

## L2 Acquisition of the Indexical Shift Parameter in Turkish

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(Gönderim tarihi 02 Ekim 2019; kabul tarihi 25 Aralık 2020)

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**ABSTRACT:** This paper investigates the L2 acquisition of a specific syntactic phenomenon known as indexical shift. Indexicals are lexical items that pick their referents in discourse. For instance, ‘I’ and ‘you’ refer to the speaker and addressee of the conversation. In some languages, however, indexicals may *shift* to pick a different referent in the matrix clause when they are embedded in a finite complement clause. In other words, languages are largely divided into two groups: shifting and non-shifting languages. Therefore, a natural question to ask is *to what extent does L1 affect the L2 acquisition of indexical shift?* To answer this question, I carry out an experiment with learners of Turkish from shifting and non-shifting languages and find that L1 has no effect on the learners’ level of native-like performance. Turkish strongly favours shift and learners fall behind native speakers. But the difference between learners from shifting and non-shifting languages is insignificant. The paper also reiterates and elaborates on the judgments of native speakers previously attained elsewhere.

**Keywords:** indexical shift, parameter resetting, L2 acquisition, L1 transfer, Universal Grammar

### Türkçenin İkinci Dil Olarak Ediniminde Gösterimsel Kaydırma Değişkeni

**ÖZ:** Bu makale gösterimsel kaydırma olarak bilinen deęiřtirgenin D2 edinimini arařtırmaktadır. Gösterimseller öncülü bağlamda bulunan sözlüksel birimlerdir. Örneęin, “ben” ve “sen” adlarını sırasıyla konuşmanın konuşucusunu ve dinleyicisini gösterir. Ancak bazı diller çekimli iç tümcelerde bulunan gösterimsellerin bağlama alanını *kaydırır* ve bu sözlüksel birimler ana tümcede bulunan başka bir öncüle bağlanır. Dięer bir deyişle, diller gösterimselleri kaydıran ve kaydırmayan diller olarak kabaca ikiye ayrılabilir. Buradan hareketle, D1’in D2’de gösterimsel kaydırma deęiřtirgeninin edinimine etkisi nedir sorusu gündeme gelmektedir. Bu çalışmada bu soruyu cevaplamak için ana dilinde gösterimsel kaydırma olan ve olmayan öğrenci gruplarının Türkçe edinimleri üzerinden bir deney yapılmıştır. Sonuçta,

Türkçenin gösterimsel kaydırma yaptığı ve öğrencilerin ana dili konuşucularının kaydırma seviyelerinin gerisinde kaldığı sonucuna ulařılmıştır. Ancak kaydırma yapan ve yapmayan dillerden gelen öğrenciler arasındaki edim farkı istatistiksel olarak önemsiz seviyededir. Çalışma ayrıca Türkçe ana dili konuşucularının bu deęiřtirgen ile ilgili başka çalışmalarda ulařılan konuşucu yargılarını tekrarlamakta ve yeni öngörüler sunmaktadır.

*Anahtar sözcükler:* gösterimsel kaydırma, deęiřtirgen yeniden ayarlama, D2 edinimi, D1 aktarım, Evrensel Dilbilgisi

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## 1 Parameters and (Second) Language Acquisition

The theory of Principles and Parameters (P&P) has some implications and questions for second language acquisition. The greatest difference between first and second language acquisition is that in the latter learners come with parameters already set during L1 acquisition. Thus the first question to ask is *do learners transfer the parameters of their L1 to L2 or do they set the parameters via direct access to UG?* Research into L1 transfer and UG has led to three different answers. First, UG is not at play in L2 acquisition. Also, there is no parameter resetting. Learners become competent in L2, if they do, thanks to some learning strategies shared with other skills learnt in childhood or adulthood (Bley-Vroman, 1990, Clashes & Muysken, 1989; Schachter 1989). The second and third answer basically oppose the first: UG is involved. They only differ in the circumstances under which UG is involved. Starting with the second, the Transfer Hypothesis argues that learners transfer L1 parameters to L2 (L1 is the initial state of L2 acquisition) and UG is only accessed if L1 parameters do not match those of L2. According to one interpretation of this hypothesis (Tsimpli and Roussou, 1991; Eubank, 1993; Flynn, 1983), learners transfer their L1 values but UG is still partially accessible to L2 learners. They have UG principles and L1 values of their mother tongue, but are unaware of the other value for each parameter. Therefore, they have to construct them by accessing UG where necessary. This is known as the partial access hypothesis. The other interpretation is known as the full transfer/full access hypothesis (White, 1985, 1987; Schwartz and Sprouse, 1994, 1996; Uziel, 1993; Martohardjono, 1993; Haznedar, 1997) where it is argued that learners transfer their L1 parameters, but when they see these don't match those of L2, they reset the parameters to values already available to them. Both interpretations of the transfer hypothesis predict that if L1 values match those of L2 in a second language acquisition environment, learners have an advantage over those learners whose language has different parameter values. Learners from a language with matching values should start L2 acquisition with performance levels close to native speakers while learners from a language with non-matching values should fall behind and spend some

time before they catch up since they need sufficient evidence indicating that the parameter values of their L1 need to be reset. Among many others (see the above citations) Schwartz and Sprouse (1994) and Haznedar (1997) report supporting results. Haznedar, for example, worked with an L1 Turkish young learner (Erdem) acquiring English as L2. She reports that Erdem insisted on OV order while speaking a VO language until he reset the parameter. He also transferred the V-Neg order in Turkish to English. Erdem reset his parameters quite late in Haznedar's interviews. Note that no-UG hypothesis would make the same prediction. In such a scenario, L2 acquisition would be analogous to motorcycle riding, and anyone with no experience of, say, bicycle-riding would be delayed while an experienced bicycle rider should start riding a motorcycle almost immediately. However, the two would differ in how the learner from a non-matching L1, the inexperienced rider in the analogy, would proceed in the acquisition process. No-UG hypothesis would predict a steady increase as the learner becomes more proficient in L2 while the transfer hypothesis, either interpretation, foresees a sharp increase somewhere in the course of acquisition after a prolonged period of poor performance.

Finally, UG can be the initial state of L2 acquisition, which makes L2 acquisition fundamentally the same as L1 acquisition. In other words, L2 learners access UG from very beginning without L1 interference. This is theoretically grounded by Platzack (1996) who offers *The Initial Hypothesis of Syntax* (IHS), according to which language learners – first and second – start off with the unmarked value of each parameter and adjust their grammar by switching the parameters where language input contradicts the unmarked value. For example, UG specifies that the verb moves in LF (unmarked value) and leaves open the possibility that it may take place earlier (marked value) (Chomsky, 1995). This predicts that learners will assume LF movement in the language they are exposed to until contradictory evidence accumulates (direct access). This assumption of learners should be visible in their production data as recurring appearances of the unmarked value, and this is exactly what Yuan (2001) found in his L2 experiment. French learners of Chinese did not produce overt verb movement data although the verb moves overtly in French. Furthermore, there was no significant difference between the speakers of French and the speakers of English, a covert verb movement language, with respect to Chinese data, another covert verb movement language. This directly contrasts with the prediction made by the transfer hypothesis and calls for another account: L2 learners directly access UG without L1 interference (IHS).

This paper aims to help settle the debate by looking at the second language acquisition of a parametric property in Turkish, namely indexical shift. I investigate the effect of the parameter value in learners' native language and their competence level in Turkish. Turkish is a shifting language (see §3.4), and below

is a sketch of what we might see in the data and which hypothesis each possibility supports. There are two portions of data to look at in order to check each hypothesis' predictions: 1) how learners start 2) how they proceed. Starting with the first, if they start with similar performance levels – call it scenario 1, S1 for short – this points to IHS. Furthermore, if S1 is true, similar and low performance levels means the default value is no-shift (S1.1) while similar and high performance levels means the default value is shift (S1.2). If, on the other hand, the learners from shifting languages start significantly better than the learners from non-shifting languages (S2) this points to either no-UG or transfer. As to the second, if S1.1 is true we expect a sudden increase in performance levels shared by all learners somewhere in the course of acquisition. This will be the point where they access UG and reset the parameter. If S1.2 is true, performance levels of all learners should be high enough from B1 and should remain stable. If S2 is true and both groups sustain a steady increase from where they start, this will point us to the no-UG hypothesis. However, if S2 is true and only the learners from non-shifting languages experience a sudden increase in performance levels while the other group remains relatively high and stable from B1 to C1, this will lead us the transfer hypothesis.

