EXPLORING ESL STUDENTS' PERFORMANCES IN COMPETENCE-BASED LANGUAGE TEACHING CLASSES: A CASE STUDY OF ADULT TURKISH SPEAKERS

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Öz

İkinci Dil (D2) Edinimi çalışmalarındaki yeni eğilimler bilişsel dilbilim alanında gelişmeye devam ederken, dilbilimciler ve öğretmenler dil öğretimi derslerinde yenilikçi uygulamaları keşfetme ve denemeye çalışmaktadırlar. Bunlardan arasında minimalist uygulamalar uygulanabilir öğrenme stratejileri içerisinde dil öğretiminin yeni boyutlarının geliştirilmesinde en faydalı ve ekonomik yaklaşımlar olarak öne çıkmaktadır. Bu çerçevede, on haftalık bir sürede toplam 40 saatlik dil sınıflarındaki anadili Türkçe ola 21 yetişkin öğrenciye minimalist bir dil öğretim yöntemi olarak Edinç Temelli Dil Öğretimi (EDİT-DİL) yöntemi uygulanmıştır. Bu uzun dönemli kontrollü çalışmanın amacı İDİ öğrencilerinin EDİT-DİL derslerindeki performanslarını bir Türk devlet üniversitesi örnekleminde incelemektir. Bu çalışmanın verileri Bitlis Eren Üniversitesi'nde farklı sınıflarda ve farklı bölümlerde okuyan toplam 21 başlangıç (A1) düzeyindeki öğrencilere uygulana bir başarı testi ile toplanmıştır. Bu uygulama 2018 öğretim yılının Ekim-Aralık ayları arasında gerçekleştirildi ve veriler nicel olarak analiz edildi. Araştırmanın genel bulguları özellikle iki sonuç olarak yorumlanmıştır: dilsel sonuçlar ve metodolojik sonuçlar. Dilsel sonuçlar açısından, katılımcıların ED ilkeleri ve değiştirgenler için D2 girdisi yoluyla doğrudan erişime sahip olmadıkları, çünkü D1 bilgilerinin D2 türetimlerine yalnızca ilkelerin ortak özellik gösterdiği yerlerde değil aynı zamanda değiştirgen

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farklılıklarının ve dile özgü özelliklerin olduğu yerlerde de aktardıkları görüldü. Metodolojik sonuçlara bakımından ise, EDİT-DİL ile öğretim verilen katılımcıların % 51 başarı testinde başarılı olurken bu oranın maliyet fayda analizi açısından ümit verici olduğu sonucuna varıldı. Ayrıca bu yöntemle öğretim verilen öğrencilerin evrensel ilkelerin işlediği yapılarda İngilizce dilbilgisine özel hiçbir öğretim verilmemesine rağmen yüksek oranda başarılı oldukları gözlemlendi. Buna ek olarak öğretmenlerin ve öğretmen eğitmenlerinin EDİT-DİL'i daha etkin bir şekilde uygulamalarına sağlamak için araştırma bulgularına dayanarak bazı dikkate değer çıkarımlarda da bulunulmuştur.

Anahtar Kelimeler: *Edinç, İngilizce öğretimi, minimalist yöntem, ikinci dil, edinim.*

İKİNCİ DİL OLARAK İNGİLİZCE (İDİ) ÖĞRENENLERİN EDİNÇ TEMELLİ DİL ÖĞRETİMİ DERSLERİNDEKİ PERFORMANSLARININ DEĞERLENDİRİLMESİ: ANADİLİ TÜRKÇE OLAN ÖĞRENCİLER ÖRNEĞİ

Abstract

The purpose of this study is to explore and evaluate ESL students' performances in COBALT classes where a minimalist approach, model and method is applied. Accordingly, COBALT was applied to 21 Turkish speaking learners in English classes of 40 hours during a ten-week period. The data were collected through a post-test from 21 beginner level students in Bitlis Eren University. The data collected were analysed quantitatively. The overall findings of the research were interpreted particularly in terms of two implications: linguistic and methodological implications. As to the linguistic implications, the participants were found having no direct access to UG principles and parameters through the L2 input since they transferred L1 not only where principles worked but also where parametric variations and grammatical features occurred. As for the methodological implications, it was found out that, as a first-time ever experienced method in a classroom setting, the COBALT was found promising in terms of cost–benefit analysis although the overall success of the participants tutored through COBALT in the post-test instrument was 51%. Moreover, it was also found out that almost all of the L1 transfer cases observed are of nativization tendency proposing that learners make the input conform to their L1 competence.

Keywords: *Competence-Based, Minimalist Method, English, language, teaching, principles, parameters.*

Introduction

Among the new trends in SLA studies, minimalist applications seem to offer the most pragmatic, economic and innovative dimensions of language teaching. Any language teaching method with a single type of syllabus and a course book designed accordingly for all learners of different native language origins in all over the world without referring to parametric variations or language particular properties between any two languages has always sounded too assertive and idealist to be achieved. The assumption that the concepts such as principles, parameters, grammatical learning (GL) and lexical learning (LL) defined under the theory of Universal Grammar (UG), Principles and Parameters Theory (PPT) and the Minimalist Program (MP) for first language (L1) acquisition process can also be viable for second language (L2) learning process is increasingly coming to the fore. However, instead of making use of universal properties suggested to be found in almost all languages and focusing on the parametric variations varying from one language to another, current language teaching practices which give priority to communicative needs seem to have found the solution in avoiding first language grammatical knowledge during a new language learning process. The available contemporary foreign language teaching approaches and methods followed not only in Turkish Educational Institutions but also in the World can be seen ignoring either universal principles or parametric variations and linguistic features between particular languages. In those practices, parameter setting relies on L2 input and the materials used to set parameters are almost the same for every student from different L1 origin. This is particularly problematic when there are several parametric variations between the L1 and the L2 as in the case of Turkish operating head-last phrase building and English operating head-first phrase building. In this context, Competence-Based Language Teaching (COBALT) as a minimalist method of language teaching based on the assumption of parameter setting as suggested by the minimalist model of language learning introduces an original method, syllabus, course book, learning strategies and teaching techniques, all of which rely on minimalist concerns. In a broad sense, COBALT method is based on the assumption that learning any new language (L2) will be simpler and easier for any L1 speaking learner if it is introduced in a way by which they can achieve accessibility to universal grammar through his/her L1 knowledge. In a narrower sense, Turkish Competence-Based English Teaching (TURCOBELT) method is based on the assumption that teaching English will be simpler and easier for Turkish speaking learners if it is introduced in a way by which they can achieve accessibility to UG through Turkish competence.

