Hacettepe Üniversitesi Eğitim Fakültesi Dergisi

Hacettepe University Journal of Education

e-ISSN: 2536-4758

Turkish Learners' Attitudes Towards Improving Vocabulary in Turkish as a Foreign Language: The Research of Reliability and Validity*

Görkem ARSLAN**, Zekerya BATUR***

1. INTRODUCTION

Throughout its history, the Turkish language and culture have encountered various languages and cultures in different geographical regions. These encounters have had a two-way influence on Turkish language and culture, with Turkish both influencing and being influenced by these cultures. During these interactions, the Turkish language has at times adopted words from other languages and, in turn, contributed words to these languages. As a result, these encounters have shaped the language in many ways. Consequently, cultural exchanges have occurred, opening the way for cultural interactions among nations from Central Asia to Europe. This has allowed both Turkish culture and the cultures encountered by the Turks to become more acquainted with each other. In this context, relations between nations, particularly in the realms of trade, marriage, and education, have started to develop. These close relationships among nations have prompted people to learn second, third, and even fourth languages. They have brought societies closer together, and thus, the centuries-long interaction among societies, which began between nations, has continued to grow, in some respects, controlled, and in some respects, uncontrolled, with the advent of globalization due to technological advancements. In this process, the role of Turkish as a bridge between the East and the West has become increasingly important. Turkish is learned by millions of people all over the world. Turkish, which is spoken by 220 million people and encompasses more than 600,000 vocabulary elements in an area spanning 12 million square kilometers, is a deeply rooted language and a global language, taught in nearly a hundred countries (Akalın, 2010, p. 204). Throughout its fluctuating developmental process over the centuries, Turkish has maintained its significance and strength due to the relationships of Turkish states with their neighbours and their roles in global politics, reaching our time. The strategic position of Turkish states, particularly the Republic of Turkey, in the global community has made Turkish an increasingly sought-after and learned language worldwide. Consequently, efforts related to the teaching of Turkish to foreigners have increased (Biçer, 2012). Turkish has gained international importance for political, economic, and social reasons and has become a language of growing interest due to changing socio-cultural conditions resulting from migrations (Akkaya and Erol, 2019; Erdem, 2009; İşcan and Maden, 2020).

In contemporary times, the instruction of Turkish as a foreign language (TFL) takes place primarily for adults within the country, mainly within the university framework, including institutions like TÖMER (Turkish and Foreign Languages Research and Implementation Center), as well as in various public and private institutions, both official and informal. The Ministry of National Education in Turkey has initiated various projects within the country to promote TFL education for both children and adults. Institutions such as the Maarif Foundation and the Yunus Emre Institute are increasingly strengthening the field, contributing through program development, the provision of educational materials, and active involvement in the educational process. Moreover, important strides have been taken towards specialization in the field through postgraduate TFL programs established within Turkish language teaching departments in Turkey.

Abroad, Turkish language instruction is actively conducted in many countries through the Yunus Emre Institute, Turkish Cultural Centers, centers affiliated with embassies, and various universities (Er, Biçer, and Bozkırlı, 2012). The Ministry of National Education's Directorate General for Overseas Education, the Maarif Foundation, and the Yunus Emre Institute, among other institutions, assign instructors and teachers to foreign countries. These instructors and teachers offer Turkish language courses around the world, thereby contributing to the recognition of the Turkish language and culture.

In addition to individuals feeling the need to learn a foreign language for educational, cultural, commercial, and tourist purposes, the increasing global migration has led to people relocating to other countries, resulting in a demand for foreign language acquisition (Barın, 1992; Stern, 1991). In this regard, Turkish has gained international recognition, which has led to the emergence of new directions, methods, and techniques in the teaching of Turkish as a foreign language (TFL).

Contemporary language teaching approaches emphasize the integrated development of language instruction, encompassing listening, speaking, reading, writing, and grammar learning domains. The acquisition of native language skills or their transfer to learners is closely tied to the development of a rich vocabulary. As this vocabulary is effectively developed and utilized, the teaching of the native language can be accomplished more rapidly (Karatay, 2004, p. 21). The acquisition of words and word clusters, which are essential tools for oral linguistic communication, involves the development of a receptive vocabulary through listening and reading, and the development of a productive vocabulary through speaking and writing, both in native and foreign language instruction. Acquiring and using words, word groups, and word clusters appropriately, in line with the rules and structure of a language, holds significant importance in language learning, as the "size of a personal vocabulary or the number of units in the vocabulary enhances one's ability to comprehend and express oneself" (Gökdayı, 2016, p. 385). The ability of individuals to express themselves clearly and effectively in both their native and foreign languages is closely tied to their vocabulary (Saydam, 2018). Therefore, it can be argued that enhancing the vocabulary in TFL plays a significant role in facilitating language acquisition for students.

The significance of vocabulary acquisition in foreign language teaching cannot be solely regarded as the teaching of individual words or vocabulary elements. Vocabulary acquisition is also considered a form of cultural education or transmission. The richness of vocabulary plays a facilitative role in learning a new language, both in teaching the native language and in teaching a second language. Thus, in the teaching of Turkish, the primary objective is not just teaching words but also imparting Turkish culture and way of life. Language instruction aims to effectively convey the historical traditions and customs unique to the Turks to individuals who are encountering them for the first time (Barın, 2003). Vocabulary, in essence, can be regarded as a repository of cultural knowledge within a language. To facilitate the cultural transmission dimension of language instruction, this repository must be presented to the target group in the most effective manner possible. The functionality of language skills and the recognition and internalization of the language are associated with vocabulary and vocabulary instruction (Erol, 2021).

The concept of vocabulary, which includes the lexicon, covers not only proverbs, idioms, fixed phrases, maxims, and redundancies but also words or phrases that have entered the language from foreign languages and are commonly used. Vocabulary is a fundamental element not only for communication in the native language but also for learning foreign languages, acquiring academic and social life skills, and demonstrating them. This is because vocabulary reflects the interactions, changes, and transformations that a language has undergone throughout its history (Aksan, 1996, p.11).

The Common European Framework of Reference for Languages (CEFR, 2001) outlines language levels and their corresponding achievements at each level, which can be examined to emphasize the importance of vocabulary acquisition at all stages, from basic to advanced levels, in the development of reading, listening, speaking, and writing skills.

While there is no consensus on which words or phrases should be taught at which level in Turkish language teaching, certain researchers who have conducted significant research in the field stand out in the literature (Aydın, 2015; Bozkurt, 2015; Golynskaia, 2017; Resmi Crahay, 2019; Şenyiğit, 2020, etc.). Studies on word frequency are instructive for teachers in enhancing students' vocabulary (Arslan, 2014; Aydın, 2015; Aydın and Açık, 2017; Bozkurt, 2015; Çelik, 2014; Çınar and İnce, 2015; Çiçek, 2015; Erol, 2014; Hayran, 2019; Göçen, 2016; Gündoğdu, 2019; Kılıç, 2017; Mustafaoğlu, 2018; Özdemirel, 2017; Serin, 2017; Yahşi, 2020).

Maden (2020) compared some teaching programs used in Turkish teaching for foreigners (T.C. MEB Directorate of Lifelong Learning and Maarif Foundation) and argued that the Maarif Foundation program is more balanced and beneficial in terms of enriching vocabulary. The fact that two institutions providing public services on behalf of the Republic of Turkey follow different

approaches to enriching vocabulary suggests a lack of a common perspective on vocabulary enrichment. The results of this research, combined with the apparent indecisiveness about which words should be taught at which level, indicate practical and theoretical shortcomings reflected in practice.

On the other hand, for instance, Başutku (2018) examined three B1 level textbooks based on Schmitt's vocabulary teaching strategies. As a result of the research, the rate of activities aimed at enriching vocabulary was calculated as 45% in the DİLMER book, 15% in the Gazi TÖMER book, and 40% in the Yeni Hitit 2 book. In a study by Elmas Dindar (2019) examining B1 level textbooks commonly used in teaching Turkish to foreigners, it was mentioned that the three books followed different approaches to vocabulary instruction, and activities aimed at developing vocabulary were included in speaking and reading comprehension tasks. As expressed in various ways above, a common approach and understanding are needed in the theory and practice of vocabulary enrichment. Although there are practical and theoretical shortcomings in the area of vocabulary enrichment, strong and innovative research is attempting to address these issues. The field of Turkish for Foreigners (TFL) is undoubtedly evolving day by day.