## 2 Indexicals, Monsters and Theories: A Brief History

Looking at English, Kaplan (1989) argues that words and phrases known as indexicals, that is 1<sup>st</sup> and 2<sup>nd</sup> persons, some temporal adverbs – e.g., today and tomorrow –, some locative adverbs – e.g., here –, contrast with definite descriptions in that they never shift their domain of reference from the context of the sentence to the context of the attitude verb they are embedded under. For instance, the definite description in (1a) may not actually be Mary's friend if Mary has a misperception of their relationship – furthermore, may not even exist if it is Mary's imaginary friend – since it scopes under the attitude verb *think*. In this case, it is interpreted relative to the attitude verb *think*. Yet, the indexical 'I' in (1b) is not affected by the attitude verb as is obvious from the fact that it unequivocally shows the speaker, a participant of the utterance making up the context of the sentence.

- (1) a. Mary thinks that her friend is an alien.  
 b. Mary thinks that I am an alien.

Kaplan (1989) concluded that despite the feasibility of the idea, no natural language has a logical operator that restricts the domain of interpretation for indexicals to the sentence. In other words, natural languages do not have an operator that *shifts* this domain from utterance to sentence. Since such an

operator doesn't exist, it is a *monster operator*. However, the idea was renounced after a close inspection of world's languages, including a closer inspection of English. Schlenker (1999, 2003) showed that indexicals in Amharic can be interpreted relative to the context of the clause embedded under an attitude verb, that is to say they anchor to the corresponding lexical items within the main clause. Several researchers reporting from several languages followed quickly. To give an example, 1<sup>st</sup> person singular agreement in the Amharic sentence in (2) denotes the subject of the main clause, relative to the context of the embedded clause.

- (2) Jon            jəəgnanəə-ññ            yil-all  
 John            hero be.PF-1SO 3M            say-AUX.3M  
 'John says that he is a hero'

(Schlenker 2003: 68)

Schlenker (2003) and von Stechow (2002) argue that indexical shift is when an indexical allows a logical operator to manipulate its binding domain where the attitude verb is the operator. If the indexical allows manipulation by being underspecified as to the binding context (Schlenker, 2003) or by not requiring phi identity for binding (von Stechow, 2002), the attitude verb, being a modal quantifier, can act as the monster operator. This also explains the within-language variation of indexical shift data where speakers of shifting languages rate differently the sentences with different attitude verbs. They tend to get shifty interpretations more frequently with verbs of reporting (say, tell etc.) than with verbs of supposition (think, assume, believe etc.).

Anand & Nevins (2004) and Shklovsky & Sudo (2014), on the other hand, argue differently. For them, monsters exist, but attitude verbs are not the monsters we are looking for. Rather, a monster, if available in a particular language, is a lexical item residing in the CP of the embedded clause and engendering a syntactically defined domain of shifting. Shklovsky & Sudo (2014) show in Uyghur that if a) the indexical raises out of CP, remaining lower than the modal verb b) the embedded clause is nominalized, the indexical cannot shift. Mind the contrast in (3a-b).

- (3) a. Ahmet<sub>i</sub> [men<sub>i</sub> ket-ti-m] di-di (shifted)  
 Ahmet I go-PST-1.SG] say-PST  
 ‘Ahmet<sub>i</sub> said that he<sub>i</sub> left’
- b. Ahmet [mening kit-ken-lik-im-ni] di-di (non-shifted)  
 Ahmet I.GEN go-REL-NMLZ-1.SG-ACC say-PST  
 ‘Ahmet said that I<sub>speaker</sub> left’
- (Shklovsky & Sudo 2014: 383)

The nominal embedded clause in (3b) does not allow for shifted interpretation of the indexical within while its finite counterpart in (3a) does. For the condition above, Shklovsky & Sudo (2014) first show that accusative marked subjects of finite embedded clauses are higher than their nominative counterparts (4). The reflexive attached to the indexical is only close enough to a binder when the indexical is accusative marked, which suggests that it has moved out of the embedded clause. Shklovsky & Sudo then move on to demonstrate the non-shifting behaviour of indexicals higher than accusative subjects (5). Note that the accusative subject *meni* doesn’t shift, either.

- (4) a. Men<sub>i</sub> [peqet özi-em-ni-la nan ye-men]  
 I only REFL-1SG-ACC-only bread eat-IMPF.1SG  
 di-di-m  
 say-PST-1SG  
 ‘I said that only I eat bread’
- b. \*?Men<sub>i</sub> [peqet özi-em-Ø-la nan ye-men]  
 I only REFL-1SG-NOM-only bread eat-IMPF.1SG  
 di-di-m  
 say-PST-1SG  
 ‘I said that only I eat bread’
- (Shklovsky & Sudo 2014: 391)

- (5) Ahmet Aygül-ge [san-ga men-i xet ewet-ti] di-di  
 Ahmet Aygül-DAT you-DATI-ACC letter send-PST say-PST  
 ‘Ahmet said to Aygül that I sent a letter to you<sub>addressee</sub>’
- (Shklovsky & Sudo 2014: 396)

This leads Shklovsky & Sudo to conclude that monsters have to be separate lexical items higher than embedded nominative subjects, lower than attitude verbs. It follows from this argument that since the embedded clause has to be finite (compare 3a-b), indexical shifting is a syntactic phenomenon.

Narrowing down to Turkish, Gültekin Şener & Şener (2011) show that in Turkish shifting is possible and optional with null subjects while impossible with overt subjects. Optional shift with null subjects echoes in Uyghur but overt

subjects have to be nominative in order to shift: Accusative subjects do not shift (Shklovsky & Sudo 2010, also see (5)). Gültekin Şener & Şener's (2011) examples are below:

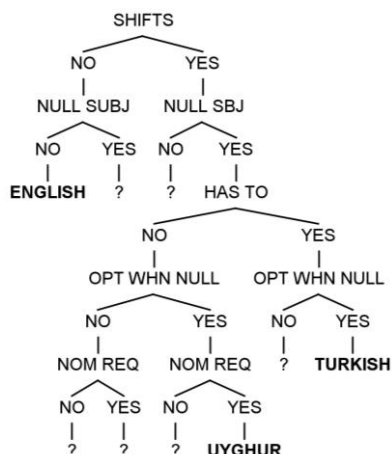
- (6) a. Seda [pro sınıf-ta kal-dı-m] san-ıyor.  
 Seda class-LOC flunk-PST-1SG believe-PRS  
 'Seda believes that x flunked.'  
 Shifted Reading: ✓  
 Non-Shifted Reading: ✓
- b. Seda [ben sınıf-ta kal-dı-m] san-ıyor.  
 Seda I class-LOC flunk-PST-1SG believe-PRS  
 'Seda believes that x flunked.'  
 Shifted Reading: \*  
 Non-Shifted Reading: ✓  
 Gültekin Şener & Şener (2011)

So far, languages are parameterized according to whether a) they allow indexical shift or not b) they require the subject to be null in order to shift and c) if b) is negative they require nominative for 1<sup>st</sup> person to shift. (7) seems to be a good approximation of the parametrization of English, Turkish and Uyghur.<sup>1</sup>

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<sup>1</sup> I am confident that (7) requires a lot more thinking. For example, once we know that subject doesn't have to be null in order to shift, is it the first question one would ask whether shifting is optional when it is null? The parameter below that, i.e. nominative requirement, also seems like a legitimate candidate. The same is true for the null subject parameter and the shifting parameter itself. Which question does the child ask first? Yet we don't have to understand parametrization in binary branches. Indeed, multiple questions can be asked at any point in acquisition or a specific parameter value can lead to a path that requires other questions than the other value requires. (7) was designed to ask the same question in sister nodes of a parameter for the sake convenience. See Roberts and Holmberg (2010) for more on parametrization.

