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Design process for online websites created for teaching Turkish as a foreign language in web based environments

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In today's world, where online learning environments have increased their efficiency in education and training, the design of the websites prepared for education and training purposes has become an important process. This study is about the teaching process of the online learning environments created to teach Turkish in web based environments, and how the preparation stages should be as per ADDIE design model. Structuring the content, which is outlined and of which the limits are defined in European Language Portfolio (ELP), in accordance with the learning objectives and converting it to an e-learning material is the main approach of the design process. Additionally, the opinion of the users on the Portal for Teaching Turkish as a Foreign Language (YUTÖP) designed and produced as per the model is taken quantitatively and the findings are evaluated in the last part of the research. As a result of the evaluation, it is seen that users have given positive opinion on the learning environments designed as per ADDIE model.

Key words: Teaching Turkish as a foreign language, web teaching, ADDIE, model, content, material.

INTRODUCTION

The design of teaching is the planning of learning activity that will be carried out in accordance with the learning objectives. Studies have been carried out in the field of the design of teaching for many years. While the designs for traditional teaching have been made since World War II, constructivist theory oriented teaching designs based on behavioral theory that have been developed in the period after this. (Clark, 2004; Irlbeck et al., 2006; Rieser, 2001).

Concerning the basis of the teaching design models, more than forty models have been developed since 1970s, and among these models, the model that is most used is ADDIE design model. This model consists of five stages including analysis, design, development, implementation and evaluation processes to solve the problems in teaching (Gustafson and Branch, 2002; Reiser, 2011). While ADDIE design process consists of five stages, each stage is available for development within itself. This design continues to be important today and plays an important role in teaching and game designs (Hirumi et al., 2010a). Together with Gustafson and Branch (2002) teaching designs, there are class,

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product and system oriented materials to classify models and categories according to their own features within the design.

These models have been prepared on the basis of bottom steps of ADDIE model. Besides, Dick and Carey model has been prepared and used to design virtual learning environments (Shih and Yan, 2008). It is seen that many teaching design models that have been developed in recent years are derive from ADDIE model. According to ADDIE model, the flexible structure that is available for development and change in the design process has led to the development of other models inspired by this model. ADDIE model has a flexible structure enabling it to be applied in all learning environments thanks to this feature. The use of the problem oriented and pedagogy based models of teaching designs for both game and teaching purposes especially in virtual world has increased its importance with new technologies (Royle, 2008; Whitton and Hollins, 2008). The teaching design of virtual content is becoming more popular among educators (Johnson et al., 2007; Pfeil et al., 2009; Sanchez, 2009). It is almost impossible to make design with definite and strict rules in teaching designs prepared for virtual environments.

WEB BASED FOREIGN LANGUAGE TEACHING IN TURKISH

In this century, there have been many important developments in teaching foreign language. Learning mother tongue or a foreign language is a process that extends over time (Chomsky, 2014). Especially since the beginning of 20th century, methods have been developed throughout the world to teach many languages, primarily English, to foreigners and teaching designs have been created in line with these methods. Particularly information technologies, which have rapidly developed by the end of twentieth century, started to show its efficiency in the field of education as they did in every field (Şahin and Akçay, 2011). Web based language teaching is a form of teaching a language through computer and internet. Web based distance education is defined as a teaching program that is established by using the technological features of the web and it is supported with computer technology (Khan, 1997). As in all fields, the use of technology in teaching Turkish as foreign language in web based environments increases its efficiency every day. Thanks to language teaching models designed in line with learning objectives, students have the opportunity to learn a foreign language in a more fun and enjoyable environment. Web based language teaching aims to increase interest and curiosity for the country where the language is spoken and for its culture by using linguistic skills as well as visual materials, and create awareness for both the country/culture of the student and the foreign country/culture by leading the student to compare (Biechele, 2006; Macaire et al., 1995). Regardless of being oriented towards language skills or country information, it is true that visual elements motivate learning (Wessel, 2010).

Web based language teaching model and design architecture- ADDIE

The model that will be established with regard to the teaching design, which will be made for teaching Turkish in web based environments, should respond to the below questions.

1. What will we teach
2. How will we teach
3. When will we teach
4. Where will we teach
5. Why will we teach
6. To whom will we teach

The teaching design model that will be established should include answers to the questions earlier raised. The design stages of ADDIE design model leads the researchers and designers in designing Turkish teaching model in web based environments in line with learning objectives.

ADDIE is a design process that consists of five stages, respectively (Analysis, Design, Development, Implementation and Evaluation). While the use of these stages in design of web based language teaching sites differ within language acquisition processes and general characters of the languages, a general design will contribute to teaching many languages in web based environments. As ADDIE design model basically provides a design model that continuously develops and changes, it becomes a suitable model for the design of technology based language teaching sites. The contribution of ADDIE to language teaching models comes from its design structure that can be continuously developed.

As a core model, ADDIE offers proposals which can be developed in accordance with learning objectives in analysis, design, development, implementation and evaluation stages. It is possible to list the design stages in web based language teaching, and order each stage within itself as shown in Figure 1.

