A Derivational Approach to Microvariation in Slavic Binding [*]

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1 Derivational Binding

Derivational approaches to Principle A of the Binding Theory have figured in the syntactic literature since at least Belletti & Rizzi (1988), in part based on arguments that binding configurations exist only before A-movement in certain constructions, such as (1) and (2):

(1) a. **Each other**'s mother seems to please **the two boys**.
    b. [Pictures of **himself**] worry **John**.

(2) Questi pettegolezzi   su di **sé**   preoccupano **Gianni**…
    these   pieces of gossip about himself worry   Gianni

The derivational story holds that at an earlier stage of the derivation, a valid binding relation holds, as shown for (1b) in (3).[1]

(3) [$_{VP}$ [$_{NP}$ … himself] John]

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[1] A reviewer points out that arguments have been raised against the Belletti & Rizzi analysis of psych-verbs, such as in Pesetsky 1987, 1995 (see also Cançado & Franchi 1999). Primary evidence is taken from constructions such as (i):

(i) [Each others' supporters] made Kate and John angry

where an earlier stage of the derivation demonstrating c-command relations is presumably not available. Logophoric solutions in the spirit of Giorgi (1984) are usually appealed to in such instances, though Cançado & Franchi point out that those accounts overgenerate and cannot be the whole story either. Thus, the availability of constructions such as (i) does not in itself argue against a derivational approach to (1-2), and logophoric approaches cannot explain the contrast in (4). Below, we see that many derivational binding effects exist independently of the proper analysis of psych-verbs. I begin with those examples here purely as a historical point of reference for this kind of analysis.

The assumption of derivational binding, in addition to being consistent with the attractive general program of derivational syntax advocated in Epstein et al (1998), also provides a straightforward explanation for the difference in behavior between raising (4a) and control (4b):

(4) a. [Friends of **each other**$_i$] seemed [e to amuse **the men**$_i$].
     b. *[Friends of **each other**$_i$] wanted [PRO to amuse **the men**$_i$].

Conversely, derivational binding also allows us to feed (but not bleed) binding relations in languages with certain kinds of reordering or shifting operations, as in the Japanese scrambling examples (5) and (6) below:

(5) a. **Karera**-ga [**otagai**-no   sensei]-o   hihansita   (Japanese)
         they $_{NOM}$ [each other's   teacher]$_{ACC}$ criticized   SOV
         'They criticized each other's teachers'

     b. *[**Otagai**-no   sensei]-ga   **karera**-o hihansita   SOV
         [each other's teacher]$_{NOM}$ them$_{ACC}$ criticized
         *'Each other's teachers criticized them.'

(6) a. [**Otagai**-no   sensei]-o   **karera**-ga ___   hihansita   OVS
        [each other's teacher]$_{ACC}$ they$_{NOM}$ criticized
        'They criticized each other's teachers.'

     b. ?**Karera**-o   [**otagai**-no   sensei]-ga ___   hihansita   OVS
        them$_{ACC}$ [each other's   teacher]$_{NOM}$ criticized
        'Them, each other's teachers criticized.'

If Principle A were an SS or LF phenomenon, the contrast in SOV orders (5) would be the same as the contrast in OSV orders (6). (5a) is well-formed. Raising the object to a local A-position (6a) (Miyagawa 2001 a.o) does not alter this successful binding. (6b), on the other hand, shows that the same object raising can feed a successful binding relation, absent in (5b). A similar effect is found with VP internal shifting in Russian:

(7) a. Ivan predstavil **Petrovyx**   **drug drugu**   (Russian)
         Ivan introduced   the Petrovs$_{ACC}$ each other$_{DAT}$ Acc-Dat
         'Ivan introduced the Petrovs to each other.'

b. *Ivan	predstavil	**drug druga**	**Petrovym**	Acc-Dat
Ivan	introduced	each other$_{ACC}$	the Petrovs$_{DAT}$	

c. Ivan	predstavil	**Petrovym**	**drug druga** ___	Dat-Acc
Ivan	introduced	the Petrovs$_{DAT}$	each other$_{ACC}$	

d. ? Ivan	predstavil	**drug drugu**	**Petrovyx** ___	Dat-Acc
Ivan	introduced	each other$_{DAT}$	the Petrovs$_{ACC}$	

If Principle A were an SS or LF phenomenon, the contrast between Acc>Dat orders in (7a) and (7b) would be that same as that between Dat>Ac orders (7c) and (7d). Derivational binding in (7c) saves (7b).[2,3]

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[2](7) assumes a base order of Acc asymmetrically c-commanding Dat, as argued for in Bailyn 1995 and elsewhere. The asymmetry shown also argues against 2 base generated orders for Acc & Dat arguments (as vs. Miyagawa 1997).