(7)



(7) suggests that there may be null subject languages that do not allow shifting as well as non-null subject languages that shift. Such parametrization allows for such languages unless we show that the null subject phenomenon and indexical shift are the result of some more general parameter. This can be done by showing that all shifting languages are null subject languages or that all null subject languages shift.<sup>2</sup> Yet that presents as a difficult task since we don't have a definitive list of shifting languages, and reference books do not refer to this parameter. We encounter the same problem in the other terminals in (7) represented with a question mark. Cross-linguistic effort should be exerted to find those languages or declare them non-existent after a thorough search. In any case, languages seem to be parameterized down to at least three levels: They shift or not, shift requires null subject or not, and shift is optional with null subject or not. However, I will only go down as far as no-shift/shift duality and obligatory and optional shift for various reasons (see §3.2). I will also make the reasonable assumption that indexical shift is a parameter since a) it is a syntactic phenomenon (3-ab) b) it interacts with a well-known parameter (6a-b).

<sup>2</sup> A JLR reviewer notes that Italian and Spanish, both null subject languages, do not shift. The same reviewer also brought to my attention that Sundaresan (under review) has a list of shifting languages. The list, however, only includes the well-known shifting languages.



### 3 The Experiment

#### 3.1 Subjects and Procedure

The experiment took place in the Turkish Teaching Centres of Gazi University, İstanbul University and İstanbul Aydın University as well as independent subjects who took the test online via Google Docs ( $n=228$ ). The students were informed verbally and in written form at the top of the test papers and the online test that this was not intended to be an exam for them. Furthermore, they were allowed to use a dictionary or ask for clarification of some potentially unknown words although care was taken to construct the test sentences with words commonly used in the teaching environment. Most students finished in 30 minutes although they were not constrained by time. Since indexical shift hasn't been conclusively documented in Turkish, native speakers were consulted to ( $n=119$ ) via Google Docs in order to set a benchmark. Native speakers took the same test as the students. All participants were asked to provide demographic data, such as age group, gender and level of education. The learners were also asked to specify their native language and their level of Turkish as B1, B2 and C1. Students at A1 and A2 proficiency levels were not tested as the specific grammatical structure for indexical shift requires at least B1 level of proficiency. Tables 1 and 2 show the demographic data of the subjects and the control group. Table 3 shows the number of students from shifting and non-shifting languages in each level of proficiency. Since the number of learners differ in proficiency levels and L1 types, a reliability test was required. Cronbach's alpha test yielded 0.771 for proficiency levels and 0.760 for L1 types, which are deemed acceptable by George and Mallery (2003).

Table 1. Demographic Data of the Experiment

Age	15-25		26-35		35+	
	N	Percent	N	Percent	N	Percent
	168	73,7	56	24,6	4	1,7
Sex	M		F		NS	
	116	50,9	111	48,7	1	0,4
Education	Primary		Secondary		University	
	3	1,3	26	11,4	199	87,3
L1	Shift		No-shift			
	157	68,9	71	31,1		
Proficiency	B1		B2		C1	
	58	25,4	37	16,3	133	58,3

Table 2. Demographic Data of the Control Group

Age	15-25		26-35		35+	
	N	Percent	N	Percent	N	Percent
	35	29,4	52	43,7	32	26,9
Sex	M		F			
	25	21	94	79		
Education	Primary		Secondary		University	
	0	0	5	4,2	114	95,8

Table 3. Shifting Parameter in L1 across Proficiency Levels

		B1		B2		C1		Total
		N	Percent	N	Percent	N	Percent	
L1	No-shift	27	38	13	18,3	31	43,6	71
	Shift	31	19,7	24	15,2	102	64,9	157
	Total	58	25,4	37	16,2	133	58,3	228

### 3.2 Research Questions and Assumptions

The primary questions of the research are: 1) to what extent do learners of Turkish acquire the indexical shift parameter? 2) does L1 parameter delay or accelerate acquisition? 3) does L2 level affect the learners' performance? However, the indexical shift phenomenon is yet to be investigated in Turkish<sup>3</sup>. Therefore, it needs to be documented before any such study can be conducted. Since I am resorting to the judgments of native speakers as referees, this is a great opportunity to evenly distribute the dependent variables of the test and seek answers to the following questions: 1) Do all indexicals shift and if not, which ones do? 2) Which matrix verbs allow indexical shift? 3) Is shift obligatory or optional under appropriate conditions?

3 To the best of my knowledge, the only data collection study on indexicality was conducted by Özyıldız (2014). I will be comparing my data to his in §4. Also, I have been able to find four theoretical papers on the subject. To mention the others, Özyıldız (2012) and Akkuş (2019) both focus on the issue of shift together in Turkish and conclude that Turkish has counter-examples to shift together. Akkuş (2019) further argues that what allows for such counter-examples in Turkish is another operator that undoes the monster operator's effect, thus violating shift together. Özyıldız, Major and Maier (2019) analyse the shifting situations in various verbs of reception such as *hear* and *learn* under the only overt complementizer in Turkish (*diye*) and conclude that *diye* introduces a logophoric pronoun that yields the shifted interpretation. I have already mentioned the main points Gültekin Şener and Şener (2011) reached.

The first question of the second set far exceeds the scope of this paper and raises several methodological issues. For one thing, there are several lexical items that anchor to a discourse participant for interpretation: 1<sup>st</sup> and 2<sup>nd</sup> person, tense and temporal adverbs, deictic locative adverbs and demonstratives. In addition, other lexical items require a discourse participant as a reference point. For instance, evaluative adverbs (e.g., clumsily) and adjectives (e.g., idiot) reflect the speaker's point of view, and honorifics mark the social status between the speaker and the addressee. Some languages, such as Dyirbal, even mark the social status of the overhearer (Dixon, 1982: 68) while others have a special mode for context – Quran Arabic vs. every day Arabic – (Frawley, 1992: 119). All of these obviously anchor to a coordinate point or a feature of it in discourse. Finally, there is shift together, i.e., if there are more than one indexical in an embedded finite clause, can one shift without the other shifting or do they have to shift together (see Özyıldız (2014) and Anand and Nevins (2004) for more on shift together)? When coupled with the demands of the second question – that is which verbs allow shifting – and the methodological requirements to repeat a particular pattern at least twenty times to get to an accurate description and to place filler questions so that the subjects do not grow automatic, this will mean over a thousand questions to be asked to each participant. Even if one leaves out social status, overhearer and mode of context, which are not very commonly marked in languages, the number of questions for each participant reaches 1200. Since such a test is impractical<sup>4</sup>, I limit myself to null 1<sup>st</sup> and 2<sup>nd</sup> persons in subject position and to the verbs *think* and *say*. Table 4 shows the distribution of these variables in 20 test questions. Since only verbs of reporting can take a dative argument, *think* was not combined with 2<sup>nd</sup> person. Other limitations of the study were B1, B2 and C1 proficiency levels in Turkish for subjects and 15+ years of age for all participants.

Table 4. *Distribution of Variables*

	Say	Think
I	5	10
You	5	0

The nature of indexicality also calls for some assumptions. Shifting includes additional psychological processing and in some cases requires heavy contextualization. However, a biased context or world knowledge triggered by the context may favour a specific interpretation. For instance, in a counterpart of

<sup>4</sup> Özyıldız (2014) reports only 4 of 13 subjects completed his 124-item test (questionnaire 3), two of whom informed the researcher that the task was 'too difficult or too long'.

