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LANGUAGE INTERFERENCE IN HERITAGE RUSSIAN: CONSTRUCTIONAL VIOLATIONS

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The problem of incomplete language acquisition and heritage languages is approached from several perspectives: who are heritage speakers, how are they different from native speakers and L2 learners, is heritage language a particular system? This paper aims at answering these and other questions focusing on constructional deviations in the output of heritage speakers and linguistic strategies that these speakers perform in their production. The research is corpus-based and offers a thorough comparative analysis of English and Russian constructions.

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Introduction

A typical foreign language teacher regularly meets students fully proficient in their mother tongue and eager to become native-like speakers of another language. These students initially have no background in the second language and crawl through a system of grammatical and lexical rules, which is constantly being extended and entrenched in the learner's competence. How this happens has been the subject of both scientific and pedagogical research for decades.

The fact that students are different is not at all new, and searching for an efficient approach to all of them is a traditional problem in SLA and related fields. Sometimes, however, these differences are non-trivial and certain classrooms are much more varied than others. For teachers who have to work with both foreign language learners and heritage learners it goes without saying that the gap between these students does not purely stem from their susceptibility to certain cognitive styles of learning. In search for particular aspects which demonstrate how one group of students is different from another many educators have noted that heritage speakers are generally more creative with language than regular L2 learners. However general and vague this observation may seem, it is probably the most striking and obvious attributes of heritage learners.

We know that the roots of this creativity lie in the acquisition mode: what heritage speakers eventually study as L2 is in reality their L1—the language they started acquiring at home ([Kagan, Dillon 2006], [Smyslova 2012]), it is later (usually with the onset of comprehensive schooling) when the language of the country they live in dominates and puts their L1 in shadow. But we still do not know exactly how this creativity manifests itself and what it means in terms of linguistic theory.

This paper uses linguistic accounts of the resourcefulness characteristic of heritage speakers to explain the strategies they use in their speech. The first section presents the methodology. The following sections cover the data: the second section gives an insight into non-standard strategies, those that have not been thoroughly described and those that are specific for heritage speakers; the third and the fourth sections focus on interpreting more traditional effects of language interference in heritage learners' speech from a new perspective. In conclusion we give an overview of linguistic strategies peculiar for heritage speakers and set the stage for further research and discussion.

The Method Corpus-based research

There are presently two main understandings of who heritage speakers are. The broad definition treats heritage speakers as individuals who are born in immigration, who do not speak or understand the language of their native country and who are motivated to study the language because of his or her family ties (cf. [Hornberger and Wang 2008]). This understanding, however, is not relevant linguistically because it does not draw any line between heritage and L2 learners. In this research we operate with another, narrower definition. According to [Kagan, Dillon 2006], [Polinsky, Kagan 2007] and others heritage speakers are unstable bilinguals whose parents emigrated to a country where the majority language is different from their native one, which leads to a partial loss of proficiency in the first language under the heavy influence of the dominant second language. Such impoverishment has been the subject of particular interest among linguists over the past decade, however, few studies have directed their attention to mechanisms leading to the reduction in lexical and grammatical systems of heritage languages and the strategies that heritage speakers resort to when they are urged to go beyond those limitations.

The traditional approach taken in these works is experimental and tests for comprehension rather than production. There are quite clear reasons for this: production mistakes in free speech are extremely hard to provoke experimentally. Most judgements on the linguistic competence of HL speakers is based on how well they process input, leaving their production skills in the shadow. To enhance the comprehension results yielded through experimental studies a large set of production samples needs to be collected and made easily usable.

The Russian Learner Corpus (RLC) is such a resource important for us as we study Russian HL. It comprises texts from two categories of non-standard speakers of Russian: L2 learners and HL speakers. Available in RLC at present are texts written in Russian by heritage speakers with dominant American English language, which were kindly provided by M. Polinsky, O. Kisselev, A. Alsufieva, I. Dubinina and E. Dengub. Engineering, preliminary linguistic analysis and tagging was carried out by the members of the Heritage Russian Research Group (Higher School of Economics) led by Ekaterina Rakhilina. Plans for the near future include enhancing the RLC with texts by heritage speakers dominated by German and Finnish.