Relying on UG with its PPT sub-theory and MP, as formulated by Chomsky (1965-1995), COBALT takes language universals and parameter setting into consideration more delicately in language teaching. Accordingly, COBALT classifies the components of languages as "language universals which posit principles of grammar shared by all natural languages as an innate ability of human beings and language particulars, ignoring the former and extracting them from what is known as the grammar of a specific language" (Chomsky, 1965: 6). In terms of the theoretical discussion on the "theory of the initial state of the language faculty, prior to any linguistic experience," COBALT is for the idea that UG is embedded in L1 (Chomsky, 1989:3), as suggested by White (1990) and Schachter (1988) asserting that learners can access to UG only through the L1. In addition, COBALT is established on the basis of the 'Minimalist Model' of language learning explaining the cognitive state of L2 learning reducing L2 learning to its fundamental elements and achieving simplicity in cognitive representation, abolishing unnecessary elements in order to explain L2 learning simpler and more pragmatic in terms of GL and LL. Described as a trend in any design or style in which the simplest and fewest elements are used to create the maximum effect in general sense, minimalism appears in linguistics as the economy of derivation and representation, abolishing superfluous elements in order to represent languages more universally but simpler, which is known as the Minimalist Program (Chomsky, 1995, 2015a, and 2015b). Although MP is largely regarded as a mode of investigation for the syntactical analysis of clausal structures in linguistic studies, as for COBALT, it is not only a way of syntactic analyses for the identification of parametric variations between L1 and L2 for a competence based syllabus but also an approach to modelling of L2 cognitive learning and identifying the principles, learning strategies and teaching techniques of the method.

Consequently, COBALT based on the assumption that learning English grammar will be simpler and easier for Turkish speaking learners if it is introduced in a way by which they can achieve accessibility to UG is a noteworthy language teaching method not only because it outlines the principles of competence based teaching practice through cognitive fulcrum but also because it approaches to classroom activities, syllabus and course book design through minimalist concerns. Within this perspective, this study aims to carry out this method in long term classroom experiences as a longitudinal case study primarily in order to find out its efficacy and fertility. The final purpose of this controlled longitudinal study is to explore ESL students' performances in the contexts where universal principles or language particular properties work. With this purpose, in

this study, after the introduction of COBALT, its contribution to the field, and the aim of the study in this part, the theoretical background including a brief review of the underlying linguistic theories on which the approach, method, learning principles, teaching activities, syllabus and the course book design of the method are based are revised. After the theoretical background follows the characteristics and principles of COBALT or its reduced version TURCOBELT with the original learning strategies and teaching techniques as well as an original syllabus and a course book design. The following parts making up the body of the study in which the research design, method and the findings are outlined are the sections where the efficacy and fertility discussions and the conclusions are shared.

1. Theoretical Background

COBALT is the result of a five-year study beginning from Şeker (2015) focusing on identifying the parametric variations between Turkish and English Languages through Minimalist Program, Şeker (2016) designing a competence based syllabus for L1 Turkish learners of L2 English, and the ideas and studies based on the data obtained from a 3001 Research and Development project titled 'Developing a Grammatical Competence-Based Foreign Language Teaching Model and a Turkish Competence-Based English Course Book Prototype (2017-2019)', suggesting accessibility to UG during parameter setting process and supported by Scientific and Technological Research Council of Turkey (TUBITAK). The theoretical fulcrum of COBALT method is based on Principles and Parameters Theory (Chomsky, 1981) under the scope of the theory of Universal Grammar. The idea of associating parametric variations and second language learning is particularly discussed by White (1990) and Cook and Newson (1996). After these ideas are reviewed in terms of L2 acquisition, learning and teaching perspectives, they are revised through minimalist approach suggesting a competence based L2 learning model (COBALL) and a teaching method (COBALT as a broader sense and TURCOBELT as a narrower one).

Regarding L1 as the only way to access the UG relying on the assumption that "learners can access to UG only through the L1" and "particular grammar of any human language is limited to language particular variations", the COBALT method is established on the basis of the 'Minimalist Model' of language learning (White, 1990; Schachter,1988). This model of language learning explains the cognitive state of L2 learning via reducing L2 learning to its fundamental elements and achieving simplicity in cognitive representation, abolishing unnecessary elements in order to explain L2 learning simpler and more pragmatic in terms of GL and LL, either of which occurs as the act of achieving the

knowledge of L2 parametric values. In the model, GL is regarded as the quality of the act of achieving knowledge of language (Şeker, 2015). LL according to this model, on the other hand, requires "no need for learners to learn anything about the grammar but the lexical items (i.e. lexicon) in the language and their properties" (Radford, 2004;16). The term competence, moreover, is described as an innate knowledge of grammar as stated by Chomsky (1965) who maintains that ''every speaker of a language has an internalized generative grammar that expresses his knowledge of his language" (p.9-15). As shared by COBALL, "there is a system of principles, conditions and rules that are elements or properties of all human languages, which means that a native speaker of any language knows a set of principles that work in all languages and parameters that vary from one language to another" (Chomsky,1976: 29). This is also summarized as in the case of Chomsky's (1981) statement that "what we know innately are the core grammar principles and the parameters associated with them but what we have to learn are the values of the parameters," to which COBALL refers as the extent of LL and GL available not only for children's L1 but also for adult's L2 (p.118).

