other PO verbs noted above, *znati* ‘to know’ and *čuti* ‘to hear’ do not require the complement of *za* to be co-indexed with a lower pronoun (this is so only if the verbs in question do not take a clausal complement), as shown in (i). Not surprisingly, the same holds for the *za*-phrase in relatives (ii) (Goodluck and Stojanović 1996 note this for *znati*).

- (i) a. Ja znam za njega.
 I know for him
 ‘I know about him.’
 b. Ja sam čuo za njega.
 I am heard for him
 ‘I heard about him.’
 (ii) a. čovjek za koga znam
 man for whom know
 b. čovjek za koga sam čuo
 man for whom am heard

- (35) a. čovjek za koga_i su rekli/tvrdili/čuli/znali da *pro*_i
 man for whom are said/claimed/heard/knew that
 zna francuski
 knows French
 ‘the man of whom they said/claimed/heard that he knows French’
- b. *čovjek za koga_i su mrzili/zaboravljali/željeli/se sjetili da *pro*_i
 man for whom are hated/forgot/wanted/remembered that
 zna francuski
 knows French
- (36) Rekli/tvrdili/čuli/znali su za njega da zna francuski.
 said/claimed/heard/knew are for him that knows French
 ‘They said/claimed/heard/knew of him that he knows French’
- (37) *Mrzili su/ zaboravljali su/ željeli su/ sjetili su se za njega
 hated are forgotten are wanted are remembered are refl for him
 da zna francuski.
 that knows French
- (38) Za koga su rekli/tvrdili/čuli/znali da zna francuski?
 for whom are said/claimed/heard/knew that knows French
- (39) Za tog čovjeka su rekli/tvrdili/čuli/znali da zna francuski.
 for that man are said/claimed/heard/knew that knows French
- Misliti* ‘think’, however, raises an interesting problem. While *za-koga* relatives and wh-movement/topicalization of the *za* ‘for’ phrase are fully acceptable with *misliti* ‘think’, a *za* ‘for’ phrase as a PO in situ is somewhat degraded.
- (40) čovjek za koga_i su oni mislili da *pro*_i zna francuski
 man for whom are they thought that knows French
 ‘the man of whom they thought that he knows French’
- (41) ??Mislili su za njega da zna francuski.
 thought are for him that knows French
- (42) Za koga su mislili da zna francuski?
 for whom are thought that knows French
- (43) Za njega su mislili da zna francuski.
 for him are thought that knows French

These data do not necessarily raise a problem for the PO analysis of *za-koga* relatives. Rather, they are very much reminiscent of the curious *wager*-class verbs in English noted in Postal (1974) (see also Pesetsky 1992 and Bošković 1997a, 2007). When used in “raising-to-object” contexts these verbs disallow a “raised object” in situ, but yield an acceptable result when the object is fronted via, e.g., wh-movement, topicalization, or relativization.

- (44) a. ??John wagered Peter to know French.
 b. Who did John wager to know French?
 c. That Man, John wagered to know French.
 d. the man who John wagered to know French

I suggest that (40)-(43) instantiate the same phenomenon as (44), leaving open how this puzzling pattern should be analyzed.

Returning to the PO analysis of class (c) relatives, notice that the contrast in (45), which shows class (c) can only be used for long-distance subject relatives, can also be explained under the PO analysis. To avoid a binding violation, *pro* must be lower than the base position of the PO. Since the PO is generated as an object, it can be co-indexed only with a lower clause *pro*.

- (45) a. *čovjek za koga_i pro_i voli Anu
 man for whom loves Ana-acc
 b. čovjek za koga_i oni kažu da pro_i voli Anu
 man for whom they say that loves Ana-acc

Under the PO analysis, class (c) in fact reduces to class (a): it involves regular wh-pronoun relativization, it just happens that the wh-pronoun, a PO, must be co-indexed with another pronoun independently of relativization. This means that we are not dealing with a true resumptive in *za-koga* relatives, hence there is no need to posit two types of resumptives with respect to sensitivity to islandhood in SC. It is also not surprising that *za-koga* and *što* relatives differ with respect to what kind of pronouns (strong pronouns, clitic pronouns, or *pro*) they allow as their resumptives.

- (46) a. čovjek za koga znaš da ga Marija voli
 man for whom know that him.clitic Marija loves
 ‘the man of whom you know that Marija loves him’
 b. ?čovjek za koga znaš da Marija njega voli
 man for whom know that Marija him.pronoun loves
 c. čovjek za koga znaš da pro voli Mariju
 man for whom know that loves Marija
 ‘the man of whom you know that he loves Marija’
 d. čovjek za koga znaš da on voli Mariju
 man for whom know that he loves Marija
 e. čovjek što znaš da ga Marija voli
 man that know that him.clitic Marija loves
 f. ???čovjek što znaš da Marija njega voli
 man that know that Marija him.pronoun loves
 g. čovjek što znaš da pro voli Mariju
 man that know that loves Marija
 h. ??čovjek što znaš da on voli Mariju
 man that know that he loves Marija

The difference between *za-koga* and *što* relatives with respect to islandhood noted in (2)/(3) above, however, seems to raise a problem for the unified analysis. Under this analysis we would expect class (c) to be island-sensitive, just like class (a). The expectation is actually borne out. In (3)b, the PO is generated as an argument of *zna* ‘know’, i.e. above the island, as shown below.

- (47) čovjek za koga_i zna t_i [CP gdje su ga upoznali]
 man for whom knows where are him met
 ‘the man of whom he knows where they met him’

As a result, the example actually does not involve relativization out of an island. The relevant test case is (48), where *kaže* ‘say’, but not *zaboravljao* ‘forget’, allows a PO, hence the PO must be moving out of the wh-island. As expected under the unified analysis of *za-koga* and *što* relatives, the example is degraded.

- (48) *čovjek za koga si ti zaboravljao ko kaže da ga
 man for who are you forgotten who says that him
 Marija vara
 Mary cheats-on
 ‘the man of whom you forgot who says that Mary cheats on him’

3. Conclusion

I have argued that the three strategies of forming relatives in SC should be reduced to two, which has eliminated the need to posit two different types of resumptives with respect to sensitivity to islandhood in SC, where one type would be island sensitive and the other not. I have also provided evidence for the existence of differential object marking and *wager*-class verbs in SC, as well as additional evidence for the NP analysis of SC TNPs. The existence of differential object marking provides us with a tool to explain otherwise puzzling superiority effects involving animacy in Bulgarian and SC in a principled way.

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