Among the most important advantages that the RLC delivers to a researcher are

- insight into production mechanisms
- extensive coverage of linguistic data
- opportunity to trace multifactorial phenomena influencing the speech flow
- considerable diversity of subjects to analyse

At present the RLC interface and tagging enable searches by labels that correspond to different lexical and grammatical parameters. These labels can also be seen as types of mistakes or errors, since they are often referred to when non-standard speakers are compared to native speakers. However this view is an oversimplification. Deviations from the baseline variety are manifestations of the emergence of a new system. This has been shown for phonetics and prosody ([Chang et al 2012], [Allen, Salmons 2012] and others), as well as for grammar (morphosyntactic and categorial changes) and syntax (loss of embedded constructions and word order violations) ([Polinsky 2008], [Mikhaylova 2010], [Laleko 2010] and others). Lexical and semantic knowledge has been scarcely covered with the exception of works dedicated to the semantics of aspect and to pragmatics of politeness in Heritage Russian [Dubinina 2010], [Dubinina, Polinsky 2013], [Mikhaylova 2010].

We approach the lexical and semantic aspects of Heritage Russian through analysing illformed constructions, and showing that departure from the baseline variety is systematic. We also argue that calquing, being a seemingly sufficient explanation for some of these deviations, does not cover all the cases under consideration and does not explain the mechanisms that account for their emergence.

Take two simple examples where a heritage speaker borrows the whole construction from the dominant American English:

(1) *printsessa v ljubvi s ... 4
princess.NOMin love.PREP with
'The princess is in love with...'

(2) *iskusstvo uchit <u>ch</u>eloveka o ...
art.NOM teach.PR.3sg person.ACC about

'Art teaches a person about ...'

Obviously, what stands behind the use of inappropriate constructions in (1) and (2) is L1 interference. To express the meaning in (1) in Standard Russian one should use either the verb *ljubit* 'loves' followed by a direct object or a participle *vljublena* followed by a prepositional *v* phrase. The Speaker uses a calque from the English construction instead. The same is seen in (2), where the corresponding Standard Russian construction enjoys a direct object after the verb *uchit*.

According to the Corpus data, such linguistic behaviour can be found in a limited number of Standard violations. More often, heritage speakers, when failing to find a proper Russian phrase

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⁴ Example taken from [Laleko 2010]

to express their semantic intention, do not turn to the dominant language but rather build constructions on their own, thus exercising a more creative linguistic mechanism.

Consider the following sentence that is considered wrong in both Standard Russian and English:

- (3) *Ekspluatatsija stran tretjego mira ot lits s vysokim VVP tozhe stala prichinoj
- lit. 'exploitation of the Third World countries **from** the persons with high GDP has also become the reason...'
- (3) is wrong in Standard Russian grammar because the preposition ot ('from') used to introduce the desubjectivized agent. Standard Russian uses the instrumental case for this function. It is wrong also in terms of Standard English, which uses by, and there is a direct correspondence between the Instrumental case in Russian and the highly grammaticalized by—phrase in English, which the Speaker, using an advanced structure of Russian as in (3), must have known, cf.:
- (4) Ekspluatacija stran tretjego mira **litsami** s vysokim VVP
- (5) The third world countries' exploitation by countries with high GDP

One of the intriguing questions to be answered in this respect is why heritage speakers make errors when the dominant and native languages are structured in the same way. Examples like (3) are numerous in the RLC and they show that heritage speakers frequently go beyond the parameters characteristic of both Russian and English. The obvious explanation for that is that language interference is not the single strategy underlying the linguistic behaviour of such speakers and that there is something more to how they build their speech.

More evidence is provided by the statistics based on the RLC: among 310 constructional errors made by heritage speakers calques represented 78, while for L2 learners the proportion was 183 calques to 285 constructional errors overall.

Non-calques

We will start a more detailed analysis with cases that we had not been originally expected to be numerous and which we called non-calques. We witness a non-calque when the speaker, expressing a certain meaning, invents a construction absent in both languages. This phenomenon is particularly interesting linguistically because it places the speaker inside a cognitive reality which has not been studied enough before. It is well-known that an average speaker is not completely free when verbalising his ideas and is obliged to play by certain rules in his or her speech. The primary goal of the non-standard speaker is to be understood, having a limited set of expressive means, which motivates them to greater transparency in their speech. At the same time heritage speakers as early bilinguals feel less pressure from the rules that regular L2 students have to learn and follow, and this liberates them from syntactic and semantic

conventions of a language even to a greater extent. For this reason, non-calques are very characteristic of heritage speakers, and in the following we describe two strategies which lead to their emergence.

The first strategy provoking a non-calque is following a general semantic schema, expressed with plain syntax. Within the framework of this study, we call such a schema a pattern – an easily conceptualized simple image or idea.

Examples (3)–(5) clearly illustrate the case. What we call an error in (3) is on its own breaking the rules that limit a standard speaker in choosing the appropriate wording, while (4) and (5) illustrate the standard linguistic form.