[3]Note, however, that the evidence shown in (1-8) does not in itself argue for a derivational approach to binding. In fact, as a reviewer points out, it is consistent with an LF approach to anaphor binding such as that of Fox & Nissenbaum (2004), assuming the availability of A-chain reconstruction. Indeed, the reviewer argues, sentences similar to (ii) (adapted from Chomsky 1995, with his judgments provided) seem to *require* an LF approach, if we assume LF composition of idiomatic elements such as *take pictures*:

(ii) a. John wondered [which pictures of himself] Mary saw.
    b. *John wondered [which pictures of himself] Mary took.

(The actual Fox & Nissenbaum facts involve a different idiom, not *take pictures*, but rather *have an idea* following Heycock's 1995 discussion of the idiomatic nature of verbs of creation.)
    However, as pointed out by Zeljko Bošković (pc), the contrast, for those who have it, disappears under passivization:

(iii) John wondered [which pictures of himself] were taken by Mary

Thus the LF idiom-composition approach of Heycock and Fox & Nissenbaum cannot be the entire story on idiom composition, and the claim that (ii) supports an LF-only approach to anaphor binding is weakened. Further, the LF approach cannot account for the availability of A'-driven bindees, given below.

For these reasons, it has often been argued that Principle A is an "everywhere principle", calculated "on-line" in the course of the derivation. (**Error! Reference source not found.** provides 2 possible formulations.[4]

(8) a. Principle A of the Binding Theory can be satisfied at any point in the derivation (Grewendorf & Sabel 1999, p. 13)

   b. Information on the antecedent/binder of an anaphoric element is sent to semantics at any point of the derivation. (Saito 2005, p. 16)

(8) assumes a version of Principle A requiring A-binding – c-command in the local domain at some point in the derivation is not enough.[5]

    Another strong piece of evidence in favor of a derivational approach to Principle A concerns the fact that anaphors, or expressions containing anaphors, that are A'-moved (and hence later undergo reconstruction), can nevertheless be successfully bound in the higher clause. This occurs both with English WH-movement (9) and Japanese Long Distance Scrambling (10).

(9) John$_i$ wonders [which pictures of himself$_i$] Mary showed *t* to Susan.

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[4] I set aside derivational approaches to binding such as Kayne (2002) and Zwart (2002), in which the antecedent starts together with the anaphor and then moves away. Such approaches strongly predict the absence of Long Distance effects and are also incapable of capturing the Subject Condition (see below).

[5] Japanese LD Scrambling and English Topicalization cannot feed Principle A because of the A' nature of the landing site:

(iv) * **Karera**-o$_i$ [**otagai**-no   sensei]-ga   [[Tanaka-ga   t$_i$
      them$_{ACC}$ [each other's teacher]$_{NOM}$ Tanaka $_{NOM}$

       hihansita]   to   itta
       criticized   that   said
    *'Them$_i$, [each other's teachers] said that Tanaka criticized t$_i$.'

  c. ***John**$_i$, pictures of **himself**$_i$ describe t$_i$ perfectly.

(10) a. Taroo-ga$_i$ [$_{CP}$ Hanako-ga$_j$ [$_{CP}$ **Ziroo**-ga$_k$ **zibunzisin**-o$_{*i/*j/k}$
 Taroo$_{NOM}$ Hanako$_{NOM}$ Ziroo$_{NOM}$ self$_{ACC}$

 hihansita to] itta to] omotteiru (koto)
 criticized that said that think   fact

 'Taroo$_i$ thinks [that Hanako$_j$ said [that Ziroo$_k$ criticized self$_{*i/*j/k}$]]'

 b. **Taroo**-ga$_i$ [$_{CP}$ **zibunzisin**-o$_{i/j/k}$ **Hanako**-ga$_j$ [$_{CP}$ t' **Ziroo**-ga$_k$ t
 Taroo$_{NOM}$ self$_{ACC}$ Hanako$_{NOM}$ Ziroo$_{NOM}$

 hihansita to] itta to] omotteiru (koto)
 criticized that said that think   fact

 'Taroo$_i$ thinks [that self$_{i/j/k}$ Hanako$_j$ said [that Ziroo$_k$ criticized t]]'