In terms of the approach, COBALT follows a minimalist view which is described as a trend in any design or style in which the simplest and fewest elements are used to create the maximum effect. It exclusively runs after necessity and simplicity, getting rid of unnecessary ones. In order to determine what is necessary and what is not, minimalism rests on three basic criteria: simplicity, conceptual necessity and reduction. COBALT can be regarded as a minimalist method particularly because it is in favour of simplicity for the syllabus design. The contents of the syllabus are identified on basis of GL targeting only a limited number of parametric variations and grammatical features also determined through the Minimalist Program of Chomsky (1995, 2015a, and 2015b). In addition, it is in favour of conceptual necessity for the grammar modules. The grammar modules are classified according to their function and usage rather than traditional grammar modules. Furthermore, it is in favour of reduction in terms of its principles, learning strategies, and teaching activities. The course book design is also established on these minimalist principles, getting rid of superfluous descriptions, exercises and visual materials. The student's real experiences and individual interests as well as L1 make up the core material and theme of the COBALT classes.

As for the content of the GL, parametric variations between L1 and L2 and the language particular grammatical features are essential to be identified. Therefore, the reason why it is called COBALT in a broader sense and

TURCOBELT in a narrower sense lies on the identification and parameterization of the parametric variations between Turkish as default L1 and English as default L2. The parametric variations and the differences in grammatical features in the method and consequently in this study are obtained through the studies by Şeker (2015; 2016) and their revised versions in which corresponding English and Turkish grammatical structures are comprehensively compared and contrasted according to the MP are referred. These reference parametric values and language particular grammatical features are identified as the following (Şeker, 2015, 2016):

1.1. *Parametric Variations Between L1 Turkish and L2 English*

1. Head Parameter

i. English is a 'head-first' language

ii. Turkish is a 'head-last' language

2. Null-Subject Pro Parameter

i. In English, Null- Subject (Pro) is not allowed

ii. In Turkish, Null- Subject (Pro) is allowed

3. Null-Subject PRO Parameter

i. In English, pronominal possessors (PRO) are not allowed to be dropped

ii. In Turkish, pronominal possessors (PRO) are allowed to be dropped

4. Null-Determiner Parameter

i. In English, Null-Determiner (Det) is not allowed

ii. In Turkish, Null-Determiner (Det) is allowed

1.2. *Language Particular Grammatical Features for L1 Turkish and L2 English*

1. Grammatical Feature of Prepositions/Postpositions (P)

"While prepositions in English have interpretable [ACC-Case] feature, postpositions in Turkish have interpretable [GEN-Case] feature"

2. Grammatical Feature of Passive (PASS)

"While affixal PASS is verbal (i.e. [+V]) in Turkish, inflectional PASS is nominal (i.e. [+N]) in English"

3. Grammatical Feature of Complementiser (C)

"While C carries a que particle [i.e. mI] feature in Turkish, C carries a wh-operator [WH] feature in English"

4. Grammatical Feature of Complementiser (C)

"While the C in English main clauses carries Extended Projection Principle [EPP] feature, it does not carry [EPP] in Turkish."

5. Grammatical Feature of Infinite Complementiser (Fin)

"While the infinite C in Turkish complement clauses carries Extended Projection Principle [EPP] feature, it does not carry [EPP] in English."

6. Grammatical Feature of Agreement

"While the Turkish T carries strong agreement features, the English T carries weak agreement features"

These four parametric variations and six grammatical features between L1 Turkish and L2 English constitute the target parametric values and new grammatical knowledge set for English Grammar for an L1 Turkish speaking L2 English learner. The rest of the English grammar for an L1 Turkish learner requires only LL. In other words, the linguistic differences described above constitute the core English grammar syllabus for the Minimalist Method of Turkish Competence-Based English Language Teaching (TURCOBELT).

2. Theoretical Background

COBALT is an overall method of teaching suggesting an original syllabus, a course book prototype, learning strategies and teaching techniques all designed according to minimalist principles. It is particularly based on two learning strategies: grammatical and LL. The former is a regarded as a kind of parameter setting targeting the new parametric values of L2 and the latter is regarded as lexicon development particularly targeting the learning of L2 counterparts of the L1 lexicon referring to the same realia. The method targets adult or young adult learners and the learner is not expected to set parameters from the input data by himself. Instead, he is assisted to guess the new value and set it for new language. Here, available L1 knowledge is the best realia or the course material to refer in COBALT classes since they are already there, in learners' mind. The teacher only needs to activate or allow students to recall it.. Therefore, language is believed to

be learned by the learner but not taught by the teacher. The teacher acts as a training coach organizing the input and reinforcement exercises leading to true parameter setting. The coach or the learner is not idealist but pragmatist in terms of pronunciation or fluency, depending on the minimalist concerns such as simplicity and reduction. Native accent is tolerated and learners' L1 origin (i.e. genetic heritage) is taken into consideration since they are not born as native speakers. Error correction is a natural way of parameter setting after learners achieve the new parameter settings. As for classroom activities, communication in target language is not always possible in non-native countries except for the language classes. Therefore, in COBALT classes, rather than pair work or group work activities, individual oral or written performance in L2 is given priority. From this view, it follows a liberal and pragmatic path. In terms of LL, bilingual or monolingual vocabulary lists are seen useless. The best way to improve lexicon is frequent exposure and looking up them for each time. Therefore, the language coach (i.e. the teacher) or the learners are expected not to take down the L1 counterparts of the target new vocabulary.

2.1. Syllabus

In COBALT classes, the grammatical contents are introduced in terms of appropriateness and successiveness determined according to a limited number of parametric variations set for the target and the native or second language. Therefore, rather than thematic units made up of communicative concerns a natural order of structural units is suggested in syllabus design. That is, traditional grammar modules are sequenced in terms of phrasal modules in a bottom-up merging order, delaying marked structures until all unmarked structures are presented.

2.2. Course book

As an original method, COBALT, of course, also requires an original course book designed through minimalist principles in which the grammatical contents are introduced in terms of appropriateness and successiveness determined according to a limited number of parametric variations set for L1 Turkish and L2 English languages. For this purpose, a competence-based English course book prototype titled "Setting English for Turkish Speaking Learners" was designed under the scope of the project titled 'Developing a Grammatical Competence-Based Foreign Language Teaching Model and a Turkish Competence-Based English Course Book Prototype (2017-2019).' This course book prototype, supported by Scientific and Technological Research Council of Turkey (TUBITAK), is presented as a model course book designed on basis of

minimalist concerns and focuses on parameter setting between L1 Turkish and L2 English for COBALT.