The speaker's intention is to express a simple schema which demonstrates a directed relation between entities. One entity (strany tretjego mira 'third world countries') undergoes negative influence (ekspluatatsija 'exploitation') exerted by another entity (litsa s vysokim VVP (lit. 'persons with high GDP'). Had not the heritage speaker used a nominalized construction, the structure of (3) would be different. If the negative influence is expressed with a verb, it is sufficient to use a syntactically simple transitive structure: 'A exploits B'. However, this seeming simplicity does not work well at the whole sentence scale. (3) contains two predicates, 'exploit' and 'become a reason for', where the first serves as an argument for the second. A prototypical reason is likely to be conceptualized as an entity and verbalized with a noun, which leads to the nominalization of the verb ekspluatirovat' 'exploit' and its partial passivization. In the passive construction the idea of directedness becomes more salient, and its semantics can be represented as: SOURCE + directed relation (negative influence) + GOAL. Since the preposition ot ('from') is one of the standard markers for the SOURCE role in Russian, it is chosen by the HS for the context rather than grammatically valid, although semantically much more vague, markers⁵. The HS goes beyond the restrictions that both language systems at their disposal impose, and produces a semantically transparent pattern-based construction.

Another illustration of the same strategy is (6):

(6) Idei o pooshchrenii kul'tury
idea.PL.NOM about stimulation.PREP culture.GEN

'Ideas about the stimulation/encouragement of culture'

The pattern that the HS wants verbalize in (6) is 'giving money to a beneficiary for something valuable'. In Russian the word *pooshchrenije* (lit. 'stimulation/encouragement') is used in this pattern when an animate noun stands in the place of the beneficiary, cf. (7):

(7) pooshchrenije rabotnikov'stimulation/encouragement of workers'

⁵ Cf. also vpečatlenije ot (lit. impression from), udovletvorenije ot (lit. satisfaction from), poraženije ot (lit. defeat from)

When the beneficiary is expressed with an abstract noun or the name of an organization, which is cognitively less primitive, the word *pooshchrenije* (lit. 'stimulation/encouragement') should be substituted with the word *podderžka* (lit. 'maintenance'). In (6), again, the speaker ignores the restriction and builds up the construction on the basis of a general pattern.

Interestingly, this strategy is chosen not only when both languages are different from each other, but also (which is more surprising) when the languages are similar. English has the same restrictions on expressing the meaning in (6) as Russian, cf. (8) and (9):

- (8) stimulation/encouragement of workers
- (9) maintenance of culture

However, there are cases when there is no available pattern as in idiomatic chunks and there is nothing left for the speaker but to invent from scratch. So the second non-calquing strategy is decomposing a complex idiomatic meaning into simple elements:

(10) *CHtoby my uchilis' i brali primer, kak postupat' i razvivat'sja pravil'no smotrja na postupki i oshibki nashix chelovecheskix predkov.

'So that we could learn and follow the example of how to behave and develop in the right way by looking at actions and errors of our ancestors'

In (10) the Speaker is literally interpreting the idiomatic expression (11):

(11) uchit'sja na oshibkax learn.INF on mistake.PL.INSTR

'learn from the mistakes [of ancestors]'

What makes the expression non-transparent and motivates the speaker to search for a clearer way to get the meaning through is the preposition na ('on'), the semantics of which within the phrase are vague. That's why the speaker breaks down the complex meaning into a set of simple elements and comes up with a **meaning-based** construction.

What is specific for heritage speakers and makes them linguistically creative is this readiness to invent new units and novel rules. Heritage speakers avoid complexity in semantics and syntax. The basic principle that they follow in both non-calquing strategies—pattern-based and meaning-based—is the preference of compositionality⁶, which in plain words could be reformulated as combining simple meanings with the help of simple syntax.

In the following sections we focus on strategies that are to a certain extent related to language interference and see if the same principle holds for them as well.

⁶ In its traditional reading the compositionality principle states that the meaning of a complex expression is determined by the meanings of its parts, and the function that combines them (see Frege).