A similar effect is found with Russian LD-Scrambling, as shown by Antonenko (2006):

(11) a. **Ty**$_i$ xočeš, čtoby **Saša**$_k$ našel   [**svoego**$_{*i/k}$ druga]?
 You$_i$ want that   Sasha$_k$ find$_{SUBJ}$ self's$_{*i/k}$ friend
 'Do you want that Sasha find his friend?'

 b. **Ty**$_i$ [**svoego**$_{i/k}$ druga] xočeš, čtoby **Saša**$_k$ našel t ?
 You$_i$ self's$_{i/k}$ friend want that   Sasha$_k$ find$_{SUBJ}$
 'Do you want that Sasha find his/your friend?'

LD-scrambling is well-known to have no effect on interpretation (Saito's (1992) "Radical Reconstruction" property) and is therefore generally accepted as a process whose effect is entirely undone at LF. Thus the availability of higher binders in (10b) and (11b) can only be accounted for by a derivational approach to Principle A.

We can therefore draw the interim conclusion that there is good evidence, from a range of languages, that a derivational version of Principle A is required. We next turn to a paradox created by this interim conclusion: a different set of binding facts seem to point to the need for an LF-only approach. The rest of this article is devoted to

resolving this paradox.

2 LF Movement of Anaphors and the Binding Paradox

It is well-known that many monomorphemic anaphors allow "Long Distance" binding, whereby the antecedent can be found outside the local clause, thereby apparently violating the locality requirement on anaphor binding. This is shown in (12a-b) for Russian and Chinese.

(12) a. **General**   poprosil   polkovnika [**PRO** narisovat' **sebja**].
general$_i$ requested   colonel$_k$ PRO$_k$ to draw   self$_{i/k}$
'The general$_i$ asked the colonel$_k$ to draw himself$_{i/k}$.' (ambiguous)

b. **Zhangsan**   renwei **Lisi**   zhidao **Wangwu**   xihuan **ziji**
Zhangsan$_i$ think Lisi$_j$ know   Wangwu$_k$ like   self$_{i/j/k}$
"Zhangsan thinks Lisi knows Wangwu likes him/himself."
(3 ways ambiguous)

Typically, the data in (12) have been analyzed as resulting from LF movement of the anaphors in question to the highest functional category within the binding domain (IP/TP), as argued in Pica 1991, Cole & Sung 1994, a.o.[6] This movement is covert, on such accounts, and can proceed into the higher domain if not blocked by independent elements, such as an indicative complementizer in languages such as Russian or Icelandic, or a subject carrying different phi-features from those of the lower domain, (the so-called Chinese blocking effects).

On such accounts, the distinct readings of (12) are related to distinct LF's after LF anaphor raising. LF application of Principle A in such languages predicts that only SpecT elements can be binders of such anaphors and therefore these accounts are strengthened by the well-known correlation between the availability of Long Distance anaphora and "subject-orientation" -- the requirement whereby the antecedent of an anaphor must be a subject, something that does not hold, for example, in English (13), as vs. Russian (14a), or Serbo-Croatian (14b):

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[6]Progovac (1992), (1993) argues for an Agree approach and against a movement account of subject orientation. It is not immediately clear, however, how her approach can capture the microvariation between Russian and Serbo-Croatian discussed in this paper. I therefore leave such approaches aside.

(13) John$_i$ asked **Bill**$_k$ about **himself**$_{i/k}$. (ambiguous)

(14) a. **Ivan**$_i$ sprosil Borisa$_k$ o   **sebe** $_{i/*k}$ (Rus)
       Ivan asked Boris about self
       'Ivan asked Boris about himself (Ivan)' (subject only)

    b. **Jovan**$_i$ je pitao Nenada$_k$ o   **sebi** $_{i/*k}$ (SC)
       Jovan$_{NOM}$ aux asked Nenad$_{ACC}$ about self
       'Jovan asked Nenad about himself (Jovan)' (subject only)

The relevant LF structure of (14) is given in (15).