2.3. Learning Strategies and Teaching Techniques

COBALT suggests some special activities for the setting of the parameters of the new language introduced based on the learning strategies listed below:

2.3.1. Linguistic Awareness

Languages are not regarded as in isolation but as a part of the whole language system that is possessed. Therefore, learners should be aware of the properties of the new language under study.

Related Teaching Technique: Categorization

Asking learners to categorize the new English lexical items according to the Turkish reference words.

2.3.2. Code-Mixing (Matrix Model)

According to this strategy, the learner generates a matrix language, choosing the overall syntax and the morphemes from one linguistic system, while choosing the vocabulary from another.

Related Teaching Technique 1: Nativization (L1 Transfer) (L2 lexicon but L1 grammar)

Asking learners to try to put the given target lexical items into meaningful phrases relying on L1 knowledge but without providing them with any knowledge of the new grammar, correcting errors or giving feedback.

Related Teaching Technique 2: Pidginization (or Denativization) (L1 lexicon but L2 grammar)

Asking students to use some native words as to the new grammar settings in target language.

2.3.3. Parameter Setting

Based on the target L2 input, learners are allowed to set target parameters themselves through cognitive ways such as comparing and contrasting.

Related Teaching Technique 1: Analyzing the Input

Asking learners to read the given sample phrase structures in the target language and then to check and compare them with the ones they uttered through their L1 knowledge in the previous exercise.

Related Teaching Technique 2: Setting the New Grammar

Asking learners to observe the differences and similarities between L1 and L2 through comparing and contrasting and set the new grammar by themselves or through guiding by the teacher.

2.3.4. Code-Switching

Code-switching is switching instantaneously from one linguistic system to another during same context.

Related Teaching Technique: Purposive Speaking

Asking learners to produce phrases (noun, determiner or prepositional phrases in L2 as much as possible and fill the other communicative gaps, if any, through the L1.

3. Theoretical Background

This controlled longitudinal study mainly focused on the productivity and efficiency of the grammatical competence levels of 21 L1 Turkish learners of L2 English after the pilot study of COBALT in the English classroom under the scope of a project was applied in a 40-hour language course during a ten-week period. On basis of two basic dimensions in an empirical research (i.e. experimental and screening type), the experimental model is expected to be appropriate for the research area where the data is observed to explore the cause-effect relationships between the variables (Büyüköztürk, 2007; Karasar, 2005; Yılmaz, 2013). Accordingly, the study which is set on "a comparison of different dependent variables" makes an experimental model necessary (Karasar, 2005; p.88). The experiment carried out in this research is based on the "independent variables affecting the dependent variables, systematic changes in controlled conditions and monitoring the results" (Karasar, 2005; p.88). The dependent variables were observed and measured, which is one of the most prominent properties of this model (Hovardaoğlu, 2006). As for the classifications of the experimental design, the model of this study is pre-experimental since it was applied to a single group randomly selected by means of *neutral assignment* and a post-test is required at the end of the course scheduled (Seliger & Shohamy, 1989).

3.1. *Research Questions*

In order to investigate the ESL students' performances in Competence-Based Language Teaching Classes, this study examined particularly two implications including linguistic implications and methodological implications. Accordingly, the following research questions were posed:

1. Can L2 students achieve indirect access to UG principles and parameters through L1?

2. How successful are the L1 Turkish L2 English learners able to perform new parameter settings?

3. How productive and useful is the COBALT Method on basis of the achievement test results?

3.2. *Setting and Participants*

COBALT as a minimalist method of language teaching was applied to 21 Turkish speaking adult students in language teaching classes of total 40 hours during a ten-week period.

During this period, as suggested by COBALT, learners were not exposed to any L2 grammatical knowledge on structures requiring universal principles which are assumed to work for all natural languages but for the parametric variations and language particular grammatical features. The population in the pilot study consists of L1 Turkish speaking L2 English learners. The target sampling in this study was determined through "voluntary designation" among the undergraduate students of Bitlis Eren University from which a sample pilot study group of 25 students was determined as to their order of application (Birkök, 2018). In this context, following the necessary permissions from the institution, the schedule was determined and a 10-day announcement and application process was initiated in order to determine the number of trainees in the project. At the end of the 10-day application period, 45 applicants, primarily from the first and second-year students, were ranked among those who have no any noteworthy English background and 25 candidates were selected for master list according to their order of application and the students who were eligible for the course were announced on the official website of the university. The remaining 20 candidates were recorded into the reserve list according to the same criteria, and according to regular attendances, the learners who did not attend two consecutive courses were removed from the reserve list and replaced by those from the reserve list during the first month of the study. Despite all these measures, the number of students who came to the course regularly (without missing the lesson) was around 16-17. However, the number of students enrolled in the course and not exceeding two consecutive nonattendances was still 25 as planned. However, the number of students who took the achievement test reduced to 21 due to the unexpected external factors. 12 of the participants were females while 9 of them were males (F=57%, M=43%). Consequently, since 25 L2 English learners in this

sampling were subjected to COBALT English classes in a single class, they constitute a sampling of the single group post-test model which forms the design of this study. In this way, the number of students is determined to be as close as to the average class size of Turkish education system in order to make the data obtained more consistent. A control group was not required since the same independent variables were applied on the sampling having similar initial levels which were new starters (Seliger & Shohamy, 1989: 149).

3.3. *Data Collection Procedures*

In this study, a quantitative research design was preferred, which involves counting and measuring of events and performing the statistical analysis of a body of numerical data. This sort of data collection strategy is expected to be more efficient to test the hypotheses of COBALT method since it involves dependent or independent variables and identifies a kind of dependency on a variable or variables. The independent variables in this study were set and labelled on basis of GL, LL, parameters and the grammatical features. The dependent variables, on the other hand, were set upon the students' success as well as L1 transfer cases. In order to increase the reliability and validity of the data, "the control variables such as the ages and sexes of the participants, other languages of the participants, levels of intelligence that are likely to affect the measurement results" were under control (Birkök, 2018). In this context, their neutral grouping, education levels (i.e. first and second grade students in Bitilis Eren University where all the participants settled with an average entrance examination score) and similar linguistic background (i.e. almost all of them were bilinguals of Turkish and the regional language of Kurdish) almost equalize the control variables for the participants. In terms of external validity, the pilot study was carried out as an English course in a usual classroom environment in which the participants voluntarily joined rather than the artificially created experimental groups, which was, in turn, "expected to affect the performance of the participants and minimize the Hawthorne effect" (Birkök, 2018; p. 131).