*Mary thinks I am handsome*, world knowledge would discard the interpretation where the indexical shifts to the subject. I assume the items were free from such interference or when one wasn't, repeated questions neutralized this effect. Finally, I assume my 40-item questionnaire (20 test questions plus 20 fillers) was not found too difficult or too long, and the participants answered the questions truthfully. Appendix 1 is the questionnaire administered on all participants.

Finally, I have to overlook another important methodological issue. Indexical shift has sub-types. In other words, it interacts with other syntactic parameters such as the null subject parameter and the nominative requirement in Uyghur (see (7)). Therefore, each L1 in the set of test subjects has to have a specific set of sub-parameters, which may or may not overlap with Turkish. Such variation should have an effect on the results since transfer hypothesis would predict that the more similar any L1 and Turkish are the more native-like performance is expected of learners, and the specific strategy employed – and perhaps the way the (sub)-parameters are organized – should be reflected in the data as unexpected irregularities.<sup>5</sup> However, given insufficient amount of descriptive work on the topic, I am unable to pinpoint where each shifting language in the dataset sits in such a map. Therefore, I do not go any deeper regarding shifting L1s.

### 3.3 Materials

The test was a multiple-choice test – instead of a grammaticality judgment test – where choices contained a follow-up utterance of the test sentence in the root. Each choice necessitates a specific interpretation of the indexical shift situation in the test sentence: no-shift, obligatory shift and optional shift. (8) is a test item and the grammatical representation of each choice.

- (8) “Arkadařım [matematikte çok başarılı-ım] diyor.”  
 My friend at math very successful-1SG say-3SG  
 Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?”

How do you think the speaker would continue this utterance?

- That's why he asks most of such questions to me (no-shift)
- But in fact, he is not that good (obligatory shift)
- Either (optional shift)

Since the speaker continues with a reference to themselves in a) it indicates that 1<sup>st</sup> person in the test sentence does not shift and anchors to the speaker in the test

<sup>5</sup> The ideas so far in this paragraph were noted to me by a JLR reviewer.

sentence. This is the only way a) could be a felicitous follow-up sentence. In b), on the other hand, the speaker refers to the third person subject only, which indicates that they interpreted the indexical as referring to the subject. This is the only way b) could be a felicitous follow-up sentence. Finally, c) is where the speaker optionally shifts to the subject since they state either a) or b) is felicitous.

### 3.4 Results

In this section, I report the results of the study in relation to the predictions made by the parametric organization of language and the three hypotheses summarized in §1. I will break down the hypotheses and proceed with questions that can be asked to the data.

#### *a. Do 1<sup>st</sup> and 2<sup>nd</sup> person indexicals shift equally in Turkish?*

The change in the native speakers' interpretation between 1<sup>st</sup> and 2<sup>nd</sup> person is minor and statistically insignificant ( $p > 0.05$ ). In other words, 1<sup>st</sup> and 2<sup>nd</sup> person shift equally in Turkish. See figures 1 and 2.

*Figure 1. Speakers' 1<sup>st</sup> and 2<sup>nd</sup> Person Results under 'say'*

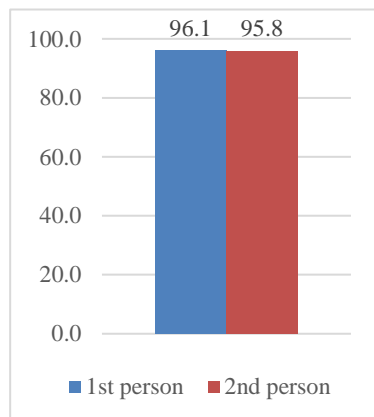
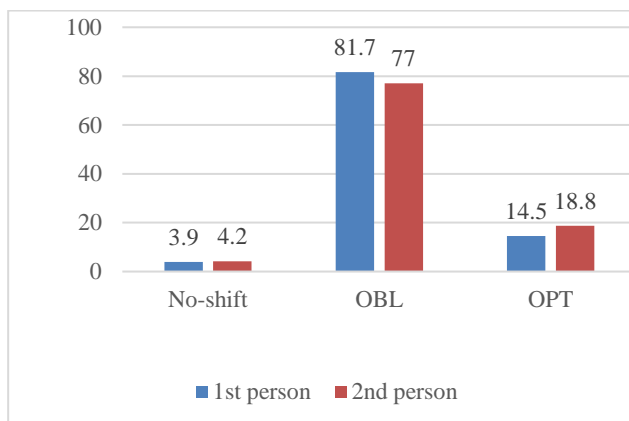


Figure 2. Speakers' Split Results for 1<sup>st</sup> and 2<sup>nd</sup> Person under 'say'



b. Does the main verb affect the shifting interpretation in Turkish?

Figures 3 and 4 indicate a statistically significant difference in shifting under *say* and *think* ( $p < 0.05$ ).

Figure 3. Speakers' No-shift/shift Duality under 'say' and 'think'

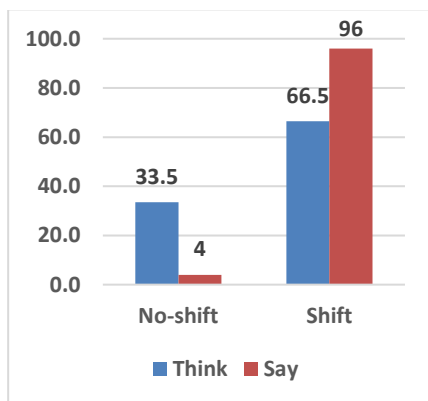
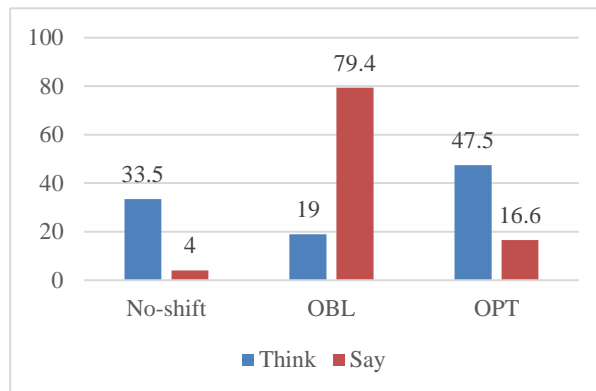


Figure 4. Speakers' Split Results under 'say' and 'think'



Comparing figures 3 and 4, we see another interesting result. The attitude verb *say* results in obligatory shift much more frequently than *think* does (79.4% versus 19%). In fact, the tendency is in opposite directions between obligatory and optional shift. Speakers impose obligatory shift with *say* (79.4%) and optional shift with *think* (47.5).<sup>6</sup> One can say the difference is stark enough to call these the official data of the language. Turkish definitely shifts under *say*, and when it does it is obligatory shift. *Think* shifts as well, though not as decisively, and when it does optional shift is favoured.

One task remains: Where does the boost in obligatory shift under *say* come from? To find out, we need to find where the subjects who mark optional shift and the subjects who mark no-shift under *think* go when they are subjected to a shifting situation with *say*. I assume, with no independent reason, that out of ten scenarios seven is enough to fix a subject's syntactic representation. Therefore, I will call optional shifters the subjects who went for optional shift at least seven times with *think*, and no-shifters the subjects who opted for no-shift at least seven times with *think*. After filtering, I ended up with 43 optional shifters and 24 no-shifters. Both groups display a fairly strong tendency to get obligatory shift interpretation with *say*. Optional shifters with *think* chose obligatory shift in 73.5% of cases with *say* while no-shifters marked obligatory shift in 91.7% of cases, with a statistically significant difference between the two ( $p < 0.05$ ). What this means is that the increase in obligatory shift with *say* is due to the flow from both sides, particularly from no-shift. *Say* presents the strongest syntactic

<sup>6</sup> Although obligatory shift under *say* is a clear win, optional shift under *think* barely wins over no-shift. Nevertheless, the difference is significant.

environment for shifting. Such that, no-shift drops from a noticeable 33.5% to immaterial 4%. Furthermore, the fact that only 2.3% of migration from optional shift ended up in no-shift pinpoints the cause of the drop in optional shift: Optional shifters moved to obligatory shift.