Gökdayı (2016) has noted that there are many methods and techniques that can be used for vocabulary teaching in TFL. In the field, methods and techniques such as predicting word meaning based on context, using dictionaries, trying to understand the meaning based on the formal appearance of the word, and developing vocabulary through drama and games are used. Additionally, there is an increasing number of studies in the literature that focus on new methods and techniques based on visual and auditory tools like word cards, songs, videos, and films. Various practices and techniques related to vocabulary acquisition in TFL can be found in the literature. Apaydın (2007) suggests categorical word teaching practices; Gürsoy and Arslan (2011) recommend educational, traditional, and linguistic games; Arslan and Gürdal (2012) propose the use of visual and auditory activities and drawings; Bilkan (2006) and Uçgun (2006) suggest activities related to intelligence areas according to the theory of multiple intelligences; Şentürk and Şentürk (2012) advocate cooperative learning methods; Demirel (2013) proposes ways of vocabulary instruction based on the use of different word groups within the lessons. Maden and Dinçel (2015) share the finding that students' informal learning in daily life is more effective for vocabulary instruction compared to school-type learning. Aytan and Kılıçarslan (2015) suggest that music videos can be used for exclamation and vocabulary instruction. Doğan (2014) has utilized supermarket brochures for vocabulary instruction. İltar (2014) recommends vocabulary instruction using common words between students' native languages and the language they want to learn. Gülcü (2015), supporting the use of mobile learning tools in vocabulary acquisition, has drawn attention to the position of mobile-assisted learning in this field through a semi-experimental study. Yılmaz Atagül (2016) demonstrated the effectiveness of using films and stories in teaching proverbs and idioms. Bozali (2019) developed a game-based vocabulary teaching program for a master's thesis. Tarhan's research (2020) revealed that the use of virtual reality tools in TFL has an impact on both vocabulary acquisition and the permanence of acquired vocabulary elements.

All of the research conducted in the field of teaching Turkish as a foreign language (TFL) –and many more that might have been overlooked here– as well as ongoing research, demonstrate the importance of understanding what and how students learn in Turkish, as well as the cognitive and affective characteristics of the learners, and their own experiences and expectations in this regard. In this study, the aim is to design a scale that can determine students' attitudes toward learning Turkish vocabulary and word phrases and make a preliminary contribution to future studies in the field. This is because we can argue that students' attitudes toward the course are a crucial input for the implementations since positive attitudes in the literature have been emphasized to lead to an increase in students' motivation and attention levels towards the course, making them put in more effort for learning (Kara, 2010, p. 51). Furthermore, according to Braten and Stromso (2006), attitudes towards the course can advantage some students in learning the subject matter.

Attitudes, which express how people feel about something (Robbins, 1994), constitute a structure involving reactions towards a psychological object, readiness to respond, motivating, and being potentially static, encompassing an evaluation of an object or situation. Interests and tendencies should not be perceived as qualities that can be instantly observed; evaluating them can only be accomplished through the analysis of certain behaviors by the individual (Kağıtçıbaşı, 1999; Sakallı, 2001). A positive attitude towards a language and its speakers can lead to an increase in motivation, which in turn contributes to better learning success and fosters a positive attitude towards language learning (Tódor and Dégi, 2016, p.125). Negative attitudes towards language learning can decrease students' motivation and impede language acquisition, while positive attitudes can produce the opposite effect. Therefore, it is important for a teacher to examine their students' attitudes (Merisuo-Storm, 2007, p. 228). Some researchers claim that attitudes are one of the most important variables in predicting student success in language teaching (Csizér, 2007; Dörnyei, 2009).

1.1. Statement of the Problem

Can the "Attitudes Scale towards Developing Turkish Vocabulary as a Foreign Language", which was developed by researchers and submitted to expert opinions and then to pilot implementation, be used as a valid and reliable attitudes scale?

1.2. Purpose of the Study

Various studies have revealed that individuals exhibit variable responsive behaviors towards a phenomenon depending on the circumstances. These behaviors' responses are commonly measured in diverse ways, with observational techniques being particularly prevalent.

Attitudes, which can be defined as an individual's inclination towards an object or situation, or their positive or negative judgments concerning facts and situations (Üstüner, 2006), are closely associated with behaviors and can be understood through the observation of behaviors (Topçuoğlu Ünal and Köse, 2014). An individual's attitudes towards learning materials, classes, subjects, and even teachers have an impact on the process of learning. The finding that attitudes towards teachers, course materials, and subjects – in short, attitudes towards the course – affect academic success emphasizes the significance of measuring students' attitudes towards all aspects of the learning process (Ağgön and Yazıcı, 2010).

According to Bloom (Bloom, 1995: 86), a student's sense of accomplishment in a class or subject leads to increased motivation and self-confidence for new lessons and topics. Attitudes towards the language learned play an effective role in participating in instructional activities. Indeed, learners' interest and tendencies towards learning are recognized as an effective approach for assessing their situation in learning a language (Saracaloğlu and Varol, 2007: 41). This supports the idea that positive attitudes among Turkish language learners enhance their success in learning Turkish (Karatay and Kartallıoğlu, 2016).

Research findings indicating that positive attitudes towards the culture and society to which a language belongs enhance language learning success (Ushida 2005, p. 5) confirm that various aspects of the language field mutually influence one another in the field of Teaching Turkish as a Foreign Language (TTFL) and that students' interests and attitudes towards language learning affect this at different levels. Recognizing this interdependence among the language elements in TTFL, it becomes evident that measuring student attitudes towards the most crucial element of TTFL, vocabulary, is of great importance for the reasons presented.

Several studies have delineated general trends in vocabulary knowledge in the field of Teaching Turkish as a Foreign Language (TTFL) by examining articles and theses (Maden, 2020; Erol 2021), and various institutions have conducted research analysing vocabulary elements found in various textbooks, reading books, and cartoons (Şimşek, 2020a; Şimşek, 2020b; Bağcı and Özdemir, 2021; Göçen and Aydın, 2021; Şimşek, 2021; Göker and Göçen, 2021; Gökmen, 2021; Alan and Kısa, 2022; Göçen and İleri, 2022; Çiçek and Göçen, 2022; Geçgel and Terzioğlu, 2022; Göçen and Buluş, 2022; Göçen and Çakır, 2022; Serin and Mert, 2022; Göçen and Ataş, 2022; Öztekin, 2022; Şimşek, 2022; Göçen and Budak, 2023; Göçen and Yatmaz, 2023; Şimşek and Teymur, 2023, etc.). Additionally, some studies have examined the methodological approaches to activities found in textbooks and studies (Şimşek and Demirel, 2020), and research has outlined approaches to vocabulary learning in Turkish language teaching programs (Maden, 2020). Among these studies, Çalışkan (2020) provided a proposal for basic vocabulary instruction in TTFL, which is compatible with the Common European Framework of Reference for Languages (CEFR), and Yahşi (2020) contributed to the field with a corpus-based research. Furthermore, there are studies recommending the use of songs (Maden and İşcan, 2020), idiom narrative texts (Gülerer and Gürel, 2020), and Web 2.0 tools (Tıraşoğlu, 2019) in practical research. Alongside these, there are studies proposing activity designs for using television series in enhancing vocabulary (Yılmaz and Irşi, 2017).

Given that the present research aims to develop a scale for measuring attitudes towards enhancing vocabulary acquisition, it evaluated all detailed scale studies within the context of Teaching Turkish as a Foreign Language (TTFL). In this context, numerous scales were encountered, such as Sallabaş's (2013) speaking self-efficacy scale, Büyükikiz's (2013) writing self-efficacy scale, Kadan and Arı's (2021) writing ability attitude scale, Altunkaya and Boylu's (2020) motivation obstacles scale adaptation, Güngör and Kan's (2020) reading self-efficacy scale, Genç Köylü and Isık's (2020) learning anxiety scale, Kummuz and Karakuş's (2023) active participatory learning and Turkish language needs scale, Sevim and Varışoğlu's (2023) self-efficacy perception scale for productive language skills, and Alptekin's (2022) writing attitude scale. The scales that most closely align with the scope of our research, aimed at developing a scale for measuring attitudes towards enhancing vocabulary, are Kardaş's (2016) vocabulary usage attitude scale and Varışoğlu and Sevim's (2022) "Receptive Language Skills Self-Efficacy Perception Scale." Through a comprehensive review of the literature, both studies that were mentioned and those that were not were examined in detail, revealing that there is no scale study measuring student attitudes towards enhancing vocabulary in TTFL. Considering the role of vocabulary acquisition in language learning (August et al., 2005) and the influence of student attitudes on learning (Cahill et al., 2018), it is believed that a "Scale for Measuring Attitudes towards Enhancing Vocabulary" specific to TTFL would contribute to the field.

2. METHODOLOGY

This study is a scaling-based research prepared to determine the construct validity and internal consistency reliability coefficient of the Attitudes Scale towards Improving Turkish Vocabulary as a Foreign Language.

2.1. Development of Data Collection Tool

In the development process of the Turkish as a Foreign Language Attitude Scale (TFLAS), initially, a draft item pool was created, item candidates were submitted to expert opinions, followed by a pilot test, and factor analyses were conducted (Karasar, 1999: 139-143; Balcı, 1995: 142-143). Subsequently, the findings expressing the reliability and validity of the scale were reported.

During the development of the draft item pool for the study, first, a review of the relevant literature was conducted, resulting in a pool of 128 items, including both positively and negatively loaded items. This pool was then presented to expert opinions consisting of a Turkish language teacher, a Turkish language instructor, an assessment expert, and three faculty members specializing in Turkish language instruction in the context of teaching Turkish as a foreign language.