3.4. *Insturmentation*

In this study, in order to elicit data related to the students' acquisition of L2 English, their performance levels of the language and the success of the COBALT practices on the students, an achievement test was used as a data collection tool. The main purpose of the achievement test is to provide the researcher with necessary data about the L1 speaking participants' level of acquisition and performance as well as their competence level of parameter setting in L2 English. The test covers the range of language proficiency from A1

to B1 level. The test includes six types of questions, the first type (A), the third type (C) and the fifth type (E) of which aim to measure the performance levels of building determiner, and prepositional phrase structures as well as lower noun phrase structures in L2 English. The next part (B) aims to measure the parameter setting ability through code-mixing strategy where L1 lexicon but L2 grammar are used. The fourth part, or Part D, targets to evaluate the participants' levels of self-correction for the errors in various phrase structures. Part F, on the other hand, measures the reading skills of the participants and their linguistic awareness and level of vocabulary knowledge. As for the questions, measurement techniques such as open-ended, completion, multiple choice and table filling questions were preferred. The achievement test covers universal linguistic properties, or principles, where L1 Turkish and L2 English operate the same or similar building structures, Head*, Null-Subject PRO, Null-Determiner* parameter setting and the grammatical features of *P* describing the case of the prepositional or postpositional complements and *PASS* describing the nominal or verbal feature of the functional passive category in both languages. The other parametric variations and grammatical features were not included in the test due to the scope of the scheduled syllabus in the pilot study. In addition to these parameters and grammatical features defined in the study, plural/singular number features of some nouns in lower noun phrases were also regarded as a feature requiring GL and shown as *PL-number*.

3.5. *Data Analysis*

İçerik yazısı The analysis of the data collected via the instrument was interpreted in solid units such as numbers in order to be scientifically valid. The purpose of the data analysis is to bring meaning, structure, and order to the data. Interpretation requires acute awareness of the data, concentration, and openness to subtle undercurrents of social life. Accordingly, the data obtained from the instrument were analysed by using quantitative research method involving the systematic collection, organization, and interpretation of numeric material derived from the test used as data source in the study. The pilot study was conducted from October to December of the 2018 academic year, and the data were analysed quantitatively. The analysis was performed in several stages. Initially the achievement test collected from the students were evaluated part by part according to the total correct answers over the total participants (i.e. 21). The data obtained from the achievement test are categorized and recorded, as illustrated in Table 1.

Table 1. Frequencies of Correct Answers and L1 Transfers per Questions

Que No	Learning	Parameter Settings	Grammatical Features	L1 Transfers (f)	Correct Answers (f)
1	Lexical	-	-	-	0,76
2	Grammatical	Head	-	0,23	0,61
3	Grammatical	Head	Acc-Case	0,28	0,61
4	Grammatical	Head	Pass	-	0,33
5	Lexical	-	-	-	0,85
6	Lexical	-	-	-	0,47
7	Grammatical	Head	-	-	0,23
8	Grammatical	Head	-	0,14	0,61
9	Grammatical	Head	-	0,14	0,61
10	Lexical	-	-	0,33	0,47
11	Grammatical	Null-PRO	-	0,33	0,33
12	Grammatical	-	Pl-Number	0,61	0,14
13	Lexical	-	-	0,19	0,66
14	Grammatical	Head	Acc-Case	0,42	0,14
15	Grammatical	Head	-	0,19	0,61
16	Grammatical	Head	-	0,61	0,33
17	Grammatical	Head	-	0,38	0,38
18	Grammatical	Head/Null-Det	-	0,28	0,42
19	Grammatical	Head	-	0,38	0,33
20	Lexical	-	-	-	0,33
21	Lexical	-	-	-	0,66
22	Grammatical	Null-Det	-	-	0,66
23	Grammatical	-	Pl-Number	0,19	0,38
24	Lexical	-	-	-	0,38
25	Lexical	-	-	-	0,57
26	Grammatical	-	P	-	0,61
27	Grammatical	-	P	-	0,76
28	Grammatical	-	P	-	0,28
29	Lexical	-	-	-	0,95
30	Lexical	-	-	-	0,57
31	Lexical	-	-	-	0,80
32	Grammatical		Pl-Number	-	0,52
33	Lexical	-	-	-	0,57
34	Lexical	-	-	-	0,33
35	Grammatical		Acc-Case	0,09	0,23
36	Grammatical		P	0,33	0,04
37	Lexical	-	-	0,04	0,04
38	Lexical	-	-	-	0,71
39	Lexical		-	0,09	0,66
40	Grammatical	Null-Det	-	-	0,38
41	Lexical	-	-	-	0,38
42	Grammatical	-	P	-	0,38
43	Lexical	-	-	-	0,38
44	Grammatical	-	P	-	0,33
45	Lexical	-	-	-	0,66
46	Lexical	-	-	-	0,52
47	Lexical	-	-	-	0,71
48	Lexical	-	-	-	0,47
49	Lexical	-	-	-	0,66
50	Grammatical	Head	-	-	0,42
51	Grammatical	Head	PASS	-	0,66
52	Grammatical	Head	PASS	-	0,57
53	Grammatical	Head	-	-	0,52
54	Grammatical	Head	-	-	0,38
55	Lexical	-	-	-	0,38
56	Lexical	-	-	-	0,28
57	Lexical	-	-	-	1,00
58	Lexical	-	-	-	0,52
59	Lexical	-	-	-	0,85
60	Lexical	-	-	-	0,49