Overall, Turkish is a shifting language favouring more shifts with *say* than with *think*. Shift is overwhelmingly obligatory with *say* and noticeably optional with *think*. However, 1<sup>st</sup> and 2<sup>nd</sup> person shift equally.

*c. To what extent do learners of Turkish acquire the indexical shift parameter?*

Data show that learners shift 58.6% of cases (figure 5). This is the combined data of learners from shifting and non-shifting languages and all levels of proficiency. When they shift, it is 39.9% obligatory and 18.7% optional. See figure 6.

*Figure 6. Learners' No-shift/shift Duality*

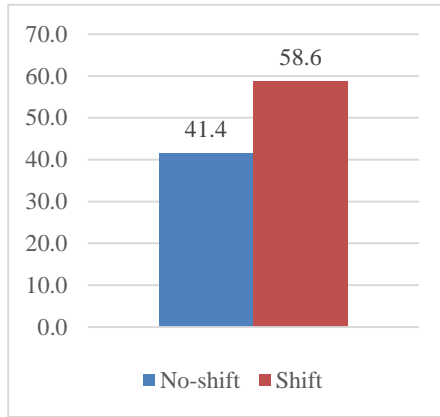
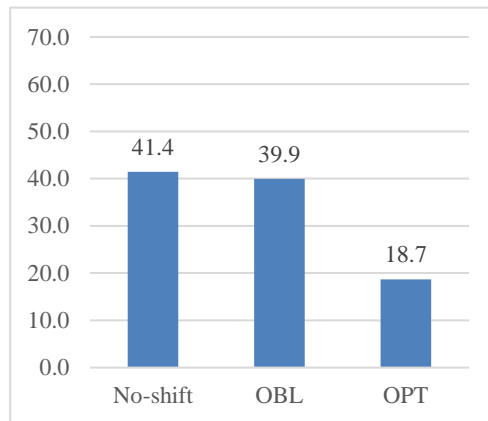




Figure 6. Learners' Split Results



A chi-square test indicates that there is statistically significant difference between the learners and the native speakers regarding the no-shift/shift (obligatory or optional) duality ( $p < 0.05$ ). The speakers shift 81.2% of cases while the learners' shifting ratio is limited to 58.6% (figure 7). The same result is obtained when shifting is split into obligatory and optional ( $p < 0.05$ ) where native speakers shift obligatorily 49.2% of cases and optionally 32% of cases. Learners, on the other hand, shift obligatorily 39.9% of cases and optionally 18.7% of cases (figure 8). This is the combined result of both indexical types (1<sup>st</sup> and 2<sup>nd</sup> person), two main verbs (*think* and *say*), and the students from shifting and non-shifting languages.

Figure 7. Speaker/learner Comparison. No-shift/shift Duality

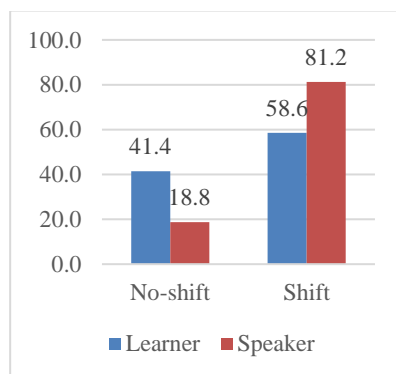
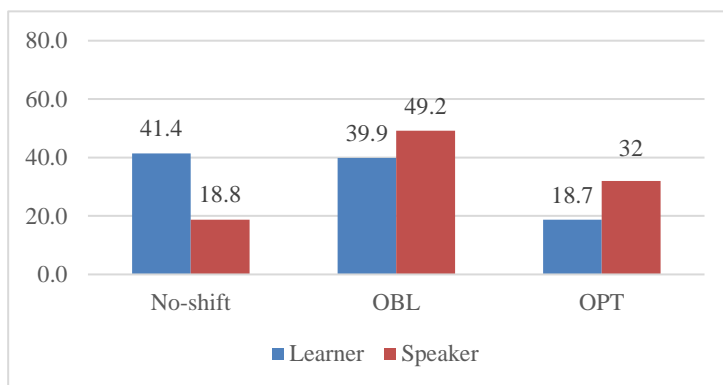


Figure 8. Speaker/learner Comparison. Split results



d. Do learners shift 1<sup>st</sup> and 2<sup>nd</sup> person equally?

The change in the learners' interpretation from 1<sup>st</sup> to 2<sup>nd</sup> person is statistically significant ( $p < 0.05$ ) (see figure 9). Figures 9 and 10 below suggest that person only affects learners and the Chi-Square scores (254,995<sup>a</sup> for 1<sup>st</sup> person and 110,911<sup>a</sup> for 2<sup>nd</sup> person) show that the students fall back further in 1<sup>st</sup> person shift. Given the stability of the speakers' behaviour (see figures 1 and 2), the difference is unexpected, and I have no explanation for this at this point.

Figure 9. Learners' 1<sup>st</sup> and 2<sup>nd</sup> Person Shift under 'say'

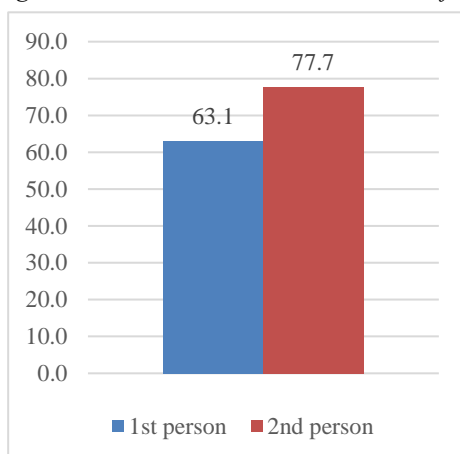
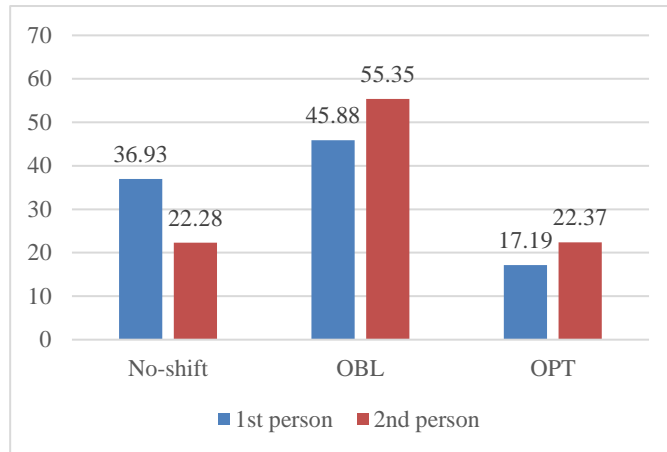


Figure 10. Learners' Split Results for 1<sup>st</sup> and 2<sup>nd</sup> Person under 'say'



To compare, there is statistically significant difference between the learners and the speakers in both indexical types when they are embedded under *say* ( $p < 0.05$  both) (compare figures 1 and 9).<sup>7</sup> Learners shift at a rate of 63.1% with 1<sup>st</sup> person while speakers' shifting ratio is 96.1%. For 2<sup>nd</sup> person, learners shift 77.7% of cases while speakers shift 95.8% of them. We see an increase in learners' tendency to shift with 2<sup>nd</sup> person (from 63.1% to 77.7%), coming closer to the speakers while speakers maintain approximately the same high level of shifting (96.1% for 1<sup>st</sup> person and 95.8% for 2<sup>nd</sup> person). It seems both indexical types shift equally in Turkish but the learners are on a different path.