(15) Schematic view of the Subject Condition: (LF)
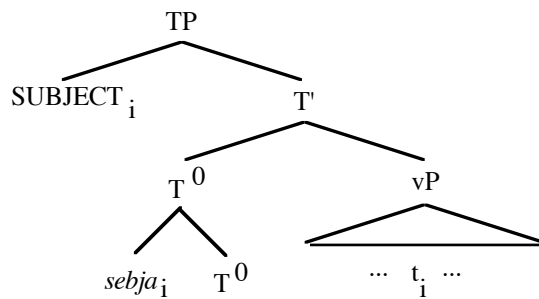
Of course (15) is an LF structure – no overt movement of the anaphor occurs. Before LF movement, the English structure in (13) and the Slavic structures in (14) and (15) do not differ in any relevant way. Thus derivational binding, in either of the versions presented above in (8), predicts binding to be possible in (14-15) just as it is in English (13), indeed as soon as the object and anaphor are both present in the structure. LF movement is required to feed Long Distance readings, but crucially, the well-known correlation with object obviation (the Subject Condition) holds only if Principle A is an LF principle, holding after anaphor raising to T.

(16) <u>The Binding Paradox</u>:
    a. Principle A is an anywhere condition (examples 1-2, 4-7, 9-11)
    b. Principle A applies at LF only (examples 12, 13-14)

In what follows, I will show that we can capture the significant insights of both the derivational and LF raising accounts by using a system of overt feature movement (Move F) and by limiting derivational interpretation to elements with no remaining uninterpretable features.

3 Evidence for Configurational Binding

In Bailyn (2003, 2004a,b) I show that there is a wide range of possible binders for subject-oriented anaphors in Russian, as shown in (17-19). This is consistent with claims that local Scrambling is A-movement (Mahajan 1990, Miyagawa 1997, Lavine & Freiden 2001) allowing various non-Nominative binders to be available for such anaphors, but only when raised into the appropriate position.

(17) a. [U **Petrovyx$_i$**]   byl   [**svoj$_i$** dom]   (Rus)
       at the Petrovs   was   [self's house]$_{NOM}$
       'The Petrovs had their own house.'

    b. ???[**Svoj$_i$** dom]   byl   u   **Petrovyx$_i$**
       [self's house]$_{NOM}$ was   at   the Petrovs
       'The Petrovs had their own house.'

(18) **Menja$_i$** tošnit   ot   **svoej$_i$**   raboty   (Rus)
     me$_{ACC}$ nauseates from selfs's   work
     'I am sickened by my work.'

(19) a. ?**Ej$_i$**   nravilas'   [**svoja$_i$** kvartira]   (Rus)
       she$_{DAT}$ liked   [self's   apartment]$_{NOM}$
       'She liked her apartment.'

    b. **Ivanu$_i$**   nužen   vrač$_k$ dlja   **sebja$_{i/*k}$**
       Ivan$_{DAT}$ necessary doctor$_{NOM}$ for   self
       'Ivan needs a doctor for himself.'

    c. **Ivanu$_i$** xolodno v   **svoem$_i$** dome
       Ivan   cold   in   self's   house
       'Ivan is cold in his (own) house.'

(17) shows that [u+NP] possessives can bind, but only when raised to SpecT, as can Accusative objects of certain verbs (18), and various kinds of dative experiencers (19). That the relevant movement is A-movement is confirmed by correlation with other A-properties, (Bailyn 2004a).

In contrast, Serbo-Croatian (henceforth SC) is more restricted in the extent to which its subject-oriented anaphors can be bound my non-Nominative antecedents. SC allows no PP, Accusative or Dative binders equivalent to Russian (17-19). This is shown in (20-22).

(20) *[Kod **mene**$_i$] je bila **svoja**$_i$ kuća   (SC)
     at   me   aux was [self's house]$_{NOM}$
     'I had my own house.'

(21) ***Meni** se svidja **svoj** posao   (SC)
     me$_{DAT}$ refl like   [self's work]$_{NOM}$
     'I like my work.'

(22) ***Jovanu**$_i$ treba   doktor$_k$ u **svojoj**$_i$ kući   (SC)
     Jovan$_{DAT}$ necessary doctor$_{NOM}$ in self's   house
     'Jovan needs a doctor in his house.'
     ($\neq$ *Jovan*; *doktor* ok for some speakers)

The clear contrast between the possibilities in Russian (17-19) and SC (20-22) is best accounted for by a structural theory of binding, since the meanings in the (often cognate) constructions are nearly identical, as is the word order. In many ways, given the subject condition, it is the Russian case that is unexpected. However, given the EPP analyses of such Russian cases, an avenue is opened to account for the microvariation in structural terms, by independently observable differences in the flexibility of the EPP requirement in T.