Semi-calques

The next major strategy leads to the appearance of semi-calques. Going back to the point that heritage speakers have a special status in that they possess two language systems, with the native one being different from the dominant one, we assume that they will at some point resort to these systems. Calquing from the dominant language is something that many researches have noted while describing peculiarities in HS lexical resources, which at first sight makes them similar to L2 learners⁷. Also, borrowing entire constructions from the dominant language and thus using only its resources is not the only strategy. The speaker may also use their native language for support and combine lexical and grammatical fragments from two languages. Unlike the strategy outlined in the previous section, the linguistic behaviour to be described below draws both language systems that the speakers have to their disposal. A simple illustration is given in the following sentence produced by a HS:

- (12) *Po kontrastu k etomu ja dumaju chto ...
 along contrast.SG.DAT to this.SG.DAT I think.PR.1sg that...
- (12) is the result of combining parts of Russian and English non-compositional constructions: in contrast to and po kontrastu s etim (lit. 'along contrast with'). Thus, the HS uses the first preposition po ('along') from the proper Russian construction and goes on with borrowing the second preposition k ('to') from English. There is a sound cognitive ground that the speaker bases his choice on. The urge to compare two ideas in terms of their similarity or difference is resolved in Standard Russian with the help of the preposition po ('along'), while in English a variety of units can be used, cf:
- (13) Ø Compared to / In comparison with
- (13') **Po** sravneniju s along comparison.DAT with
- (14) On the analogy with
- (14') **Po** analogii s along analogy.DAT with
- (15) **In** contrast **to**

(15') **Po** kontrastu s
along contrast.DAT with

⁷ Although both HS and L2 learners calque from their dominant language, there are distinctions in how they do it, these will be discussed later in the paper.

The metaphorization pattern according to which the spatial meaning of *po* is mapped onto a more abstract sphere is also cognitively clear: the extensive landmark that serves as a path for the moving object is transferred into the basis for continuous comparison of two mental entities. Both the semantic consistency and the statistical stability of *po* within the constructions in question make it a simple element to use for the HS.

The choice of the second preposition in (12) ignores the Russian system, although it is not arbitrary either. As mentioned, the speaker is comparing two entities in terms of their dissimilarity, however there is something specific to the construction itself, its semantics imply that one of the entities is more salient than another one, and the relation thus gets unilateral directedness. This clearly accounts for the preference of k (equivalent to the English preposition to) over any other lexical element due to its strong ties with directional semantics.

As is evident from (12) the speaker does not glue fragments of Russian and English constructions in a semi-calque arbitrarily, but rather draws on constructions that are simpler in terms of semantics and lexical combinability.

Calques

We will now turn to the last major strategy characteristic of heritage speakers; the strategy that initially was supposed to be overwhelming. Direct negative transfer from the dominant language is the most obvious reason for errors occurring in the speech of heritage speakers and, hence, may seem to be the primary one. Calquing, indeed, is quite widespread: since [Benson 1960], it has been frequently mentioned that there is a considerable number of direct borrowings in American Russian (see [Mikhaylova 2006], [Dubinina, Polinsky 2013] and others). Also, language interference is a phenomenon which is shared between heritage speakers and L2 learners, and which has been paid much attention within SLA. This presents a good methodological basis for studying particularly calques in heritage language. However, as we saw in the previous sections, straightforward transfer from the dominant language is limited among heritage speakers. Below we will turn to the specific differences in calquing strategies among L2 learners and among heritage speakers.

Consider the following example where the speaker straightforwardly borrows a construction *for two hours* from dominant English:

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(16) *dlja dva chasa
for two hours
'For two hours'
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The calque in (16) is produced by a L2 learner of Russian, not a heritage speaker. What is peculiar about it is that the preposition *dlja* 'for', unlike its English counterpart, has no temporal meaning in Russian. This makes (16) incomprehensible for a speaker of baseline Russian. The same semantic inconsistency is witnessed in (17), also by an L2 learner:

In this case the Speaker directly translates the English construction 'A named B' to refer to the shop's name.

The problem in understanding (17) for a standard speaker of Russian involves the verb *nazyval* (lit. 'called' in the ac), which must be used with the reflexive suffix in order to receive passive interpretation. Since the verb is used in the active past form (which in English coincides with the passive participle), the noun *magazin* 'shop' should formally be interpreted as its subject. At the same time the noun follows a preposition, which presupposes that it is used not in the nominative but in the accusative case and cannot stand in the subject position (the form of the noun *magazin* is the same for both cases). Thus (17) is incomprehensible in standard Russian.

Both in (16) and (17) the L2 Speaker calques a construction from English without any semantic motivation coming from Russian. This trend is unlikely to be found in the speech of heritage learners, who have more intuition for Russian. When they calque, they normally refer to those sources for transfer that are to a certain extent meaningful in terms of Heritage Language, cf. the following sentence:

(18) is a calque produced by an HL Speaker. In Russian no preposition is needed after the verb uchit' 'teach' to introduce the theme role, although it is used in English. The Speaker borrows the English prepositional construction and puts the regular Russian theme marker o 'about' to indicate this role. What is different from (16) and (17) is that the HS preserves syntactic and semantic transparency in terms of the Russian structure. Despite the grammatical violation in (18), the sentence is interpretable for any speaker of standard Russian.