*e. Does the main verb affect the shifting interpretation of learners?*

A chi-square test indicates that a statistically significant difference is obtained between *say* and *think* ( $p < 0.05$ ). See figures 11 and 12.

<sup>7</sup> 1<sup>st</sup> and 2<sup>nd</sup> person can only be contrasted under *say* since only verbs of reporting require a dative 2<sup>nd</sup> person.

Figure 11. Learners' No-shift/shift Duality under 'say' and 'think'

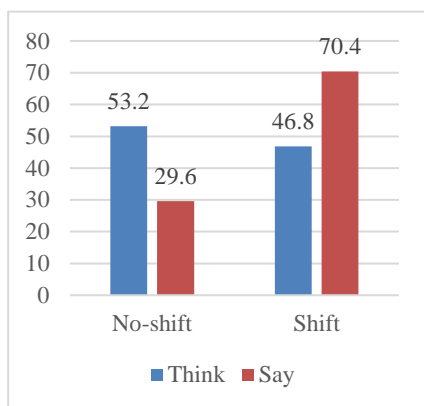
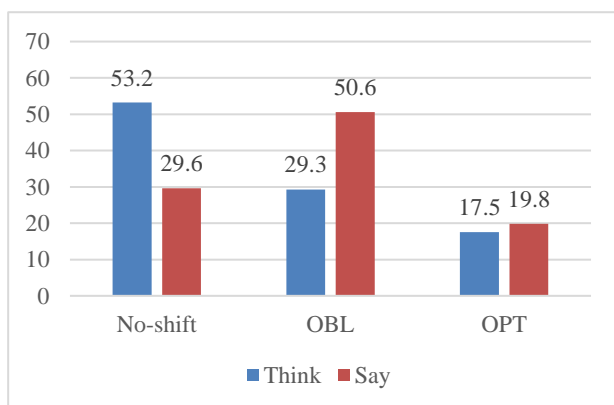


Figure 12. Learners' Split Results under 'say' and 'think'



Note that we saw an increase in shift with *say* in the speaker's data and it was due to the flow from no-shift and optional shift to obligatory shift. But the main contributor was no-shift. We see a similar flow from no-shift to shift in learners in figure 12. This is also, this time obviously, a flow from no-shift to obligatory shift since optional shift remains pretty much the same under *think* (17.5%) and *say* (19.8%) whereas the drop in no-shift is drastic from 53.2% to 29.6%.

A direct comparison of figures 11 and 3 above shows that both speakers and learners have a higher tendency to shift when the indexical is embedded under *say* than when it is embedded under *think*. It rises from 66.5% to 96% with

speakers and from 46.8% to 70.4% with learners. The difference is statistically significant in both cases ( $p < 0.05$ ). Furthermore, this boost in shift with *say* – or migration from no-shift to shift – results in a higher chi-square value with speakers (892,762<sup>a</sup>) than with learners (776,182<sup>a</sup>), which means learners remain shy.

*f. Does L1 affect the learners' performance?*

The data indicate no statistically significant difference between L1 groups ( $p > 0.05$ ). As figures 13 and 14 show, the subjects from shifting and non-shifting languages perform similarly.

Figure 13. The Effect of L1. No-shift/shift Duality

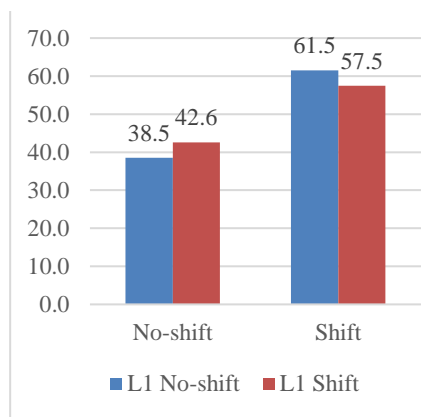
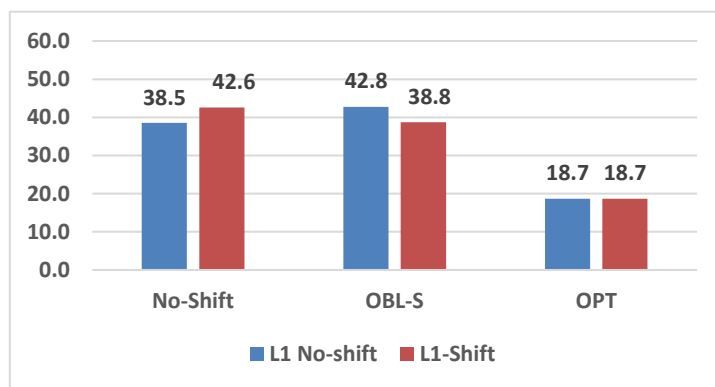


Figure 14. The Effect of L1. Split Results

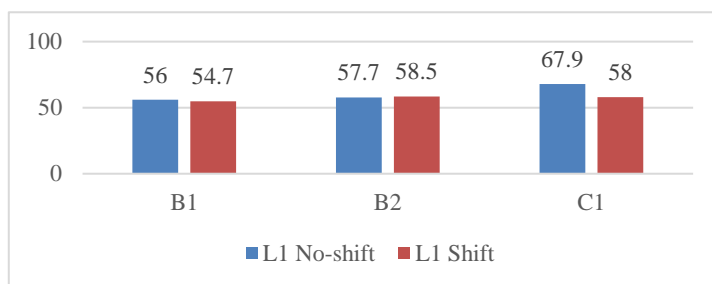


The difference is so small that it looks random. Therefore, I do not perform any further analysis. L1 does not affect the learners' performance. However, this does little to help us answer the research question. Recall that L2 acquisition hypotheses make predictions regarding the initial performance levels as well as how learners' performance change with proficiency. Although their overall performance gives us some insight, it is not directly relevant to the predictions we are testing. For that, we need to scrutinize the results in *g* below.

*g. Does L2 level affect performance?*

I will have to answer this question separately for learners from shifting and non-shifting languages. Learners from shifting languages seem to maintain the same level of shift in all levels, with slight increase from B1 to B2 ( $p > 0.05$ ) (see figure 15).

Figure 15. The Effect of L2 Level



Learners from non-shifting languages, on the other hand, are partially affected by L2 level. C1 learners from non-shifting languages go up to 67.9% while the L1-shifting group remains at 58%. The difference is statistically significant ( $p < 0.05$ ).<sup>8</sup> Looking at figure 15, we see that the insight hinted at in *f*. is confirmed: Learners from both groups start with similar performance levels at B1. If any effect is to be postulated, it is the unexpected effect of the non-shifting languages at C1.

<sup>8</sup> A reviewer notes that figure 15 points to lack of UG involvement in L2 acquisition since L2 level overrides any UG effect. However, both UG-based hypotheses – transfer and IHS – predict sharply elevated performance levels somewhere other than B1. This will be the point where all learners (IHS) or learners from non-shifting languages (transfer hypothesis) reset the parameter.

#### 4 Discussion

The results also require a comparison and conflation of my findings to those of Özyıldız's (2014). Below is the summary of Özyıldız's findings relevant to this study with my adjustments of terminology for the sake of uniformity:<sup>9</sup>

- Indexicals tend not to shift under *think* and *want* (tested with accusative overt, nominative overt and null subjects).
- Comparison of null and overt nominative subjects is inconclusive.
- Accusative marked subjects do not shift.
- *Say* triggers shift more frequently than it triggers no-shift while *think* and *want* trigger no-shift more frequently. In other words, *say* results in shift while *think* and *want* result in no-shift.