Accordingly, the test includes total 60 questions, half of which require parameter setting (i.e. GL), while the other half of which only require operating principles with no parametric variations. In Part A and Part B, there are 20 synthesis level of questions (10 in each part), 14 of which require GL of Head, Null-Det or Null-PRO parameter settings as well as language particular grammatical features such as nominal passive category feature or case and number assignment, while six of them require no any GL but LL. In Part B, students were also allowed to use L1 lexicon to reproduce the phrases on basis of L2 grammar. In Part C, there are 10 analysis level of questions, half of which require no any GL but LL, while the other half of the questions require GL of Null-Det parameter setting or language particular grammatical features such as number or case assignment. In Part D, there are 10 analysis level of questions, six of which require no any GL but LL, while four of the questions require GL of language particular grammatical features such as number or case assignment, requiring no any parameter setting. Furthermore, in Part E, there are 15 analysis level of questions, eight of which require no any GL but LL, while seven of the questions require GL of Head and Null-Det parameter settings and language particular features such as nominal passive category feature or case assignment. Part F focusing on reading comprehension and vocabulary, on the other hand, includes five analysis level of questions, requiring only LL. The GL scope covers Head, Null-Subject PRO, and Null-Determiner parameter setting and the grammatical features of P, PASS and PL-number in L2 English. L1 transfers, on the other hand, show how many L1 Turkish learners of L2 English refer to their L1 knowledge in each question. Consequently, while GL, LL, parameters and the grammatical features constitute the independent variables, the students' success as well as L1 transfer cases constitute the dependent variables in the study as shown in Table 1 below:

The statistical data calculated in frequencies were scored by the researcher and the outcomes were analysed by means of SPSS (Statistical Package for Social Sciences) software program. Through descriptive statistics analysis, the standard deviation, mean, frequency and P value of the items were analysed on basis of the participants' success rate and L1 transfers per each question in the test and their distribution over GL and LL variables. L1 transfers and frequencies of success rate per each question were used to make inferences about their relationship with the independent variables. The results were illustrated in tables, bars and pie charts. Finally, the frequencies and the percentages were interpreted in terms of the afore mentioned independent variables. In addition, some parts of the data obtained from the open-ended questions were also analysed via content analysis

technique in order to determine and interpret the presence of L1 transfer cases. Content analysis allows inferences to be made, which can then be corroborated by using other methods of data collection. Thus, we quantified and analysed these transfers and made inferences about the relationship between such transfers and the independent variables. Finally, through "predictive analysis", the data obtained from the achievement test was interpreted to determine whether there is a meaningful difference between the initial new starter and the final success status of the learners tutored by COBALT (Birkök, 2018).

4. Findings and Discussions

From the data analysed, it can be observed that 10 questions have the highest success rates (over 0,7), nine of which require only LL. On the other hand, it is clear that of the seven questions having the lowest success rates (below 0,3) are five questions which require GL. Furthermore, the most frequent L1 transfer cases (over 0,4) is observed in questions requiring parameter setting or grammatical feature knowledge (see Que no 13,15,17). The findings were organized and discussed according to the research questions.

4.1. *Indirect access to UG principles and parameters through the L1 input*

In order to find out whether the participants can access to UG principles and parameters through the L1, language transfer frequencies in questions requiring LL and GL was compared and contrasted.

Table 2a. L1 Transfer in LL and GL.

Paired Samples Statistics

LEARNING			Mean	N	Std. Deviation	Std. Error Mean
Lexical	Pair 1	Learning	1,00	4	,000	,000
		L1 Transfer	,1625	4	,12790	,06395
Grammatical	Pair 1	Learning	2,00	15	,000	,000
		L1 Transfer	,3067	15	,15715	,04058

When analysed, Tables 1a and 1b show that L1 Transfer occurs in GL (M=0,30) more than in LL (M=0,16). While only four L1 transfers occur in LL, the number of the transfers is 15 in grammatical items. That is, there is a

significant relationship between L1 transfer and those items requiring GL or LL (P<0,05), as shown in Figure 1 below:

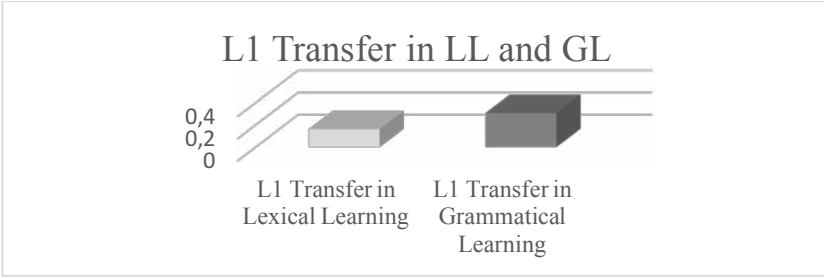
Table 2b. L1 Transfer in LL and GL.

Paired Samples Test

			Paired Differences							
						95% Confidence Interval of the Difference				
LEARNING			Mean	Std. Deviation	Std. Error Mean	Lower	Upper	t	df	
LL	Pair 1	Learning – L1 Transfer	,83750	,12790	,06395	,63398	1,04102	13,096	3	,001
GL	Pair 1	Learning – L1 Transfer	1,69333	,15715	,04058	1,60631	1,78036	41,733	14	,000

- **P<0,05**

Figure 1. L1 Transfer in LL and GL



The rate of L1 transfer is relatively higher between the questions numbered 1-20, where parameter settings and language particular grammatical features are relatively dominant, as illustrated below:

Table 3. L1 Transfer Rate between 1-20 questions and 21-60 questions.