Experts marked one of the "Accepted as is" "Requires Revision" "Rejected" options in the expert opinion form, and they were also asked to write their opinions and suggestions in the boxes provided. The data obtained from the expert opinions were subjected to the Lawshe test. Table 1 contains information about the relevant test:

Table 1.
Lawshe Test Results of Expert Opinions on the Items in the Attitudes Scale towards the Improvement of the Vocabulary of Teaching Turkish as a Foreign Language

Items	Accepted as is	Requires Revision	Rejected	CVR	Items	Accepted as is	Requires Revision	Rejected	CVR
1	3	1	2	0	71	3	1	2	0
2	5	1	0	0,66	72	6	0	0	1
3	6	0	0	1	73	2	0	4	-0,33
4	6	0	0	1	74	1	0	5	-0,66
5	0	3	3	0	75	5	0	1	0,66
6	2	0	4	-0,33	76	4	2	0	0,33
7	6	0	0	1	77	4	0	2	0,33
8	6	0	0	1	78	4	2	0	0,33
9	1	2	3	-0,66	79	5	1	0	0,66
10	3	1	2	0	80	5	1	0	0,66
11	5	0	1	0,66	81	4	2	0	0,33
12	2	1	3	0,33	82	5	0	1	0,66
13	5	1	0	0,66	83	4	1	1	0,33
14	2	2	2	0,33	84	6	0	0	1
15	0	0	6	-1	85	6	0	0	1
16	5	0	1	0,66	86	6	0	0	1
17	6	0	0	1	87	6	0	0	1
18	3	1	2	0	88	6	0	0	1
19	6	0	0	1	89	0	0	6	-1
20	3	1	2	0	90	5	1	0	0,66
21	4	1	1	0,33	91	6	0	0	1
22	3	1	2	0	92	4	1	1	0,33
23	5	1	0	0,66	93	6	0	0	1
24	5	0	1	0,66	94	0	0	6	-1
25	0	0	6	-1	95	4	0	2	0,33
26	5	1	0	0,66	96	4	1	1	0,33
27	5	0	1	0,66	97	6	0	0	1
28	0	0	6	-1	98	5	0	1	0,66
29	0	0	6	-1	99	5	1	0	0,66
30	6	0	0	1	100	6	0	0	1
31	3	1	2	0	101	5	0	1	0,66
32	5	0	1	0,66	102	6	0	0	1
33	5	1	0	0,66	103	6	0	0	1
34	2	4	0	-0,33	104	6	0	0	1
35	6	0	0	1	105	0	0	6	-1
36	5	1	0	0,66	106	1	2	3	-0,66
37	0	0	6	-1	107	1	2	3	-0,66
38	4	1	1	0,33	108	1	0	5	-0,66

39	4	1	1	0,33	**109**	1	3	2	-0,66
40	4	1	1	0,33	**110**	1	2	3	-0,66
41	1	0	5	-0,66	**111**	6	0	0	1
42	6	0	0	1	**112**	6	0	0	1
43	4	1	1	0,33	**113**	6	0	0	1
44	5	0	1	0,66	**114**	1	0	5	-0,66
45	5	0	1	0,66	**115**	6	0	0	1
46	2	0	4	-0,33	**116**	0	3	3	-1
47	1	0	5	-0,66	**117**	0	0	6	-1
48	0	0	6	-1	**118**	0	0	6	-1
49	1	0	5	-0,66	**119**	0	3	3	-1
50	4	1	1	0,33	**120**	6	0	0	1
51	6	0	0	1	**121**	6	0	0	1
52	5	1	0	0,66	**122**	4	1	1	0,33
52	5	0	1	0,66	**123**	0	3	3	-1
54	4	1	1	0,33	**124**	4	1	1	0,33
55	1	2	3	-0,66	**125**	0	3	3	-1
56	6	0	0	1	**126**	0	3	3	-1
57	6	0	0	1	**127**	1	0	5	-0,66
58	1	0	5	-0,66	**128**	1	0	5	-0,66
59	0	1	5	-0,66					
60	0	3	3	-1					
61	5	1	0	0,66					
62	6	0	0	1					
63	0	0	6	-1					
64	6	0	0	1					
65	1	0	5	-0,66					
66	0	3	3	-1					
67	6	0	0	1					
68	4	0	2	0,33					
69	6	0	0	1					
70	6	0	0	1					

The Lawshe technique (1975) is a method used to assess whether test items are adequate in measuring the targeted behaviors through expert evaluations (Üçüncü and Sakız, 2020). In order to obtain the necessary data for the Lawshe technique, appropriate field experts are initially identified. The item pool that has been prepared is processed into an evaluation form with options "Item is necessary/appropriate," "Item should be modified/corrected," and "Item should be removed from the test." Subsequently, the opinions of the experts are collected, and based on these opinions, content validity ratios of the items are determined. By calculating the average of these content validity ratios (CVR), the Content Validity Index (CVI) for the entire scale is obtained.

In this study, as there were 6 experts providing opinions for the attitude scale to be developed, the minimum required CVR value for each item should be at least 0.99 (Veneziano and Hooper, 1997). Upon evaluating the results of the Lawshe test, 13 items remained in the first dimension, 9 items in the second dimension, and 15 items in the third dimension. The CVI values for each dimension, as well as the CVI value for the entire scale, were all found to be 1.

Following the calculations and adjustments made using the Lawshe technique, a total of 36 items approved by the expert opinions were transformed into a five-point Likert scale format. The form was translated into English by a sworn translator and then reviewed for its suitability in terms of educational language by an English teacher before its final version was prepared.

In order to check whether the items and the translation are sufficiently understandable, the form was applied to 10 students at A1 level who were learning Turkish in Slovakia, and it was understood that this version of the scale form was suitable for the pilot implementation. The implementation time of the scale is about 10-15 minutes.

2.2. Participants

In scale development studies, it is necessary to reach a minimum of five times the number of participants to obtain reliable results from the analyses (Tavşancıl, 2010). The participants of the study consisted of 191 foreign students learning Turkish in various institutions during the fall semester of the 2020-2021 academic year.

In the pilot implementation, 191 students who were determined by the random selection method were reached. Demographic information of 191 students who participated in the pilot implementation of the scale and were learning Turkish as a foreign language at a basic level are given in Table 2, Table 3 and Table 4.

Table 2.
Distribution of the Study Group by Gender

	Number of Participants	**Percent**
Female	129	67.5
Male	62	32.5
Total	191	100.0

Table 3.
Distribution of the Study Group by Age Groups

Age Groups	**Number of Participants**	**Percent**
15-18	31	16.2
19-23	95	49.7
24+	65	34.0
Total	191	100.0

Table 4.
Distribution of the Study Group by Foreign Language Proficiency

Foreign language	**Number of Participants**	**Percent**
Knows	167	87.4
Does not know	24	12.6
Total	191	100.0

The study group consisting of 191 students accessed the 36-item pilot form of the Attitudes Scale towards Improving Turkish Vocabulary as a Foreign Language, designed as a five- point Likert- type scale, on-line via Google Forms infrastructure.

2.3. Factor Analysis

Factor analysis is a statistical method aimed at combining related variables to discover meaningful new factors or structures or to test factor-indicator relationships (Büyüköztürk, Şekercioğlu, and Çokluk, 2012:178). In the literature, two main approaches are suggested for factor analysis:

2.3.1. Exploratory factor analysis

Exploratory factor analysis is a technique used to generate new and independent variables from related variables (Doğan and Başokçu, 2010). In exploratory factor analysis, the aim is to discover new factors and generate hypotheses, while in confirmatory factor analysis, the focus is on testing a hypothesis that has already been formulated (Kline, 1994; Stevens, 1996; Tabachnick and Fidell, 2001).

In this study, the SPSS 23 software package was used for exploratory factor analysis in the developed attitude scale.

2.3.2. Confirmatory factor analysis

Confirmatory factor analysis can be described as the testing of a hypothesis concerning a known relationship between variables (Şener, 2002). It is used to examine the level and form of the relationship between factors and to determine if the factors are appropriate and sufficient for the relevant model (Erkorkmaz et al., 2013). In this study, the LISREL program was used for the confirmatory factor analysis of the developed attitude scale.

2.4. Reliability Calculation

Reliability means that an improved scale can provide consistent results in repeated measurements. The usability of a scale depends on its reliability (Ercan and Kan, 2004). In this study, the reliability of the scale was calculated by examining the Cronbach's Alpha coefficient of the remaining 18 items after factor analyses. The Cronbach's Alpha value of the scale was found to be 0.87.

3. FINDINGS

3.1. Findings from the Exploratory Factor Analysis

Before proceeding to the factor analysis of the scale, some preliminary analyses were conducted to determine whether the data were suitable for factor analysis. For reliability analysis, Cronbach's Alpha was examined, and the 6th item, which lowered this value, was removed from the scale.

Prior to commencing the analyses, normality values were checked. Since the sample size was greater than 50, Kolmogorov-Smirnov tests (Büyüköztürk, 2006) were used to test the normality assumption. According to Tabachnick and Fidell (2013), skewness and kurtosis values within the range of -1.5 to +1.5 indicate data normality, while according to George and Mallery (2010), the range is -2 to +2. Table 5, showing the calculated skewness and kurtosis values, can be examined below:

Table 5.
Skewness and Kurtosis Values

	Values	**Std. Error**
Skewness	-,361	,176
Kurtosis	-,719	,350

When we have a look to the Table 5, which includes the skewness and kurtosis values obtained as a result of the analysis performed to test the normal distribution of the data obtained from the pilot implementation of the scale, is examined, it is understood that both values are within the limits of the normal distribution (Tabachnick and Fidell, 2013; George and Mallery, 2010). Based on this, it can be said that the data are normally distributed.