In particular, we have seen that in Russian, various non-Nominative elements can move to SpecT (= Generalized Inversion) (Bailyn 2004a). For Serbo-Croatian, on the other hand, we can hypothesize that pre-verbal non-nominatives are in A'-position, that is that SC allows little or no local A-Scrambling into SpecT. If this hypothesis is correct, we have an independent explanation for the Russian/SC microvariation that supports the configurational account of anaphor binding in both languages, and hence supports a movement to T analysis of subject-orientation.

Furthermore, there is independent evidence, from Weak Crossover, for the difference in pre-verbal subject position between Russian and preverbal non-Nominative elements. Bailyn 2004a, (see also Williams 2006) has shown that overt movement of object quantifiers across bound pronouns does not trigger a crossover violation. This is shown in (23-25).

(23) a. * Ee$_i$ sobaka   ljubit   každuju   devočku$_i$ (Russian)
         [her   dog]$_{NOM}$ loves   [every   girl]$_{ACC}$
         'Her$_i$ dog loves every girl$_i$.'

     b.   [Každuju   devočku]$_k$ ljubit   ee   sobaka   t$_k$
           [every   girl]$_{i\ ACC}$ loves   [her$_i$ dog]$_{NOM}$
           'Every girl is loved by her dog.'

(24) a. *[Ee$_i$ sobaka] byla   na rukax u [**každoj**   devočki]$_i$
          her   dog$_{NOM}$ was   on arms   at every   girl
          'Her dog was in every girl's arms.'

     b. ?U   [**každoj** devočki]$_i$ byla   na rukax   [ee$_i$ sobaka]
          at   every   girl   was   in arms   her   dog$_{NOM}$
          'Every girl had her dog in her arms.'

(25) a. * [**Ee**   sobaka] nužna   [**každoj**   devočke]$_i$
          her   dog$_{NOM}$ needs   every   girl$_{DAT}$
          'Her$_i$ dog is needed by every girl$_i$.'

     b. [**Každoj**   devočke]$_i$ nužna   [**ee** sobaka]
          every   girl$_{DAT}$ needs   her dog$_{NOM}$
          'Every girl$_i$ needs her$_i$ dog.'

In each of the Russian examples (23-25), the (a) sentences is ill-formed because of covert QR (as in English equivalents). However exactly those structures that allow binding by non-nominatives obviate weak crossover in the (b) sentences. The prediction, then, is that SC will not show the same degree of obviation. (26) shows that this appears to be the case.

(26) a. * **Njena¡** mačka voli **svaku** devojku¡ (SC)
       [her¡ cat$_{NOM}$] loves [every girl] ¡ACC
       'Her¡ cat loves every girl¡.'

   b. ???**Svaku** devojku$_k$ voli **njena¡** mačka
       [every girl]$_k$ ACC loves [her$_k$ dog]-NOM
       'Every¡ girl is loved by her¡ dog.'

The overt moved quantifier in (26a) triggers the WCO effect just as QR does in (26a). If the contrast between (26b) and the (b) sentences in (23-25) is significant, we have strong confirmation for a configurational approach to subject-orientation and its microvariation, namely that the SpecT position is targeted by some local movements, which coupled with covert movement of anaphors accounts for their subject orientation. However, this only strengthens the conflict between the LF account of Principle A needed for subject-orientation, and the derivational requirements we started with. In the next section, I will propose an approach to anaphor binding that allows aspects of both LF and derivational binding to be maintained.

4 Resolving the Binding Paradox

The paradox we have reached concerns the level of application of Principle A of the Binding Theory. On the one hand, anaphor binding must be derivational, or else we would have no explanation for examples such as English (1-2) and (4), Japanese (5-6) and (10) and Russian (7) and (11). In all of these cases, neither an SS application of Principle A nor an LF version would correctly capture the facts. In particular, the generally acknowledged reconstruction of A'-movement in (9-11) would not predict surface binding possibilities. Conversely, in (1-2) and (4-6), local A-movements that would be expected to bleed successful binding relations in any LF version of Principle A do not in fact do so. For all of these sentences, on standard assumptions about reconstruction, only a derivational approach succeeds.