It is also clear from (18) that the heritage speaker favours calquing a semantically and syntactically compositional construction from dominant language. In the Russian non-prepositional phrase that translates (18) the theme relationship between the predicate and the

noun is highly grammaticalized and expressed only through a case form, while in English the same relationship is prepositionally marked, which makes it more compositional.

When we talk about calquing, there are still certain peculiarities that heritage speakers have. First, once again heritage speakers clearly make use of their linguistic creativity—they are selective in calquing and do not lose the semantic connection with their heritage language: they only borrow a construction from English when its meaning has a certain motivation in their native language. Second, they also adhere to the principle of compositionality preference that works for all linguistic strategies discussed above.

Conclusions

Heritage speakers present a peculiar phenomenon among non-standard speakers of a language. They are often compared with regular learners of a foreign language because they have at least two languages at their disposal and they are not proficient enough in one of them. However, they have a number of distinctive features.

Heritage speakers are often called creative with language when they come to a classroom to improve their mother tongue. In this paper we show that there are certain general prerequisites for this from the point of view of theoretical linguistics. Among these are:

- a) readiness to invent new constructions, absent in both Heritage and dominant English —
 we call this strategy non-calquing;
- b) specificity of language interference: partial calquing (semi-calquing) and selective motivated calquing with direct borrowings from the dominant language;
- c) the basic principle of compositionality preference with every type of linguistic strategy; It would be interesting to compare the linguistic strategies discussed in this paper with linguistic strategies in first language acquisition to see how incomplete acquisition affects the behaviour of heritage speakers. However, this is a question for future research.

References

- Allen B., Salmons J. 2012. "Obstruenter fonetikk og fonologi i amerikanorsk og norskamerikansk engelsk." *Norsk Lingvistisk Tidsskrift*, 30. pp.149-169.
- Chang C.B., Mishler A. 2012. "Evidence for language transfer leading to a perceptual advantage for non-native listeners." *Journal of the Acoustical society of America*.. 132 (4).
- Dubinina, I. 2010. "How to ask for a favor: A pilot study in heritage Russian pragmatics." In *Instrumentarium of Linguistics: Sociolinguistic Approaches to Non-Standard Russian*, Edited by: A. Mustajoki, E. Protassova and N. Vakhtin (eds.),. Slavica Helsingiensia 40. pp. 418-430.
- Dubinina I, Polinsky M. 2013 "Russian in the USA." In *Slavic Languages in Migration*, Edited by M.Moser. Wien: University of Vienna.pp. 1-28.
- Hornberger, N. H., Wang S. C. 2008. "Who are our heritage language learners? Identity and biliteracy in heritage language education in the United States." In *Heritage Language Education: A New Field Emerging*, Edited by: D. Brinton, Kagan & Bauckus. New York, Routledge. pp. 3-35.
- Kagan, O., Dillon, K. 2006. "Russian heritage learners: So what happens now?" *Slavic and East European Journal*, 50(1). pp. 83-96.
- Laleko O. 2010. The Syntax-Pragmatics Interface in Language Loss: Covert Restructuring of Aspect in Heritage Russian. Doctoral dissertation. Minnesota. 2010.
- Mikhaylova, A. 2006. "Second Language Influence among Russian-English Late Bilinguals: Experimental study." *Innostrannye Jazyki v Vysshej Shkole*, 4.pp. 111-119.
- Mikhaylova, A. 2012. "Aspectual Knowledge of High Proficiency L2 and Heritage Speakers of Russian." *Heritage Language Journal* 9(1). pp. 50-69.
- Polinsky M. 2008. "Without aspect." In *Case and grammatical relations*, Edited by: G. Corbett, M. Noonan Amsterdam.
- Polinsky M. 2008. "Gender under incomplete acquisition: Heritage speakers' knowledge of noun categorization." *Heritage language journal*.. № 1 (6).
- Polinsky M., Kagan O. 2007. "Heritage languages: In the 'wild' and in the classroom." Language and linguistics compass.. № 1 (5).
- Smyslova A. 2012, "Low-proficiency heritage speakersof Russian: their interlanguage system as a basis for fast language (re)building." In *Russian language studies in North America*. *New perspectives from theoretical and applied linguistic*, Edited by: V. Makarova. Anthem press. pp. 161-192.

Valdes, G.: 2000, "The teaching of heritage languages: An introduction for Siavicteaching professionals." In *The Learning and Teaching of Slavic Languages and CullUres*, Edited by: O. Kagan and B. Rifkin. Slavica, Bloomington. pp. 375--403.

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