KMO (Kaiser Meyer Olkin) value was also checked to determine whether the scale was suitable for factor analysis. Accordingly, as a result of the analyses performed on the SPSS 23 program, the KMO value was calculated as ,848. This value is accepted as "good" (Çokluk and the others, 2010, p. 207). Bartlett Test of Sphericity value is also [χ^2= 2616,085; *df*: 496; *p*=.000] was found to be significant. Based on these results, it was decided that the scale was suitable for factor analysis.

Scale; since it was thought to be three-dimensional from the beginning (receptive vocabulary, productive vocabulary and dictionary usage dimensions, respectively), analyses were made by compressing them in three dimensions. According to this; scale explains 45,216% of the total variance.

To determine the items to be used in the scale, principal component analysis and the varimax rotation technique were employed. It was ensured that each variable's loading value was above 0.32 (Tabachnick and Fidell, 2001), and a minimum of 0.10 was considered to prevent multicollinearity (Çokluk et al., 2010).

According to the analyses carried out; factor loads are as follows:

Table 6.
Factor and Item Loads of the Attitudes Scale towards Improving the Vocabulary of Turkish as a Foreign Language

	Factors and Item Loads					
	Factors					
Substances	**Developing Recipient Vocabulary**	**Item Total Correlation**	**Developing Producer Vocabulary**	**Item Total Correlation**	**Using a Dictionary**	**Item Total Correlation**
1st	,692	,566				
2nd	,764	,610				
3	,773	,620				
7	,725	,621				
8			,624	,312		
9	,645	,527				
10			,742	,328		
13			,609	,146		
14	,535	.286				
17			,815	,512		
18					,546	,411
25	,840	,671				
26	,811	,608				
27	,632	,455				
31	,732	,575				
34	,661	,574				
21	,721	,605				
24					,739	,231

As a result of analysis caused overlap and factor effluents are removed from the low level. The remaining 18 items are; 12 items in the first sub-dimension, 4 items in the second sub-dimension, and 2 items in the third sub-dimension.

Values such as the normality test, KMO value and Cronbach Alpha coefficient of the 18 items obtained as a result of the exploratory factor analysis were recalculated since confirmatory factor analysis would be performed. In the normality tests; according to the skewness and kurtosis values, the values again met the assumption of normal distribution:

Table 7.
Skewness and Kurtosis Values of the Final Scale

	Values	Std. Error
Skewness	-,339	,176
Kurtosis	-,648	,350

The KMO value calculated for the final version of the scale is .85. The Cronbach Alpha value of the final version of the scale was found to be .856. There is no substance that would increase this value and that should be removed.

Finally, analysis was performed based on the Pearson correlation coefficient to determine the correlation between the sub-dimensions of the scale and the whole scale. (The values are significant since $p < .05$.)

Table 8.
Results of Correlation Analysis Between Scale Scores and Criterion

	1st factor	2nd factor	3rd factor
All of the Scale	,844 **	,610 **	,409 **

The absolute value of the correlation coefficient is high, between 0.70-1.00; moderate between 0.69-0.30; if it is between 0.29-0.00, it is interpreted as a low level relationship (Büyüköztürk, 2012). Accordingly, the correlation values of the scale are high for the first factor and moderate for the second and third factors.

3.2. Findings from Confirmatory Factor Analysis

Confirmatory factor analysis was used with a total of 18 items obtained by exploratory factor analysis. The path diagram obtained as a result of confirmatory factor analysis is presented in Figure 1:
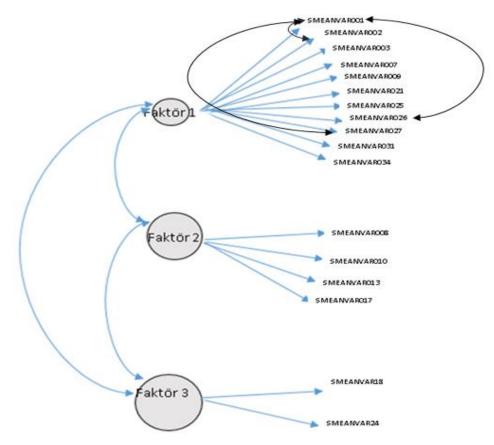

Figure 1. Path Diagram of the Attitudes Scale towards Improving the Vocabulary of Turkish as a Foreign Language

In confirmatory factor analysis, it is decided whether the model is compatible with the theory according to the results of various fit indexes. Even if the factor loadings of the items in the model are very good, the fit indices may not reach the normal values. These fit indices take names such as χ^2, χ^2/df, GFI, AGFI, RMSEA, RMR, SRMR. Compliance index is very diverse, but is reported to be a complete consensus about which standard will be adopted in this adaptation index (Munro 2005; Simsek 2007; Çapık 2014).

In confirmatory factor analysis, the decision regarding whether the model is consistent with the theory or not is made based on various fit index results. According to Çapık (2014), the table for fit goodness indices in confirmatory factor analysis is as follows:

Table 9.
Goodness of Fit Indices and Normal Values Used in Confirmatory Factor Analysis (Çapık, 2014, p. 199)

Index	Normal Value	Acceptable Value
χ^2 "p" Value	p>0.05	-
χ_2/df	<2	<5
GFI	>0.95	>0.90
AGFI	>0.95	>0.90
CFI	>0.95	>0.90
RMSEA	<0.05	<0.08
RMR	<0.05	<0.08
SRMR	<0.05	<0.08

References: (Munro, 2015; Schreiber, Nora, Stage, Barlow and King, 2006; Şimşek, 2007; Hooper and Mullen, 2008; Schumacker and Lomax, 2010; Waltz, Strcikland and Lenz, 2010; Wang and Wang, 2012).

The χ^2/df value of the Attitudes Scale towards Improving the Vocabulary of Turkish as a Foreign Language is 1.7980; χ^2 "*p*" value is 0.0000; The *RMSEA* value was found to be 0.065. *CFI* value of the scale was .928, *NFI* value was .853, *GFI* value was .883; *RMR* value was 0.052, *SRMR* value was 0.000 and *AGFI* value was .884. Considering the goodness of fit index values in Table 9, these values are generally within normal and acceptable limits. A ratio of χ^2/df below 3 indicates a perfect fit (Topçuoğlu Ünal and Köse, 2014). When *RMSEA* is examined; since the value of 0.065 is less than 0.08 (Jöreskog and Sörbom, 1993), it can be stated that it fits well.

3.3. Upper-Lower Group Independent Samples t-Test Results

To determine the discriminative power of the Attitude Scale towards Improving Vocabulary in Turkish as a Foreign Language, independent samples t-tests were conducted. For this purpose, lower and upper group means were examined based on the mean scores obtained from the scale. The results for the relevant statistics are presented in Table 10 and Table 11:

Table 10.
Upper-Lower Group Independent Sample t-test Results of the Scale

Groups	N	Cover.	SS	Sd	T	P
Subgroup	52	3,4124	,37460	102	-22.314	,000*
Upper Group	52	4.6624	,15119			

p < 0.05

Table 11.
Lower-Super Group Independent Sample t-test Results of the Sub-Dimensions of the Scale

	Group	N	Cover.	SS	Sd	t	P
1. Bottom Dimension	**Lower**	52	43,8462	7,87248	102	-6,024	,000*
	Top	52	50,9231	3.13016			
2. Bottom Dimension	**Lower**	52	11.9615	1,86780	102	-16,321	,000*
	Top	52	17,6154	1.65865			
3. Bottom Dimension	**Lower**	52	2,5192	,69987	102	-25,561	,000*
	Top	52	5,0000	0.00000			

* *p < 0.05*

According to the results obtained, subgroup-upper group independent samples t-test results are significant in all sub-dimensions of the scale and in the whole scale. Based on this, it can be said that the scale can distinguish the lower and upper groups.

3.4. Highest and Lowest Scores That Can Be Obtained from the Scale

The values related to the maximum and minimum scores that the students got from the scale are as follows:

Table 12.
Maximum and Minimum Scores that Students Got from the Scale

N	Min.	Max.	X	Std. Deflection
191	45.00	90.00	74.13	9.5387

The lowest and highest scores obtained from the 18-item final version of the scale are shown in Table 12. Accordingly, the array width is expected to be 45.

4. RESULTS, DISCUSSION AND RECOMMENDATIONS

In this research, which was carried out to develop a valid and reliable attitudes scale to measure students' attitudes towards improving Turkish vocabulary, which can be used in the field of Teaching Turkish as a Foreign Language, the scale development stages after the literature review (Karasar, 1999, p. 139-143; Balcı, 1995, s. 142- 143) was followed. For this purpose, an item pool was created based on the literature, and the item pool was examined by experts. The version of the scale, which was planned to be applied to the students for factor analysis, was determined after the opinions of the experts and translated into English by a sworn translator and then the pre-implementation was carried out. After the pre-implementation, the final version of the scale was given and the scale was applied to 191 foreign students who were randomly selected. The data obtained; explanatory and confirmatory factor analyses were performed using SPSS 23 and LISREL package programs. In the light of the results of the analysis, it has been revealed that the scale is a valid and reliable scale and can be used to measure the attitudes of learners of Turkish as a foreign language towards improving their vocabulary. It is thought that this scale, which includes the dimensions of receptive vocabulary, productive vocabulary and using a dictionary, can be used to reveal the attitudes of learners of Turkish as a foreign language towards learning words and words, which are one of the most important dimensions of language learning.