On the other hand, a derivational approach does not appear able to explain subject orientation of Russian and Japanese anaphors, which can never be bound by local objects, despite the fact that a perfectly good binding configuration holds at an early stage in the derivation (before LF

movement), which we have seen to be an acceptable state of affairs in other instances. Nevertheless, object binding is notoriously bad with monomorphemic anaphors, thus implicating application of Principle A only after LF movement has bled the environment for object binding.

The solution to the paradox is relatively simple: the "LF" movement required with monomorphemic anaphors must be an instance of **overt feature movement** (Move F – see Roberts 1998, Rudnitskaya 2000 a.o), so that it can interact with a *derivational* version of Principle A, given just below. Let us assume, therefore, that monomorphemic anaphors carry a certain uninterpretable feature [A] (Saito 2003, 2005), that must be eliminated by being in a local relation with [T]. (Something like this is required in all LF movement accounts. Here, however, the movement is overt). The Move F version of anaphor movement is given in (27):

(27) The Monomorphemic Anaphor Condition:

    a. Monomorphemic anaphors have an (independent) requirement to have their [A]-feature checked in INFL (T)

    b. Covert (LF) movement of anaphors is = *Overt movement of the* [A] *feature* (see also Rudnitskaya 2000)

    c. Monomorphemic anaphors become interpretable after the [A] feature requirement in (a) has been satisfied

Given (27), the derivational nature of Principle A becomes sensitive to the feature requirements of the elements involved, exactly as the data imply.[7] In particular, monomorphemic anaphor binding can crucially not be calculated until Move F has occurred. At the same time as we have seen, Principle A remains in its essence derivational, as a range of

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[7]Naturally, the question arises as what the nature of the [A] movement requirement is, why it can be satisfied only by T, and why it should apply only to monomorphemic anaphors. I will not take a strong stand on these issues here other than to say that the question applies to any movement account of anaphor binding (see Cole & Sung 1992 for discussion), regardless of level of application (Covert Movement vs. Move F). The fact that only non-agreeing (monomorphemic) anaphors are involved implicates feature sharing, in the sense of Pesetsky & Torrego 2004, with the element in SpecTP. I leave the exact formulation of what forces anaphor raising to T to future work.

potential binders can move into A-position, if the language independently allows such movement, as we have seen for Russian and Japanese. Furthermore, recall from above that various elements can be bound after LD scrambling, an A'-movement which obligatorily reconstructs, requiring derivational binding only.

Thus Principle A applies derivationally, but only once the anaphor is available for interpretation, which in turn depends on it carrying no uninterpretable features. This approach is fully consistent with derivational approaches to Spell Out advocated by Kitahara (1997), Epstein et al (1998), Saito (2003) and others. A version of Derivational Spell Out is given in (28).

(28) Derivational Spell Out (Kitahara 1997, Epstein et al 1998, Saito 2003)

    a. Linguistic expressions and their interpretations are built up derivationally. In particular, items are interpreted *as they become interpretable* in the course of the derivation.

    b. An element becomes interpretable when all its uninterpretable features have been deleted.

With respect to Principle A, a derivational approach, provided in (29), can now be maintained with no loss of empirical coverage:

(29) <u>Derivational</u> <u>Principle A</u>: Satisfied if an interpretable anaphor is bound by a c-commanding coindexed [+D] antecedent *at any time in the derivation*

As for the effect of A-movement but not A'-movement on potential antecedents, we need only assume that A-movement is triggered by a [D] feature which then enters into binding relations, whereas A'-movement has a different trigger [wh] or [OP] and therefore doesn't feed binding relations.[8] Thus Japanese object scrambling, Russian Generalized

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[8]Note that this approach is similar in spirit to that of Saito 2003: "Let us assume that deletion applies to the features P, O and D so that each of them is retained only at one position. The P-feature must be retained at the head of the chain. For the rest, suppose further that deletion is constrained by selection …, and that a feature can only appear in a position where it is selected." (Saito 2003)

Inversion, English passivization and raising and other instances of A-movement can feed new binding relations in the course of the derivation. In the case of English, however, where anaphors themselves carry no unintepretable [A] feature, the system allows binding from any A-position, including the relatively low position occupied by objects. In subject-orientation languages, object binding fails, because the anaphor is c-commanded by the object only at a stage when it is still uninterpretable. (30) summarizes the analysis:

(30) <u>Derivational resolution of the Binding Paradox</u>:

    i. Monomorphemic anaphors have an (independent) requirement to have their A-feature valued in INFL (T)
    ii. Covert (LF) movement of anaphors = *Overt movement of* [A]
    iii. Until [A] is valued in T, (monomorphemic) anaphors cannot be interpreted
    iv. Elements are interpreted (enter into binding relations) as soon as they are interpretable
    v. Principle A is derivational, and yet the Subject Condition is intact

The system proposed here makes a strong prediction, namely that examples like (1), repeated as (31) should not be available in languages like Russian or Serbo-Croatian, because the early binding allowed by derivational spell-out cannot apply until Move F has occurred in those languages, removing the anaphor from the binding domain of the experiencer object (a version of the subject-condition). (32-33) show that this prediction holds for both Russian and Serbo-Croatian.[9]

However, Saito (2003) encounters various difficulties, esp. (a) the claim that scrambling is not feature-driven, and (b) the assumption that all scrambling is to a uniform IP-adjunction position, which requires maintaining stipulations about when this position is an A-position (Japanese Scrambling) and when it is an A'-position (English Topicalization). See Bailyn (2004b) for details of how such complications can be avoided. Also, Saito's approach cannot solve the Binding Paradox (ie, the Subject Condition must be stipulated).

[9]Presumably, the somewhat acceptable nature of the (a) sentences relates to a possible logophoric use of the reflexive pronoun that is unavailable with the possessive form in the (b) sentences, for which the effect is particularly strong, possibly because of the unavailability of movement our of a subject, as a

(31) [Pictures of **himself**] worry **John**.

(32) a. ??[Sluxi   o   **sebe**$_i$]   volnujut   **Ivana**$_i$ (Rus)
         rumors   about self   worry   Ivan$_{ACC}$
         'The rumors about himself worry Ivan'

    b. * [**Svoi** podčinennye]$_{NOM}$ razdražajut   **Ivana**.
       [self's subordinates]   `   irritate   Ivan
       'His subordinates irritate John.'

(33) a. ??[Glasine o   **sebi**] brinu   **Jovanu**   (SC)
         rumors   about self   worry   Jovan$_{ACC}$
         'The rumors about himself worry Jovan'

    b. * [**Svoji**   radnici] brinu   **Jovana**.
       self's   workers worry Jovan
       'His workers worry Jovan.'

5 Conclusion

We have seen the need for a derivational version of Principle A. At the same time, the Subject Condition is languages like Russian and Serbo-Croatian appears to present a problem for derivational binding in that some kind of movement must occur before binding is calculated, so that the observed object obviation is achieved. This Binding Paradox can be resolved with a Move F approach to anaphor movement, along with a particular version of derivational Spell-Out. Microvariation between Russian and Serbo-Croatian reduces to the independently motivated possibility of movement into SpecT of more non-Nominative elements in Russian than in Serbo-Croatian.

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reviewer suggests. The contrast between English (31) and even the better (a) sentences in Russian and Serbo-Croatian shows that the prediction holds. I leave the issue of the proper characterization of the difference between the pronominal anaphor **sebja / sebe** and the possessive **svoj** for future research.

References

Antonenko, Andrei. 2006. Scrambling in Russian and the Subjunctive/Indicative Distinction. ms Stony Brook University

Bailyn, John Frederick. 1995. A Configurational Approach to Russian 'Free' Word Order. Doctoral Dissertation, Cornell University.

Bailyn, John Frederick. 2003. Does Russian Scrambling Exist? In *Scrambling and Word Order*, ed. Simin Karimi, ed. Blackwell.

Bailyn, John Frederick. 2004a. Generalized Inversion. *Natural Language and Linguistic Theory* 22: 1-50.

Bailyn, John Frederick. 2004b. A (purely) Derivational Approach to Russian Scrambling. *In Proceedings of FASL 11,* Michigan Slavic Publications.

Belletti, Adriana & Luigi Rizzi. 1988. Psych-verbs and θ-Theory. *Natural Language and Linguistic Theory* 6: 291–352.

Belletti, Adriana & Luigi Rizzi. 1991. Notes on Psych-verbs, θ-Theory, and Binding. In *Principles and Parameters in Comparative Grammar*, ed. Robert Freidin, 132–162, Cambridge, MA: MIT Press.