As to my findings and comments;

**Indexicals tend not to shift under *think* and *want*:** Although my findings also indicate a decline in shift (only *think* was tested), this is hardly 'a tendency not to shift'. It only drops from 96% to 66.5%. I would say 66.5% is enough to say it is a tendency to shift. Note, however, that this is Özyıldız's overall result with overt nominative, overt accusative and null subjects. He also included *want* as the main verb to arrive at this conclusion. I, on the other hand, only used the null subject-*think* combination. Although Özyıldız finds that overt-null distinction is inconclusive (see below), he also notes that this is not to say that overt subjects do not lean towards no-shift. Furthermore, Gültekin Şener & Şener (2011) argue that overt subjects do not shift.

**Comparison of null and overt nominative subjects is inconclusive:** Although I did not carry out such tests with overt subject, I offer an account for Özyıldız's inconclusive results. It is Gültekin Şener & Şener's (2011) argument that overt subjects do not shift in Turkish. However, I find such sentences grammatical in contrastive contexts. For example;

- (9) Ali            [bu işi            sadece ben        yaparım]        sanıyor.  
 Ali.NOM    this task.ACC    only I            can do            thinks.  
 'Ali thinks only he can achieve this task.'

There is a lot going on in (9) that requires syntactic analysis, such as the topicalization, or defocusing, of object and contrastive focus of subject. As is

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<sup>9</sup> Özyıldız (2014) is more comprehensive than what is summarized below. He also looks into other factors such as shift together, locatives and temporals. I only include here what is and could be relevant to my dataset.

well-known, focus does not permit the subject to drop (Sheehan, 2006, 2015; Göksel & Kerslake, 2005). Focused readings could be falsifying Özyıldız's results. As was discussed in §3.2 Indexical shifting requires and is heavily affected by contextualization. It looks as if there is a conflict of interest between two syntactic phenomena, and focus wins.

**Accusative marked subjects do not shift:** This is also mentioned in Gültekin Şener & Şener (2011) and accounted for by Shklovsky & Sudo (2014). My judgments are parallel to theirs.

**Say triggers shift more frequently than it triggers no-shift while *think* and *want* trigger no-shift more frequently:** I already presented my comments on the second part of this conclusion. The first part, on the other hand, is in accord with my findings. The difference is stark, 96% vs. 4%. What I further show is that shift is overwhelmingly obligatory.

## 5 Conclusion

In this paper, I look into the indexical shift phenomenon in L2 Turkish to contribute to the discussion on second language acquisition hypotheses. I test learners from (indexical) shifting and non-shifting languages to see whether they can acquire the shifting parameter in Turkish. The variables I test are indexical type (1<sup>st</sup> and 2<sup>nd</sup>), main verb (*say* and *think*) and L2 level (B1, B2 and C1). What's more, since indexicality hasn't been fully and reliably described in Turkish, I also extract native speaker judgments from over one hundred speakers. Overall, Turkish is a shifting language with null subjects, and there is no difference in the shifting behaviour of 1<sup>st</sup> and 2<sup>nd</sup> person indexicals. However, shifty interpretation degrades depending on the attitude verb. *Say* presents stronger shifts than *think*. In addition, *say* results in obligatory shift while *think* favours optional shift. This is parallel to Schlenker's (2003) and von Stechow's (2002) observation.

To recap the research question, I started by asking if L2 learners are affected, at the outset of acquisition, by their L1 and hypothesized that any such effect points to transfer or no-UG (S2 in §1) while lack of such an effect points to IHS (S1). The results show that learners are not affected by their L1 (see §3.4.f,g). Furthermore, their performance levels are lower than speakers and the difference is statistically significant (see §3.4.c), which leads us to S1.1 for the first line of predictions in §1. That is, learners directly access the default UG value without L1 interference/transfer, and the default value of the indexical shift parameter is no-shift. As to the second line, S1.1 predicts a sudden increase in the performance levels of all students, who started with significantly lower performance levels. However, this prediction is only partially supported here. Figure 15 in §3.4.g shows that it is only the learners from non-shifting languages that experience a stark increase between B1 and C1. Transfer explains the elevated performance



of L1 no-shift learners, too. Learners would eventually realize that their L1 parameter doesn't match the relevant parameter in Turkish and access UG to reset it. However, taking that route would require explaining 1) why L1 shift learners start with scores similar to L1 no-shift learners 2) why their L1 never presents an advantage for them in B2 and C1.

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**Appendix**

Anketimize katıldığınız için teşekkür ederiz. Bu bir sınav değildir. Amacımız sadece bilgi toplamak. Ankette onar sorudan oluşan dört bölüm bulunmaktadır. Cümleleri düzeltmeden, olduğu gibi cevaplayınız.

Demografik bilgi:

**Yaşınız**

- 15-25
- 26-35
- 35 üzeri

**Cinsiyetiniz**

- Kadın
- Erkek
- Belirtmek istemiyorum

**Eğitim düzeyiniz**

- İlköğretim
- Ortaöğretim
- Üniversite

**Anadiliniz**

- Türkçe
- Kurmançî
- Arapça
- İngilizce
- Almanca
- Fransızca
- İspanyolca
- İtalyanca
- Farsça
- Zazaca
- Azerice
- Türkmence
- Özbekçe
- Uygurca
- Kazakça
- Tatarca
- Diğer (lütfen yazınız):

**Türkçe seviyeniz**

- B1
- B2
- C1

1. "Arkadařım matematikte ok bařarılıyım diyor." Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?
  - a. O yüzden birçok soruyu bana sorar.
  - b. Ama aslında o kadar da iyi deęil.
  - c. İki de olabilir.
2. "Ünal onun arabasını sattı." Sizce bu cümleye göre Ünal kimin arabasını satmıştır?
  - a. Başka birinin arabasını.
  - b. Ünal'ın arabasını.
  - c. İki de olabilir.
3. "Ahmet Ayře'ye ok düşüncelisin dedi." Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?
  - a. Yani Ayře'ye iltifat etti.
  - b. Yani seni övdü.
  - c. İki de olabilir.
4. "Mehmet arabasını yıkadı." Sizce bu cümleye göre Mehmet kimin arabasını yıkamıştır?
  - a. Mehmet'in arabasını.
  - b. Başka birinin arabasını.
  - c. İki de olabilir.
5. "Aynur ok fakirim sanıyor." Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?
  - a. Ona banka hesabımdaki paradan hiç bahsetmedim.
  - b. Ama aslında fakir falan deęil. ok zengin bir ailenin kızı olduęundan haberi yok.
  - c. İki de olabilir.
6. "Murat Ayře'ye onun kardeřine aşık olduęunu söyledi." Sizce bu cümleye göre Murat kimin kardeřine aşıktır?
  - a. Başka birinin kardeřine.
  - b. Ayře'nin kardeřine.
  - c. İki de olabilir.
7. "Ali Ayře'ye ok alışkansın dedi." Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?
  - a. Yani Ayře'nin alışkan olmasını takdir etti.
  - b. Yani seni övdü.
  - c. İki de olabilir.

8. "Özgür doğum gününü unuttu." Sizce bu cümleye göre Özgür kimin doğum gününü unutmuştur?
  - a. Özgür'ün doğum gününü.
  - b. Başka birinin doğum gününü.
  - c. İki de olabilir.
9. "Bilal çok disiplinliyim sanıyor." Sizce bu cümleyi söyleyen kişi sözlerine nasıl devam edebilir?
  - a. Ama işlerimi sekreterim yaptığı için insanlara disiplinli görünüyorum.
  - b. Ama sürekli ödevlerini geciktiriyor.
  - c. İki de olabilir.
10. "Herkes onun evine gitti." Sizce bu cümleye göre herkes kimin evine gitmiş?
  - a. Herkes kendi evine gitmiş.
  - b. Herkes aynı kişinin evine gitmiş.
  - c. İki de olabilir.
11. "Murat çok akıllıym sanıyor." Sizce bu cümleyi söyleyen kişi sözlerine nasıl devam edebilir?
  - a. Ama bence Mehmet Murat'tan daha akıllı.
  - b. Ama ben kendimi çok akıllı bulmuyorum.
  - c. İki de olabilir.
12. "Fatma odasına girdi." Sizce bu cümleye göre Fatma kimin odasına girmiştir?
  - a. Fatma'nın odasına.
  - b. Başkasının odasına.
  - c. İki de olabilir.
13. "Ali çok cesurum dedi." Sizce bu cümleyi söyleyen kişi sözlerine nasıl devam edebilir?
  - a. Ama ben aslında çok korkuyorum. Ali'nin hiç haberi yok.
  - b. Kendini cesur biri olarak görüyor.
  - c. İki de olabilir.
14. "Mehmet onun köpeğini veterinerine götürdü." Sizce bu cümleye göre Mehmet kimin köpeğini veterinerine götürmüştür?
  - a. Başka birinin köpeğini.
  - b. Mehmet'in köpeğini.
  - c. İki de olabilir.
15. "Mustafa çok zenginim sanıyor." Sizce bu cümleyi söyleyen kişi sözlerine nasıl devam edebilir?
  - a. Ama onun sahip olduğu para aslında çok az.
  - b. Fakir biri olduğumu ona söyleyemedim.
  - c. İki de olabilir.