The scale developed in this research was developed with a pilot implementation carried out with Turkish learners who were randomly reached and defined themselves in different language levels. In a further research; it can be applied to groups at different language levels to see if there are significant differences between groups, and the source of these differences can be discussed. Moreover; what kind of attitude differences exist between those who learn Turkish in Türkiye and those who learn Turkish abroad, in which countries or regions can be investigated.

In further researches, based on the above-mentioned attitude-motivation relationship, it can be revealed how and in what ways the attitudes of learners of Turkish as a foreign language towards learning vocabulary are related to student motivations. This present research; it includes the development of a scale that can support research on how to improve students' attitudes towards enriching their vocabulary.

Research and Publication Ethics Statement

This research was approved by the Social and Human Sciences Scientific Research and Publication Ethics Committee of Uşak University, with the decision E-89784354-045.99-27901and dated 12.07.2021.

Contribution Rates of Authors to the Article

Görkem ARSLAN conducted the pilot implementation and factor analysis. Prof. Dr. Zekerya BATUR took part in the process of obtaining expert opinions and determining the research method. All authors reviewed the article.

Statement of Interest

The aim of this study is to develop a valid and reliable attitude scale consisting of Likert type items to measure the attitudes of students learning Turkish as a foreign language towards vocabulary development.

5. REFERENCES

Ağgön, E., & Yazıcı, M. (2010). Attitudes of classroom teaching program students towards physical education course (Erzincan University Sample). *Proceedings of the 9th National Classroom Teacher Education Symposium*, Elazığ, 1072-1074. https://www.researchgate.net/publication/325718374_Sinif_ogretmenligi_programi_ogrencilerinin_beden_egitimi_dersine_y onelik_tutumlari_Erzincan_Universitesi_ornegi/link/5b1fbf0c0f7e9b0e373ebdf8/download

Akalın, Ş. H. (2009). Turkish language: World language. *Türk Dili*, *687*, 195-204. http://turkoloji.cu.edu.tr/YENI%20TURK%20DILI/sukru_haluk_akalin_turk_dili_dunya_dili.pdf

Akkaya, A., & Erol, S. (2019). Grammar problems experienced by Arab students studying in Türkiye at the basic level of Turkish. *Journal of History School (JOHS)*, *12*, 549-559. doi: 10.14225/Joh1651

Akkaya, N., & Sevindi, Z. (2015). Developing an attitude scale towards common compulsory Turkish language courses taught at universities. *Journal of Dokuz Eylül University Buca Faculty of Education, 39,* 111-122. https://dergipark.org.tr/en/download/article-file/231523

Aksan, D. (1996). *Vocabulary of Turkish.* Ankara: Engin.

Alan, N., & Kısa, O. (2022). Turkish teaching kit prepared by the American Foreign Service Institute and its cultural vocabulary. *RumeliDE Journal of Language and Literature Studies,* (26), 230-241. doi: 10.29000/rumelide.1073896.

Altunkaya, H., & Boylu, E. (2020). Motivation Barriers Scale for Foreign Students Learning Turkish: Adaptation to Turkish. *Bayburt Education Faculty Journal, 15*(29), 186-203. doi: 10.35675/befdergi.515725

Apaydın, D. (2007). *A method essay on teaching vocabulary in teaching Turkish as a foreign language*. (Unpublished Master's Thesis). Ankara University Institute of Social Sciences, Türkiye.

Arslan, M., & Gürdal, A. (2012). A method of teaching Turkish words to foreigners with visual and auditory tools. *Kastamonu Education Journal, 20* (1), 255-270. https://dergipark.org.tr/en/pub/kefdergi/issue/48696/619523

Arslan, N (2014). *Examination of vocabulary elements in Turkish teaching textbooks for foreigners.* (Published Master's Thesis) Karadeniz Technical University, Trabzon, Türkiye.

Aslan, E., & Coşkun, O. (2016). Teaching vocabulary with games software products in Turkish teaching to foreigners. *Electronic Turkish Studies, 11*(3), 221-236. https://dx.doi.org/10.7827/TurkishStudies.9417

August, D., Carlo, M., Dressler, C., & Snow, C. (2005). The critical role of vocabulary development for English language learners. *Learning Disabilities Research & Practice, 20*(1), 50-57. doi: 10.1111/j.1540-5826.2005.00120.x

Aydın, M. (2015). *Vocabulary study according to word frequency and levels in course books and reading books used in teaching Turkish as a foreign language* (Master's thesis). Gazi University, Ankara, Türkiye.

Aydın, M., & Açık, F. (2017). Vocabulary in TÖMER books. *International Journal of Language Academy, 5*(1), 337-348. doi: 10.18033/ijla.3505

Aytan, N., & Kılıçarslan, R. (2015). Teaching Some Exclamation Words with Music Clips in Teaching Turkish as a Foreign Language. *International Journal of Languages' Edication and Teaching,* UDES 2015, 2007-2018.

Aytan, T., & Başal, A. (2016). Effects of Category-based Vocabulary Teaching on Achievement in Teaching Turkish as a Foreign Language. *EKEV Akademi Dergisi, 20*(65), 559- 576. https://dergipark.org.tr/en/pub/sosekev/issue/72038/1157889

Bağcı, H., & Özdemir, A. (2021). Examination of Reading Texts in A1 and A2 Level Textbooks in Terms of Vocabulary. (The Case of Gazi University Tömer). *Mehmet Akif Ersoy University Faculty of Education Journal*, (60), 385-407. https://dergipark.org.tr/en/pub/maeuefd/issue/65646/954399

Balcı, A. (2013). *Reading and Understanding Education.* Ankara: Pegem.

Barın, E. (1992). *An attempt at a method in teaching Turkish to foreigners.* (Unpublished Master's Thesis). Gazi University, Ankara.

Barın, E. (2003). The importance of basic vocabulary in teaching Turkish to foreigners. *Turkology Research*, (13), 311-317. https://dergipark.org.tr/tr/pub/tubar/issue/16954/177015

Baş, B. & Karadağ, Ö. (2012). Basic research on vocabulary conducted abroad and in Türkiye. *National Education, 41*(193), 81-105. https://dergipark.org.tr/en/pub/milliegitim/issue/36181/406774

Başutku, S. (2018). *Vocabulary Teaching at B1 Level in Teaching Turkish as a Foreign Language.* (Unpublished Master's Thesis) Başkent University*,* Ankara, Türkiye.

Batur, Z., & Özcan, H. Z. (2018). Vocabulary determination study for the basic level in teaching Turkish as a foreign language: The sample of Uşak University. *Future Visions Journal*, *2*(4), 20-30. doi: 10.29345/futvis.62

Biçer, N. (2012). Teaching Turkish to foreigners from the Huns to the present day. *Uluslararası Türkçe Edebiyat Kültür Eğitim (TEKE) Dergisi*, *1*(4), 107-133. doi: 10.7884/teke.100

Bilkan, N. (2006). *Multiple Intelligence Activities in Turkish Teaching*. İzmir: Dilset.

Bloom, B. S. (1995). *Human Qualities and Learning at School*. (Translated by D.A. Özçelik). Ankara: Milli Eğitim.

Bozali, S. (2019). *An example of game material development regarding vocabulary acquisition in teaching/learning Turkish as a foreign language: B1 level.* (Unpublished Master's Thesis) Hacettepe University, Ankara.

Bozkurt, B., Bülbül, F., & Demir, H. (2014). Dictation and teaching Turkish as a foreign language. *Turkish Studies, 9(6)*, 159-173. http://dx.doi.org/10.7827/TurkishStudies.6662

Braten I., & Stromso H. I. (2006). Epistemologicall Beliefs, Interest, and Gender as Predictors of Internet Based Learning Activities. *Computer in Human Behavior, 22*, 1027-1042. https://doi.org/10.1016/j.chb.2004.03.026

Büyükikiz, K. (2012). Development of a Writing Skill Self-efficacy Scale for Foreigners Learning Turkish as a Second Language: A Study of Validity and Reliability. *Mustafa Kemal University Journal of Social Sciences Institute, 9*(18), 69-80. https://dergipark.org.tr/en/pub/mkusbed/issue/19552/208324

Büyüköztürk, Ş. (2002). Factor analysis: Basic concepts and its use in scale development. *Educational Management in Theory and Practice*, *32*(32), 470-483. https://dergipark.org.tr/en/pub/kuey/issue/10365/126871

Büyüköztürk, Ş. (2006). *Data Analysis Handbook for Social Sciences: Statistics, Research Design, SPSS İmplementations and Interpretation.* (6th Edition.) Ankara: Pegem Akademi.

Büyüköztürk, Ş. (2012). *Data Analysis Handbook for Social Sciences*. Ankara: Pegem Akademi.

Büyüköztürk, Ş. (2014) *Experimental Designs.* Ankara: Pegem Akademi.

Büyüköztürk, Ş. (2015). *Data Analysis Handbook for Social Sciences: Statistics, Research Design, SPSS İmplementations and Interpretation.* (Expanded 21. Edition). Ankara: Pegem Akademi.