Cançado, Marica & Carlos Franchi. 1999. Exceptional Binding with Psych-Verbs. *Linguistic Inquiry* 30: 133-143.

Chomsky, Noam. 1995. *The Minimalist Program.* Cambridge, MA: MIT Press.

Cole, Peter & Sung, L-M. 1994. Head Movement and Long-distance Reflexives. *Linguistic Inquiry* 25.

Epstein, Samuel D. (et al) 1988. *A Derivational Approach to Syntactic Relations*. Oxford: Oxford University Press.

Epstein, Samuel D. & Daniel Seely, eds. 2002. *Derivation and Explanation in the Minimalist Program*. Blackwell.

Fox, Danny & Jon Nissenbaum. 2004. Condition A and Scope Reconstruction. *Linguistic Inquiry* 35: 474-485.

Giorgi , Alessandra. 1984. Toward a Theory of Long Distance Anaphors: A GB Approach. *The Linguistic Review* 3: 307–361.

Grewendorf, Günter & Joachim Sabel. 1999. Scrambling in German and Japanese: Adjunction Versus Multiple Specifiers. *Natural Language and Linguistic Theory*, 16: 1-65.

Heycock, Caroline. 1995. Asymmetries in Reconstruction. *Linguistic Inquiry* 24(1): 103-128.

Kayne, Richard. 2002. Pronouns and their Antecedents. In *Derivation and Explanation in the Minimalist Program*, ed, Samuel D. Epstein & Daniel Seely. Blackwell.

Kitahara, Hisatsugu. 1997. *Elementary Operations and Optimal Derivations*. Cambridge, MA: MIT Press.

Koster, Jan & Eric Reuland, eds. 1991. *Long Distance Anaphora*. Cambridge: Cambridge University Press.

Lavine, James & Robert Freidin. 2001. The Subject of Defective Tense in Russian. *Journal of Slavic Linguistics*, 9 (1-2): 253-290.

Lebeaux, David. 1988. Language Acquisition and the Form of the Grammar,. Doctoral Dissertation, UMass, Amherst.

Mahajan, Anoop. 1990. The A/A-bar Distinction and Movement Theory. Doctoral Dissertation, MIT.

Miyagawa, Shigeru. 1997. Against Optional Scrambling. *Linguistic Inquiry* 28:1-26.

Pesetsky, David. 1987. Binding Problems with Experiencer Verbs. *Linguistic Inquiry* 18:126–140.

Pesetsky, David. 1995. *Zero Syntax: Experiencers and Cascades* .Cambridge MA: MIT Press.

Pesetsky, David & Esther Torrego. 2004. The Syntax of Valuation and the Interpretability of Features. ms, MIT

Pica, Pierre. 1991. On the Interaction between Antecedent-Government and Binding: the Case of Long Distance Reflexives. In *Long-Distance Anaphora*, eds. Jan Koster & Eric Reuland, Cambridge U. Press.

Progovac, Ljiljana. 1992. Relativized subject: Long-distance reflexives without movement."*Linguistic Inquiry* 23: 671–680.

Progovac, Ljiljana. 1993. Long-distance Reflexives: Movement to Infl versus Relativized Subject. *Linguistic Inquiry* 24: 755–772.

Roberts, Ian. 1998. Have/Be raising, Move F, and Procrastinate. *Linguistic Inquiry* 29: 113-125.

Rudnitskaya, Elena. 2000. Feature Movement Approach to Long-Distance Binding in Russian. In *Proceedings of FASL 9*: 275-292, Michigan Slavic Publications.

Saito, Mamoru. 1992. Long Distance Scrambling in Japanese. *Journal of East Asian Linguistics* 1: 69-118.

Saito, Mamoru. 2003 A Derivational Approach to the Interpretation of Scrambling Chains. *Lingua* 113: 481-518.

Saito, Mamoru. 2005. Further Notes on the Interpretation of Scrambling Chains. In *The Free Word Order Phenomenon*, eds. Mamuro Saito and Joachim Sabel, Berlin: Mouton de Gruyter.

Williams, Edwin. 2006. Subjects of Different Heights In *Proceedings of FASL 14*, Michigan Slavic Proceedings.

Zwart, Jan-Wouter. 2002. Issues Relating to a Derivational Theory of Binding. In *Derivation and Explanation in the Minimalist Program,* eds Samuel D. Epstein & Daniel Seely, 269-304, Blackwell.

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