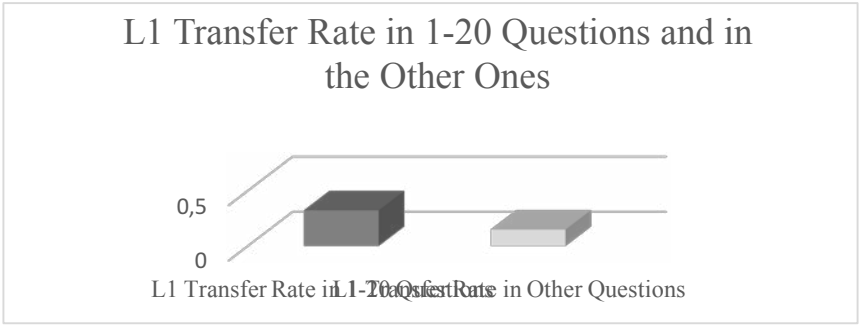
Descriptive Statistics

L1 TRANSFER		N	Minimum	Maximum	Mean	Std. Deviation
1-20 QUESTIONS	L1 Transfer	14	,14	,61	,3221	,15075
	Valid N (listwise)	14				
21-60 QUESTIONS	L1 Transfer	5	,04	,33	,1480	,11541
	Valid N (listwise)	5				

- **P<0,05**

When Table 3 is analysed, moreover, it can be seen that L1 transfer occurs more in questions between 1-20 (M=0,32, SD=0,15) than in those between 21-60 (M=0,14, SD 0,11), which demonstrates a significant relationship between L1 transfer and parameter setting (P<0,05). While L1 transfer occurs fifteen times in questions between 1-20, this figure is reduced to five in questions between 21-60. This is illustrated in Fig. 2 below:

Figure 2. L1 Transfer Rate in 1-20 Questions



The findings obtained from the data analysis above also provide the researcher with some evidence for the nativization-denativization model of Andersen (1979) questioning whether learners adjust their interlanguage systems to make them fit with the input or L1 competence. In this context, almost all of the L1 transfer cases analysed in this research are of nativization, rather than denativization, tendency which proposes that learners make the input conform to their L1 competence.

4.2. Performances in L2 Parameter Settings

In order to find out how successful the participants can set principles and parameters during L2 learning, the success rates in questions requiring LL and GL was compared and contrasted, as shown in Table 4:

Table 4. Success Rate according to LL and GL.

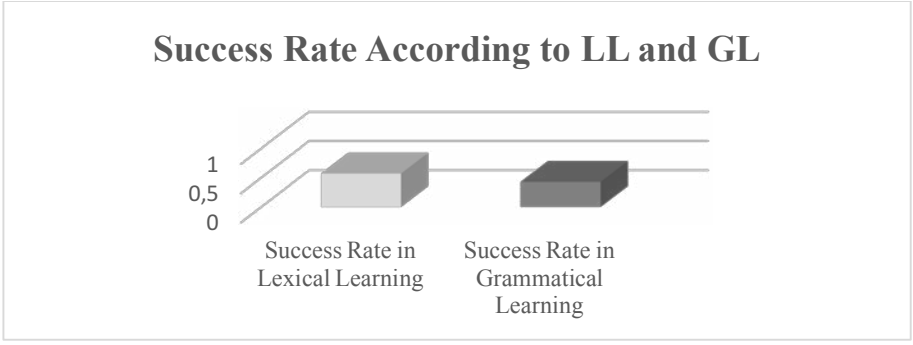
Descriptive Statistics

LEARNING		N	Minimum	Maximum	Mean	Std. Deviation
Lexical	Correct Answers	30	,04	1,00	,5693	,22363
	Valid N (listwise)	30				
Grammatical	Correct Answers	30	,04	,76	,4267	,17908
	Valid N (listwise)	30				

- **P<0,05**

Accordingly, Table 4 illustrates that there is a significant relationship between success rate and lexical or GLs (P<0,05). Accordingly, success rate in questions requiring LL (M=0,56, SD=0,22) is higher than those requiring GL (M=0,42, SD=0,17). In the test, all of the questions (60) and answers (60) are valid. While maximum success rate is 1,00 in LL, it is 0,76 in GL questions, which is also shown in Figure 3, below:

Figure 3. Success Rate in LL and GL



As a consequence, these overall findings show that L1 transfer as a form of nativization is always active and appears on the surface where there are parametric variations or differences in grammatical features between L1 and L2. The overall success rate and relatively lower L1 transfer frequencies in LL cases

in which learners were not provided with any prior L2 grammatical knowledge also demonstrate that learners access to UG principles through their L1.

4.3. Productivity and Usefulness of the COBALT Method

Finally, in order to find out how productive and useful the COBALT method is, the overall success rate for all participants was illustrated in Table 5 below:

Table 5. General Success Rate

Descriptive Statistics

	N	Minimum	Maximum	Mean	Std. Deviation
Correct Answers	60	,04	1,00	,5062	,21618
Valid N (listwise)	60				

• P<0,05

According to Table 5, the general success rate of the test is found neither successful nor unsuccessful (M=50, SD=21).

However, in terms of cost–benefit analysis, considering the time spent (i.e. 4 hours a week, total 10 weeks), the level of the test (from A1 to B1 modules) and the negative effect of lexical deficiency of the participants on the success rate in the questions requiring grammatical knowledge, COBALT is promising since it is a new methodological application with a new course book prototype which has never been experienced in a classroom context before. Furthermore, in order to interpret the lexical deficiency of the participants, questions between 55-60 which test reading comprehension and vocabulary level of the participants were also analysed. The results are shown in Table 6 below:

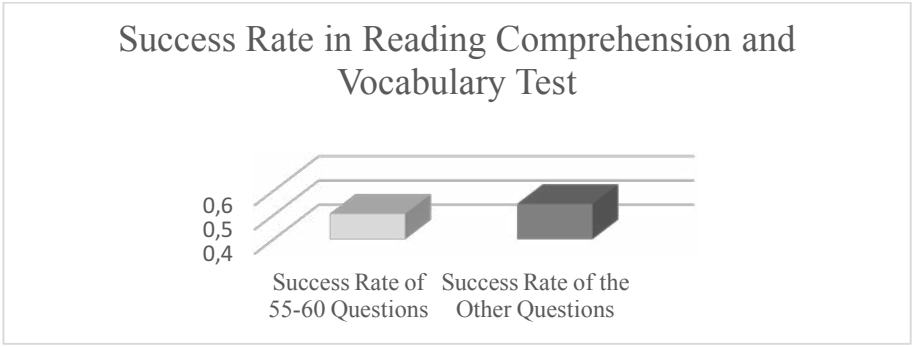
Table 6. Success Rate in Reading Comprehension and Vocabulary Test

Descriptive Statistics

READING AND VOCABULARY		N	Minimum	Maximum	Mean	Std. Deviation
1	1-54 QUESTIONS	54	1,00	1,00	1	,00000
	Correct Answers	54	,04	1,00	,5035	,21097
	Valid N (listwise)	54				
2	55-60 QUESTIONS	6	2,00	2,00	2	,00000
	Correct Answers	6	,28	1,00	,5450	,31890
	Valid N (listwise)	6				

• P<0,05

When Table 6 is analysed, it is seen that success rate is lower in 55-60 questions (M=0,50, SD=0,21) than in 1-54 questions (M=0,54, SD 0,31). However, the minimum success rate is 0,04 in 1-54 Questions while it is 0,28 in 55-60 questions.