Cahill, M. J., McDaniel, M. A., Frey, R. F., Hynes, K. M., Repice, M., Zhao, J., & Trousil, R. (2018). Understanding the relationship between student attitudes and student learning. *Physical Review Physics Education Research, 14*(1), 010107, 1-16. https://journals.aps.org/prper/abstract/10.1103/PhysRevPhysEducRes.14.010107

CEFR (2001). *Common European Framework of Reference for Language, Learning, Teaching, Assesment.* Cambridge: Cambridge University Press. https://rm.coe.int/16802fc1bf

Csizér, K. (2007) A nyelvtanulási motiváció vizsgálata. Angolul és németül tanuló diákok motivációs beállítódása a nyelvválasztás tükrében [Examining language learning motivation. English and German language learners' motivational attitudes towards language choice]. *Új Pedagógiai Szemle 57*(6): 54–68. https://epa.oszk.hu/00000/00035/00114/2007-06-ta-Csizer-Nyelvtanulasi.html

Çalışkan, N. (2020). *A Vocabulary Proposal Compatible with CEFR for Turkish A1 and A2 Levels.* Nobel Scientific Works.

Çapık, C. (2014). Statistical power analysis and its use in nursing research: basic information. *Anatolian Journal of Nursing and Health Sciences, 17* (4), 268-274. https://dergipark.org.tr/en/pub/ataunihem/issue/2667/34749

Çapık, C. (2014) The use of confirmatory factor analysis in validity and reliability studies. *Anatolian Journal of Nursing and Health Sciences, 17* (3). 196-205. https://dergipark.org.tr/en/pub/ataunihem/issue/2666/34715

Çelik, S., Toraman, S. Ö., & Çelik, K. (2018). The relationship between student success and class participation and teacher rapport. *Kastamonu Education Magazine, 26* (1), 209-217. doi: 10.24106/kefdergi.378129

Çelik, S. (2014). *Comparison of the Vocabulary Used in Textbooks at A1 and A2 Levels in Teaching German and Turkish as a Foreign Language.* (Unpublished Master's Thesis) Marmara University Institute of Educational Sciences, İstanbul, Türkiye.

Çiçek, M. (2015). Comparison of European language program word sets and words in books teaching Turkish to foreigners: Yunus Emre Institute Turkish teaching set A1 textbook sample. *International Journal of Language Academy*, *3*(2), 216-231. https://www.academia.edu/13372353/Avrupa_Dil_Program%C4%B1_S%C3%B6zc%C3%BCk_Setleri_ile_Yabanc%C4%B1lar a_T%C3%BCrk%C3%A7e_%C3%96%C4%9Fretimi_Kitaplar%C4%B1ndaki_S%C3%B6zc%C3%BCklerin_Kar%C5%9F%C4% B1la%C5%9Ft%C4%B1r%C4%B1lmas%C4%B1_Yunus_Emre_Enstit%C3%BCs%C3%BC_T%C3%BCrk%C3%A7e_%C3%96% C4%9Fretim_Seti_A1_Ders_Kitab%C4%B1_%C3%96rne%C4%9Fi

Çiçek, M., & Göçen, G. (2022). Vocabulary Elements in "Salih Story Set" Prepared for Foreigners Learning Turkish. *Journal of Sustainable Education Studies, 3*(2), 82-96. https://dergipark.org.tr/en/pub/seader/issue/69730/1102845

Çifçi, M. (2006). Problems of Teaching Turkish. in *Contemporary Problems of Turkish*. Gülsevin, G., & Boz, E. (Eds.). Ankara: Gazi.

Çiftçi, Ö., & Demirci, R. (2018). A Bibliographical Essay on Teaching Turkish as a Foreign Language. *Electronic Turkish Studies*, *13*(28), 265-339. doi: 10.7827/TurkishStudies.13725

Çınar, İ., & İnce, B. (2015). A corpus-based look at the vocabulary in Turkish and Turkish culture textbooks. *International Journal of Languages' Education and Teaching, 3*(1), 198-209. https://avesis.medeniyet.edu.tr/yayin/358d88c9-8e4b-4c5e-b36f-316595ec313d/turkce-ve-turk-kulturu-ders-kitaplarindaki-soz-varligina-derlem-temelli-bir-bakis

Çokluk, Ö., Şekercioglu, G., & Büyüköztürk, Ş. (2012). *Multivariate SPSS and LISREL Implementations for Social Sciences.* Pegem.

Demirel, M. V. (2013). The effect of using different word groups in teaching vocabulary to students learning Turkish as a foreign language. *International Turkish Literature Culture Education (TEKE) Journal, 2*(4), 286-299. https://dergipark.org.tr/en/download/article-file/136878

Doğan, N. & Başokçu, T. O. (2010). Comparison of the results of factor analysis and progressive cluster analysis applied for the statistics attitude scale. *Journal of Measurement and Evaluation in Education and Psychology, 1* (2), 65-71. https://dergipark.org.tr/en/pub/epod/issue/5807/77240

Doğan, Y. (2014). Using market brochures in teaching Turkish vocabulary to foreigners. *Journal of Language and Linguistic Studies*, *10*(1), 89-98. https://dergipark.org.tr/en/download/article-file/104789

Ellis, R. (1994). Factors in the incidental acquisition of second language vocabulary from oral input: A review essay. *Applied Language Learning*, *5*(1), 1-32. https://eric.ed.gov/?id=EJ491193

Elmas Dindar, D. (2019). *The Reflection of Vocabulary Teaching Ways in Teaching Turkish to Foreigners on Textbooks in Teaching Turkish as a Foreign Language*. (Unpublished Master's Thesis). Hacettepe University, Ankara, Türkiye.

Er, O., Biçer, N., & Bozkırlı, K. Ç. (2012). Evaluation of the problems encountered in teaching Turkish to foreigners in the light of the relevant literature. *International Turkish Literature, Culture and Education (TEKE) Journal, 1*(2), 51-69. doi: 10.7884/teke.51

Ercan, İ., & Kan, İ. (2004). Reliability and validity of the scales. *Journal of Uludağ University Faculty of Medicine, 30*(3), 211-216. https://dergipark.org.tr/en/pub/uutfd/issue/35255/391149

Erdem, İ. (2009). A bibliography compilation about teaching Turkish to foreigners. *Turkish Studies*, 4(3), 888-937. doi: 10.7827/TurkishStudies.13725

Erkorkmaz, Ü., Etikan, İ., Demir, O., Özdamar, K., & Sanisoğlu, S. Y. (2013). Confirmatory factor analysis and fit indices. *Turkiye Klinikleri Journal of Medical Sciences*, *33*(1), 210-223. doi: 10.5336/medsci.2011-26747

Erol, H. F. (2014). *Basic vocabulary acquisition in teaching Turkish as a foreign language* (Unpublished doctoral dissertation). Istanbul University, Istanbul, Türkiye.

Erol, S. (2021). An evaluation of vocabulary and word teaching in teaching Turkish as a foreign language: Postgraduate theses from 1981 to 2021. *Aydın Tömer Language Journal, 6*(1), 103-120. https://dergipark.org.tr/en/pub/aydintdd/issue/60838/889858

Gagne, R. (1985). *The Conditions of Learning and Theory of Instruction Robert Gagné*. New York, NY: Holt, Rinehart and Winston.

Genç Köylü, S., & Isık, A. D. (2020). The Foreign Language Learning Anxiety Scale: A Validity and Reliability Study. *The Journal of Limitless Education and Research, 5*(2), 167-181. doi: 10.29250/sead.754276

George, D., & Mallery, P. (2010). *SPSS for Windows step by step. A simple study guide and reference* (10th Edition). GEN, Boston, MA: Pearson Education, Inc.

Golynskaia, A. (2017). *Monolingual learner dictionary in teaching Turkish as a foreign language: Model, method and principles.* [Unpublished Master's Thesis]. İstanbul University, İstanbul.

Göçen, G. (2016). *The vocabulary in Turkish textbooks prepared for foreigners and the vocabulary in the written expressions of those who learn Turkish as a foreign language.* [Unpublished doctoral dissertation]. Sakarya University, Sakarya.