16. "Anıl ile Zeynep kavga etti çünkü Anıl annesine bağırmıřtı." Sizce bu cümleye göre Anıl kimin annesine bağırmıřtır?
- Anıl'ın annesine.
  - Zeynep'in annesine.
  - İkisi de olabilir.
17. "İlber çok řıřmanım dedi." Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?
- Haklı, son zamanlarda çok kilo aldım.
  - Ama abartıyor. Bence o kadar da řıřman bir çocuk deęil.
  - İkisi de olabilir.
18. "Burak bugün okula gelmedi. İlker onun kolunu kırdığını söyledi." Sizce bu cümleye göre kim kimin kolunu kırmıřtır?
- İlker kendi kolunu kırmıřtır.
  - Burak kendi kolunu kırmıřtır.
  - İkisi de olabilir.
19. "Cenk Merve'ye çok güçlüsün dedi." Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?
- Merve de kendini çok güçlü sandı.
  - Yani Cenk senin çok güçlü olduğunu düşünüyor.
  - İkisi de olabilir.
20. "Sedat Aslı'nın ne kadar güzel olduğunu fark etmedi çünkü sadece arkadaşlarının resimlerine bakıyordu" Sizce bu cümleye göre Sedat kimin arkadaşının resimlerine bakmıřtır?
- Sedat'ın arkadaşlarının.
  - Aslı'nın arkadaşlarının.
  - İkisi de olabilir.
21. "Arkadařım matematikte çok başarılıyım sanıyor." Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?
- Ama ben ona yalan söyledim. Aslında çok kötüyüm.
  - Ama aslında sorular çok kolay olduğu için o kendini başarılı sanıyor.
  - İkisi de olabilir.
22. "Ahmet onun arabayı yıkadığını söyledi." Sizce bu cümleye göre arabayı kim yıkamıř?
- Başka birisi.
  - Ahmet.
  - İkisi de olabilir.

23. "Ömer çok akıllıym dedi." Sizce bu cümleyi söyleyen kişi sözlerine nasıl devam edebilir?
- Kendini övdü.
  - Beni övdü.
  - İkisi de olabilir.
24. "Bekir Ufuk'u görmedi çünkü kardeşiyle konuşuyordu" Sizce bu cümleye göre Bekir kimin kardeşiyle konuşmuştur?
- Bekir'in kardeşiyle.
  - Ufuk'un kardeşiyle.
  - İkisi de olabilir.
25. "Mustafa çok cesurum sanıyor." Sizce bu cümleyi söyleyen kişi sözlerine nasıl devam edebilir?
- Benim hakkımda bu fikre nerden kapıldı bilmiyorum.
  - Hiç kavga görmediği için kendini cesur biri sanıyor.
  - İkisi de olabilir.
26. "Hikmet Buse'ye onun valizini toplamasını söyledi." Sizce bu cümleye göre Buse kimin valizini toplayacak?
- Hikmet'in valizini.
  - Buse'nin valizini.
  - İkisi de olabilir.
27. "Özgür çok zenginim dedi." Sizce bu cümleyi söyleyen kişi sözlerine nasıl devam edebilir?
- İnsanların içinde kendini böyle övmesi beni çok rahatsız ediyor.
  - Ama ben zengin biri olarak değil, iyi biri olarak anılmayı tercih ederim.
  - İkisi de olabilir.
28. "Murat akşam yemeğine gelmeyeceğini söyleyince herkes yemeğini yedi." Sizce bu cümleye göre herkes kimin yemeğini yemiştir?
- Herkes kendi yemeğini yemiştir.
  - Herkes Murat'ın yemeğini yemiştir.
  - İkisi de olabilir.
29. "Cem çok şişmanım sanıyor." Sizce bu cümleyi söyleyen kişi sözlerine nasıl devam edebilir?
- İnternette kendimi şişman bir kız olarak tanıttım. Görünce çok şaşırarak.
  - Abartıyor. O kadar da şişman bir adam değil.
  - İkisi de olabilir.

30. "Görkem Yeřim'in tatilini bozdu çünkü onun çadırını evde unutmuřtu." Sizce bu cümleye göre Görkem kimin çadırını evde unutmuřtur?
- Yeřim'in çadırını.
  - Görkem'in çadırını.
  - İkisi de olabilir.
31. "İpek piyanoda çok yetenekliyim sanıyor." Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?
- Ama aslında çok kötü çalıyor.
  - Ama aslında ben çalmıyorum, bilgisayar çalıyor.
  - İkisi de olabilir.
32. "Zeynep Mert'e arabayı hak ettiğini söyledi." Sizce bu cümleye göre arabayı kim hak etmiştir?
- Zeynep.
  - Mert.
  - İkisi de olabilir.
33. "Ömer Derya'ya çok fakirsin dedi." Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?
- Ama ben seni tanıyorum, sen fakir değilsin.
  - Ama ben Derya'yı tanıyorum, Derya fakir değil.
  - İkisi de olabilir.
34. "Cenk Pınar'a onun sınavda başarılı olduğunu söyledi. Sizce bu cümleye göre sınavda kim başarılı olmuřtur?
- Pınar.
  - Cenk.
  - Başka biri.
  - Hepsi olabilir.
35. "Ayře çok çalışkanım sanıyor." Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?
- Ama hasta olduğu için öğretmenler ona hep yüksek not veriyor.
  - Ama ben sınavlarda hep kopya çekiyorum.
  - İkisi de olabilir.
36. "Arif'in başı dertte çünkü Selin geç kaldığını öğrendi" Sizce bu cümleye göre kim geç kalmıştır?
- Arif.
  - Selin.
  - İkisi de olabilir.
37. "Özgür Beyhan'a çok disiplinlisin dedi." Sizce bu cümleyi söyleyen kiři sözlerine nasıl devam edebilir?
- Zaten Özgür hep senden övgüyle bahseder.
  - Beyhan bu iltifata çok sevindi.
  - İkisi de olabilir.



38. "Müge Erkan'ı öğretmene şikâyet etti çünkü onun kalem kutusunu kırmıştı" Sizde bu cümleye göre kimin kalem kutusu kırılmıştır?
- Erkan'ın kalem kutusu.
  - Müge'nin kalem kutusu.
  - İkisi de olabilir.
39. "Gönül çok güçlüyüm sanıyor." Sizce bu cümleyi söyleyen kişi sözlerine nasıl devam edebilir?
- Dün kavanozun kapağını bir seferde açtı. Şimdi kendini çok güçlü sanıyor.
  - Ama o gün kaldırdığım ağırlık sahteydi.
  - İkisi de olabilir.
40. "Tunç Ayşe'ye kızdı çünkü arabasını bozmuştu." Sizce bu cümleye göre Ayşe kimin arabasını bozmuştur?
- Tunç'un arabasını.
  - Ayşe'nin arabasını.
  - İkisi de olabilir.