From the figure above, it is understood that the participants' lexical knowledge has not developed enough, which may have been caused by grammar focused courses and may have contributed to the low overall success rate in the study.

Conclusion

COBALT as a minimalist method of language teaching was applied to 21 Turkish speaking adult students in language teaching classes of total 40 hours during a ten-week period. During this period, as suggested by COBALT, learners

were not exposed to any L2 grammatical knowledge on structures requiring universal principles which are assumed to work for all natural languages but for the parametric variations and language particular grammatical features. The purpose of this controlled longitudinal study was, therefore, to explore ESL students' performances in the contexts where universal principles or language particular properties work. In order to achieve this purpose, a post-test was applied to those learners tutored through COBALT. The overall findings of the research were interpreted particularly in terms of two implications: linguistic implications and methodological implications. As to the linguistic implications, the participants were found having no direct access to UG principles and parameters through the L2 input since they transferred their L1 knowledge to their L2 production not only where principles worked but also where parametric variations and grammatical features occurred. As for the methodological implications, it was found out that, as a first-time ever experienced method with an original course book in a classroom setting, the COBALT was found promising and economic in terms of cost–benefit analysis although the overall success of the participants tutored through COBALT in the post-test instrument was 51%, which is found neither successful nor unsuccessful. Moreover, it was also found out that the rate of lexical deficiency of the learners tutored through COBALT was high, which may be related to grammar-oriented classes. This deficiency is also expected to have contributed to the success rates in GL items as well. Additionally, some useful implications in terms of nativization-denativization models of L2 acquisition were also made. Accordingly, almost all of the L1 transfer cases observed in this research are of nativization, rather than denativization, tendency which proposes that learners make the input conform to their L1 competence.

REFERENCES

ANDERSEN, Roger W. (1979), "Expanding Schumann's Pidginization Hypothesis", *Language Learning*, 29(1), 105–119. https://doi.org/10.1111/j.1467-1770.1979.tb01054.x.

CHOMSKY, Noam (1965), "Aspects of the Theory of Syntax", In *The Philosophical Quarterly*. https://doi.org/10.2307/2218520.

CHOMSKY, Noam (1976), "On the Nature of Language", *Annals of the New York Academy of Sciences*, *280*(1), 46–57. https://doi.org/10.1111/j.1749-6632.1976.tb25470.x.

CHOMSKY, Noam (1981), "Principles and parameters in syntactic theory", In *Explanation in Linguistics: The Logical Problem of Language Acquisition* (pp. 32–75).

CHOMSKY, Noam (1989), "Knowledge of language: Its nature, origin, and use", *Language Sciences*. https://doi.org/10.1016/0388-0001(89)90029-6.

CHOMSKY, Noam (1995), "The minimalist program", In *Journal of Linguistics*. https://doi.org/10.1017/S0022226797006889.

CHOMSKY, Noam, & Chomsky, N. (2015a), "Some Notes on Economy of Derivation and Representation", In *The Minimalist Program* (pp. 117–152), https://doi.org/10.7551/mitpress/9780262527347.003.0002.

CHOMSKY, Noam, & Chomsky, N. (2015b), "A Minimalist Program for Linguistic Theory", In *The Minimalist Program*. https://doi.org/10.7551/mitpress/9780262527347.003.0003..

COOK, Vivian., & Newson, Mark. (1996), "Chomsky's universal grammar : an introduction", In *Blackwell Publishing*.

HOVARDAOĞLU, Seda (2006), *Davranış Bilimleri İçin Araştırma Teknikleri*. Ankara: VE-GA.

KARASAR, Niyazi. (2008), *Bilimsel Araştırma Yöntemi: Kavramlar-İlkeler-Teknikler*, (15th ed.), Ankara: Nobel Yayın Dağıtım.

BIRKÖK, M. Cüneyt (2018), *Bilimsel Araştırma Yöntemleri*. Retrieved from http://www.Dicle.Edu.Tr/a/Skaradogan/3/Cbirkok.Pdf website: http://www.iejeegreen.com/proje/sunular/gokhan%0A_ozsoy.pdf%0A.

RADFORD, Andrew (2004), "Minimalist syntax: Exploring the structure of english", In *Minimalist Syntax: Exploring the Structure of English*. https://doi.org/10.1017/CBO9780511811319.

SCHACHTER, Jacquelyn. (1988), "Second language acquisition and its relationship to universal grammar", *Applied Linguistics*, *9*(3), 219–235. https://doi.org/10.1093/applin/9.3.219.

SELIGER, Herbert W., & Shohamy, Elena. (1989), "Second language research methods", In *Studies in Second Language Acquisition*.

ŞEKER, Emrullah (2015), *A Minimalist Approach to Analyzing Phrase Structures through Universal Principles and Parameters to Identify Parametric Variations Between English and Turkish Languages.* Unpublished PhD Thesis,Yüzüncü Yıl University.

ŞEKER, Emrullah (2016), "Designing a Competence-Based Syllabus for Turkish Speaking Learners of English in terms of Accessibility to Universal Grammar", *Journal of Language and Linguistic Studies*, *12*(1), ISSN: 1305-578X, 79-109.

BÜYÜKÖZTÜRK, Şener. (2007), *Deneysel Desenler: Öntest-Sontest Kontrol Grubu Desen ve Veri Analizi*, Ankara: Pegem A Yayıncılık.

WHITE, Lydia (1990), "Second Language Acquisition and Universal Grammar", *Studies in Second Language Acquisition*, *12*(2), 121–133. https://doi.org/10.1017/S0272263100009049.