Göçen, G., & Aydın, E. (2021). Vocabulary Elements in Turkish Reading Books Prepared for Foreigners: Children's Stories Series A1-A2 Example. *International Journal of Turkish Teaching as a Foreign Language, 4*(1), 93-126. https://dergipark.org.tr/en/pub/ijotfl/issue/63209/937945

Göçen, G., & Ataş, N. (2022). Vocabulary Elements in ABC Children's Turkish (A1) Textbook. *Journal of Sustainable Education Studies, 3*(4), 207-225. https://dergipark.org.tr/en/pub/seader/issue/73273/1190190

Göçen, G., & Budak, İ. (2023). Vocabulary Elements in the "Delicious Stories" Series Prepared for Those Learning Turkish as a Foreign Language. *Sakarya Language Journal, 1*(1), 1-28. https://dergipark.org.tr/en/pub/saudil/issue/78688/1299302

Göçen, G., & Buluş, F. (2022). Vocabulary Elements in "Lifelong Turkish" Textbooks for Foreigners. *Journal of Sustainable Education Studies, Special Issue 1* (S1), 70-87. https://dergipark.org.tr/en/pub/seader/issue/69007/1069066

Göçen, G., & Çakır, G. (2022). Vocabulary Elements in the Turkish Reading Book "Yenisey (C1+)" for Foreigners. *Journal of Sustainable Education Studies, Special Issue 1* (S1), 189-225. https://dergipark.org.tr/en/pub/seader/issue/69007/1068278

Göçen, G., & İleri, A. (2022). Vocabulary elements in workbooks for Turkish language learners. *Journal of Sustainable Education Studies, Special Issue 1* (S1), 226-246. https://dergipark.org.tr/en/pub/seader/issue/69007/1070577

Göçen, G., & Yatmaz, H. (2023). Vocabulary Elements in the "ABC Children's Turkish (A2)" Workbooks. *Journal of Sustainable Education Studies, Special Issue 2* (S2), 161-179. https://dergipark.org.tr/en/pub/seader/issue/76542/1270794

Gökdayı, H. (2016). Words and Formulaic Expressions in Teaching Turkish as a Foreign Language, *Turkish Studies, 11*(19), 379-394. http://dx.doi.org/10.7827/TurkishStudies.11131

Gökmen, H. (2021). Vocabulary Elements in Turkish Textbooks for Foreigners: The Case of Van Yüzüncü Yıl University Turkish Teaching Set for Foreigners. [Unpublished Master's thesis]. Fatih Sultan Mehmet Foundation University.

Gülcü, İ. (2015). *Mobile-assisted Turkish vocabulary teaching as foreign language.* (Unpublished Master's Thesis). Çanakkale Onsekiz Mart University, Çanakkale, Türkiye.

Gülerer, S., & Gürel, A. (2020). Teaching idioms in Turkish as a foreign language by textualizing: C1 level. *International Journal of Languages' Education and Teaching,* (8.2), 244-265. doi: 10.29228/ijlet.43559.

Gündoğdu, İ. (2019). *Idioms in textbooks used in teaching Turkish as a foreign language in terms of intercultural communication approach*. (Unpublished master's thesis). Ondokuz Mayıs University, Institute of Educational Sciences, Samsun, Türkiye.

Güngör, H., & Kan, A. (2020). A Scale Development Study for the Determination of Reading Self-Efficacy of Learners of Turkish as a Foreign Language. *International Journal of Language Academy, 8*(3), 49-62. http://dx.doi.org/10.29228/ijla.41758

Gürsoy, A. & Arslan, M. (2011). Method of teaching Turkish to foreigners with educational games and activities. *1st International Conference on Foreign Language Teaching and Applied Linguistic.* P. 5-7, p.177-185. https://www.researchgate.net/profile/Mustafa-Arslan-5/publication/274080313_Egitsel_oyunlar_ve_etkinliklerle_yabancilara_Turkce_ogretimi_Educational_Games_and_Activities_With_Method_of_Teaching_Turkish_to_foreigners/links/5763d07308aeb4b997fc843d/Egitsel-oyunlar-ve-etkinliklerle-yabancilara-Tuerkce-oegretimi-Educational-Games-and-Activities-With-Method-of-Teaching-Turkish-to-foreigners.pdf

Hayran, T. (2019). *An examination of vocabulary in textbooks used in teaching Turkish to foreigners.* (Unpublished master's thesis). Burdur Mehmet Akif Ersoy University, Institute of Educational Sciences, Burdur, Türkiye.

İltar, L. (2014). *Developing and implementing activities with the help of common Arabic-Turkish words in teaching Turkish to foreigners: A Sample from Egypt.* (Unpublished Master's thesis). Gazi University, Ankara, Türkiye.

İnceoğlu, M. (2000). *Attitude Perception Communication*. Ankara: İmaj.

İşcan, A., & Maden, M. N. (2020). The use of songs in enriching the vocabulary of those learning Turkish as a foreign language. *International Journal of Current Approaches in Language Education and Social Sciences, 2* (2), 630-650. doi: 10.35452/caless.2020.33

Jöroskog, K. G. and Sörbom, D. (1993). *Lisrel 8: Structual Equation Modeling with the Simplis Command Language.* Lincolnwood: Scientific Software International, Inc.

Kadan, Ö. F., & Arı, B. (2021). Attitude Scale for Writing Skills in Teaching Turkish as a Foreign Language: A Scale Development Study. *Afyon Kocatepe University Journal of Social Sciences, 23*(4), 1322-1333. https://doi.org/10.32709/akusosbil.887978

Kağıtçıbaşı, Ç. (1999). *New Man and People.* İstanbul: Evrim.

Kara, A. (2010). Development of the attitude scale towards learning. *Electronic Journal of Social Sciences, 9*(32), 49-62. https://dergipark.org.tr/en/pub/esosder/issue/6146/82503

Karakuş Tayşi, E. (2018). Development of the Turkish writing anxiety scale as a foreign language: validity and reliability study. *Turkish Journal of Social Research, 22*(4), 1033-1050. https://dergipark.org.tr/en/pub/tsadergisi/issue/40949/475608

Karasar, N. (1999). *Scientific Research Method.* Ankara: Nobel.

Karatay, H. (2004). *Evaluation of Turkish Textbooks in the Second Stage of Primary Education in Terms of Acquiring Common Vocabulary. (*Unpublished Master's Thesis). Gazi University, Ankara.

Karatay, H. (2007). Teaching Vocabulary. *Gazi Üniversitesi Gazi Eğitim Fakültesi Dergisi*, *27*(1), 141-153. https://dergipark.org.tr/en/download/article-file/77174

Karatay, H. and Kartallıoğlu, N. (2016). The relationship between the attitude of learning Turkish as a foreign language and the acquisition of language skills. *Bolu Abant İzzet Baysal University Social Sciences Institute Journal*, *16*(4), 203-214. doi: 10.11616/basbed.vi.455421

Kardaş, D. (2016). A study on the attitudes and habits of using dictionaries by foreign students learning Turkish. *National Education Journal, 210*, 507-519. https://dergipark.org.tr/en/pub/milliegitim/issue/36140/406042

Kılıç, T. (2017). *Determination of the frequency of use of gerunds in the Turkish teaching sets of Yedi Climate Turkish and Istanbul for foreigners.* (Unpublished master's thesis). Nevşehir Hacı Bektaş Veli University, Institute of Social Sciences, Nevşehir, Türkiye.

Kline, P. (1994). *An Easy Guide to Factor Analysis.* New York: Routledge.

Köse, D. (2007). The effect of teaching Turkish in accordance with the Common Reference Text on success and attitude. *Manas University Journal of Social Sciences, 9* (18), 107-118. https://dergipark.org.tr/tr/pub/manassosyal/issue/49947/640067

Kummuz, Y., & Karakuş, (2022). "Development of effective ınteractive learning scale and Turkish language need scale for students learning Turkish as a foreign language: The case of Georgia". *Ulakbilge, 79*, 1313-1329. doi: 10.7816/ulakbilge-10-79-08.

Maden, A. (2020). Analysis of articles on enriching Turkish vocabulary as a foreign language. *Eurasian Journal of Social and Economic Research (ASEAD), 7*(5), 583-596. https://dergipark.org.tr/en/pub/asead/issue/54658/734412

Maden, A. (2020). Enriching Turkish vocabulary in programs for teaching Turkish as a foreign language. *Journal of History School,* (XLVI), 1822-1857. doi: 10.29228/joh.42788

Maden, A. (2020). Analysis of articles on enriching Turkish vocabulary as a foreign language. *Eurasian Journal of Social and Economic Research, COVID-19 Special Issue 2*, 583-596. https://dergipark.org.tr/en/pub/asead/issue/54658/734412

Maden, S., & Dincel, Ö. (2015). The Effect of Informal Learning Approach on Teaching Turkish Vocabulary as a Foreign Language. *National Education Journal*, *44*(206), 30-53. https://dergipark.org.tr/en/download/article-file/441359

Maden, S., & İşcan, A. (2011). Purpose and problems of teaching Turkish as a foreign language (India sample). *Black Sea Journal of Social Sciences, 3* (5), 23. https://dergipark.org.tr/en/pub/ksbd/issue/16226/169931

Merisuo-Storm, T. (2007). Pupils' attitudes towards foreign-language learning and the development of literacy skills in bilingual education. *Teaching and Teacher Education*, *23*(2), 226-235. https://www.sciencedirect.com/science/article/pii/S0742051X06000722

Merriam, S. B. (2015). *Qualitative research.* (Trans. Selahattin Turan). Ankara: Nobel.

Mustafaoğlu, R. (2018). *Comparison of a1 and a2 level textbooks for teaching English and Turkish as a foreign language in terms of vocabulary.* (Unpublished master's thesis). Istanbul University Institute of Social Sciences, Istanbul, Türkiye.

Myles, F., Hooper, J., & Mitchell, R. (1998). Rote or rule? Exploring the role of formulaic language in classroom foreignlanguage learning. *Language learning*, *48*(3), 323-364. doi: 10.1111/0023-8333.00045

Oduperk, T., & Karanfil, G. (2020-August 17). *Vocabulary teaching in teaching Turkish to foreigners and the methods and implementations used in vocabulary teaching* [Paper Presentation]. Science, Education, Culture Conference (2), 387- 390. https://ibn.idsi.md/vizualizare_articol/109136

Özdemirel, A. Y. (2017). *Evaluation of the words in Turkish and English course books as a foreign language in the context of frequency of use.* (Unpublished master's thesis). Istanbul University Institute of Social Sciences, Istanbul, Türkiye.

Resmi Crahay, S. (2019). *Compiling the words and expressions used by Turkish speakers to be used at A1 level in teaching Turkish as a foreign language and classifying them under communication topics.* (Unpublished Master's thesis). Başkent University Institute of Educational Sciences, Ankara, Türkiye.

Robbins, S. (1994) *Fundamentals of Organizational Behavior* (Trans: Sevgi Ayşe Öztürk) Eskişehir: ETAM Publishing.

Sakallı, N. (2001). *Social Impacts: Who Affects Who and How.* Ankara: İmge.

Sallabaş, M. E. (2008). The relationship between 8th grade primary school students' attitudes towards reading and their reading comprehension skills. *İnönü University Faculty of Education Journal*, *9* (16), 141-155. https://dergipark.org.tr/en/pub/inuefd/issue/8707/108710

Saracaloğlu, A., & Varol, S. (2007). The relationship between physical education teacher candidates' attitudes towards foreign languages, their academic self-concept and their foreign language achievements. *Theory and Practice in Education, 3* (1), 39-59. https://dergipark.org.tr/en/pub/eku/issue/5445/73882

Saydam, M. (2018). *A research on teaching Turkish as a foreign language books in terms of vocabulary teaching strategies..* (Unpublished Master's Thesis). Yıldız Technical University, İstanbul, Türkiye.

Serin, N. (2017). *Comparison of the textbooks prepared for teaching Turkish as a foreign language and the vocabulary of the students who use these books.* (Unpublished doctoral dissertation). Ataturk University Institute of Educational Sciences, Erzurum, Türkiye.

Sevim, O., & Varışoğlu, B. (2023). Self-suffıcıency scale for producer language skılls for foreıgn students learnıng Turkısh: Valıdıty and relıabılıty study. *Fırat University Journal of Social Sciences, 33*(1), 187-202. https://doi.org/10.18069/firatsbed.1214107

Stern, H. H. (1991). *Fundamental Concepts of Language Teaching.* Oxford: Oxford University Press.

Stewens, J. (1996). *Applied Multivariate Statistics For The Social Science* (Third Edition). New Jersey: Lawrence Erlbaum Associates.

Susar Kırmızı, F. (2009). The effect of creative writing exercises based on creative drama method in Turkish lessons on attitudes towards writing. *Creative Drama Journal, 4* (7), 51-68. https://www.researchgate.net/profile/Fatma-Susar/publication/305055156_Turkce_Dersinde_Yaratici_Drama_Yontemine_Dayali_Yaratici_Yazma_Calismalarinin_Yazmaya_Yonelik_Tutuma_Etkisi/links/57ff51d508ae56fae5f5389c/Tuerkce-Dersinde-Yaratici-Drama-Yoentemine-Dayali-Yaratici-Yazma-Calismalarinin-Yazmaya-Yoenelik-Tutuma-Etkisi.pdf

Şentürk, L., & Şentürk, N. (2012). Effect of Cooperative Learning to Teach Vocabulary in Turkish as a Second Language Course. *Journal of Eurasian Studies, 1*(2), 363-380. https://papers.ssrn.com/sol3/papers.cfm?abstract_id=2661291

Şenyiğit, Y. (2020). *Word frequency of oral language and A1-A2 level dictionary in teaching Turkish to foreigners.* (Unpublished Doctorate Dissertation). Sakarya University, Sakarya, Türkiye.

Şimşek, R. (2020a). Compilation-based examination of the vocabulary of B1 level teaching materials and writing vocabulary of B1 level students in terms of various variables. *RumeliDE Journal of Language and Literature Studies,* (Ö7), 152-171. https://doi.org/10.29000/rumelide.808315

Şimşek, R. (2020b). Vocabulary and writing vocabulary of B1 level students and Turkish journey B1 level textbook. *Journal of History School, 48*, 3274-3293. https://search.trdizin.gov.tr/tr/yayin/detay/458712/

Şimşek, R. (2021). Compilation-Based Examination of Materials Used in the Academic Vocabulary of Turkish as a Foreign Language Education. *Çukurova University Journal of Turkic Studies, 6*(1), 345-364. doi: 10.32321/cutad.909625.

Şimşek, R., & Teymur, E. (2023). An Examination of Lexicon in C1 Level Turkish Teaching Sets in Terms of Various Variables. *The Journal of Turk-Islam World Social Studies, 10*(38), 166-177. doi: 10.29228/TIDSAD.72059

Şimşek, Ş., & Demirel, İ. F. (2020). Examination of Vocabulary Teaching/Word Teaching Activities in Turkish Textbooks. *Gümüşhane University Journal of Social Sciences, 11* (AI), 317-330. https://dergipark.org.tr/en/pub/gumus/issue/59344/838380

Tabachnick, B. G, and Fidell, V. L.S. (2001). *Using Multivariate Statistics* (Fourth Edition).Boston: Ally and Bacon.

Tabachnick, B. G. and Fidell, V. L. S. (2013). *Using Multivariate Statistics*, *6.* Boston: Ally and Bacon.

Tarhan, Z. (2020). *The effect of virtual reality tools on vocabulary learning and retention efficiency in teaching Turkish as a foreign language.* (Unpublished master's thesis). Istanbul University Institute of Social Sciences, Istanbul.

Tavşancıl, E. (2010). *Measurement of Attitudes and Data Analysis with SPSS.* Ankara: Nobel Publishing Distribution.

Tezbaşaran, A. (1997). *Likert Type Scale Development Guide.* Ankara: Turkish Psychologists Association Publications.

Tıraşoğlu, C. (2019). *Web 2.0 Tools for Improving Vocabulary in Teaching Turkish to Foreigners: An Example of Kahoot!.* [Unpublished Master's thesis]. Akdeniz University, Antalya, Türkiye.

Tódor, E. M., & Dégi, Z. (2016). Language Attitudes, Language Learning Experiences and Individual Strategies What Does School Offer and What Does It Lack?. *Acta Universitatis Sapientiae, Philologica*, *8*(2), 123-137. https://doi.org/10.1515/ausp-2016-0022

Topçuoğlu Ünal, F., & Köse, M. (2014). Developing an attitude scale towards Turkish lessons: A validity and reliability study. *Bartın University Faculty of Education Journal, 3*(2), 233-249. https://dergipark.org.tr/tr/pub/buefad/issue/3815/51181

Uçgun, D. (2006). Vocabulary development techniques in teaching Turkish to foreigners. *Turkology Research, 20*, 217-227. https://dergipark.org.tr/en/pub/tubar/issue/16961/177128

Ushida, E. (2005). The role of students' attitude and motivation in second language learning in online language courses. *CALICO Journal. 23 (1):*49-78*.* https://www.proquest.com/openview/7897f6e13fa63fdd622e17f42957d75f/1?pq-origsite=gscholar&cbl=18750&diss=y

Üçüncü, G.,& Sakız, G. (2020). Achievement test development process: example of the let's get to know matter unit in the fourth grade of primary school. *Kastamonu Education Journal, 28* (1), 82-94. doi: 10.24106/kefdergi.3440

Üstüner, M. (2006). Validity and reliability study of the attitude scale towards the teaching profession. *Educational Management in Theory and Practice, 45* (45), 109-127. https://dergipark.org.tr/en/pub/kuey/issue/10352/126771

Varışoğlu, B., & Sevim, O. (2022). Development of receptive language skills self-sufficiency perception scale for Turkish language learners as a foreign language. *RumeliDE Journal of Language and Literature Studies,* (28), 72-92. https://doi.org/10.29000/rumelide.1132515

Veneziano L. and Hooper J. (1997). A method for quantifying content validity of health-related questionnaires. *American Journal of Health Behavior, 21*(1), 67-70. https://www.scienceopen.com/document?vid=8254f3c9-3a49-4e44-b430-1643adfc84ae

Yahşi, Ö. (2020). *Determining the basic vocabulary in teaching Turkish to foreigners: Turkish textbooks prepared for foreigners and the vocabulary based on written and oral expression practices of those who learn Turkish as a foreign language.* (Unpublished doctoral dissertation). Sakarya University Institute of Social Sciences, Sakarya, Türkiye.

Yıldırım, A., & Şimşek, H. (2006). *Qualitative research methods in the social sciences.* Ankara: Seçkin.

Yıldız, A., & Gürlek, M. (2019). Attitude scale towards learning Turkish as a foreign language: reliability and validity study. *International Journal of Textbooks and Educational Materials, 2*(1), 104-122. https://dergipark.org.tr/en/pub/ijotem/issue/45591/567208

Yıldız, N. (2016). The effect of writing attitudes and inhibitions on the writing success of students learning Turkish as a foreign language. *Turkish Studies*, *11*(9), 979-992. doi: 10.7827/TurkishStudies.9684

Yılmaz Atagül, Y. (2016). *Comparison of film and story techniques in terms of effectiveness levels in teaching Turkish as a foreign language, proverbs and idioms*. (Unpublished Doctoral Dissertation). Sakarya University Institute of Social Sciences, Sakarya, Türkiye.