Analysis

Analysis forms the first stage in teaching design models that will be made for language teaching. In the planning stage of teaching designs, the teaching environment and special education needs should be analyzed well; educator and students should be informed about the system; cooperative working environments should be developed; the plan to be made should have a flexible

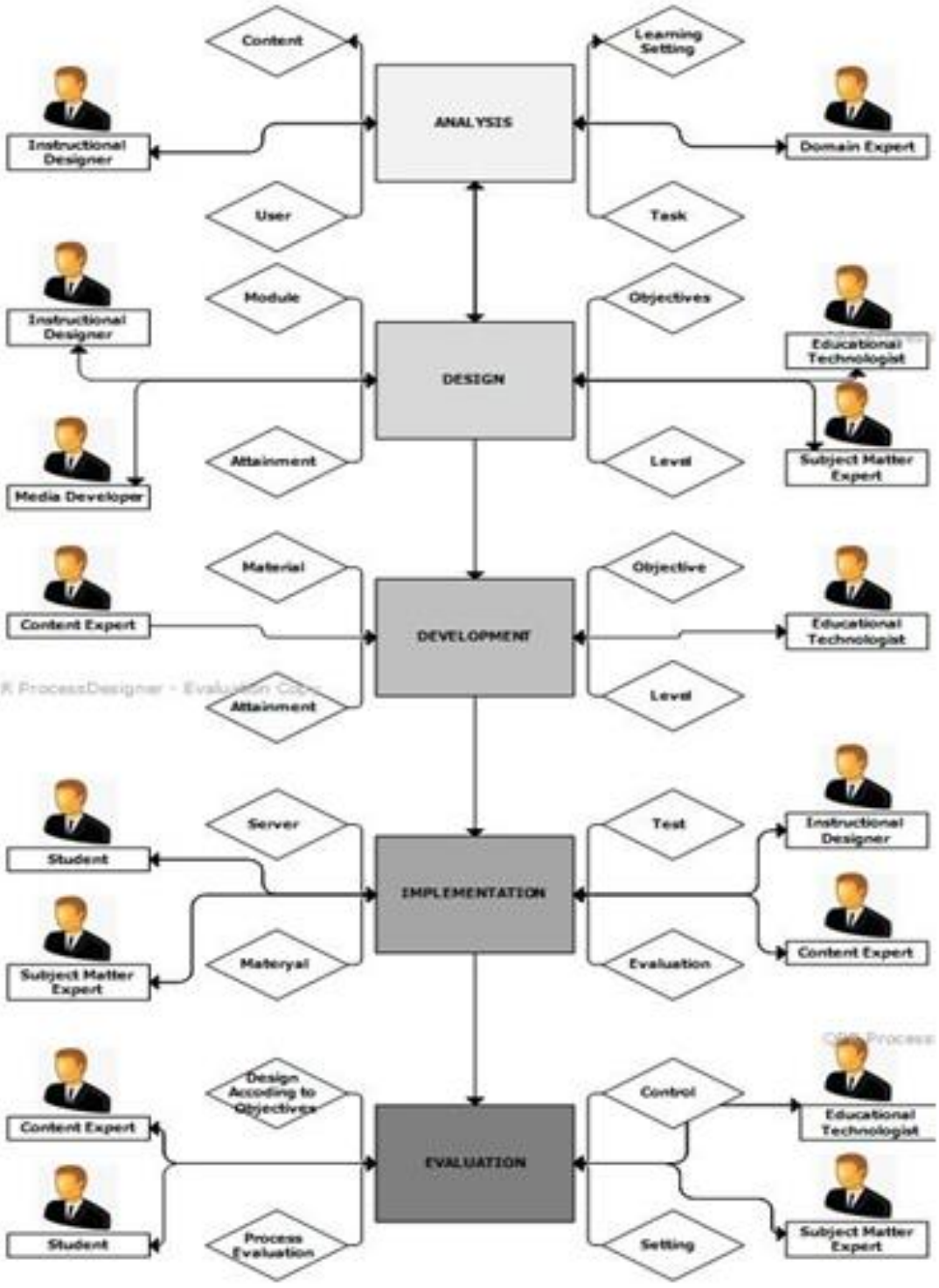

Figure 1. Design stages in web based language teaching.

structure taking into consideration the changing conditions (Overbay et al., 2011). As in traditional teaching, all teaching parameters should be analyzed carefully in the analysis stage of teaching planning in web based teaching, and the designs should be based on sound data. What needs to be done in the analysis part of web based language teaching design consists of four parts, which are teaching environment, task analysis, content analysis and student analysis. It is also possible to add measurement and evaluation analysis to these

four analyses stages.

Teaching environment

Teaching environment analysis consists of two stages which are determination of the need and definition of the learning environment (Smith and Ragan, 1999). Determination of the need for teaching consists of three sections which are difference identification model, problem based model and innovative model, and regarding web based language teaching, it can be benefited from all of these three models in learning environment analysis through their common points. The determination of the need for learning analysis is defined respectively as:

1. Determination of objectives in web based Turkish teaching. Reading, writing, listening and speaking objectives are determined by field experts, academic members, teachers.
2. In accordance with the web based Turkish teaching objectives, it is defined what the user can do or what they cannot do.
3. The required priorities for teaching Turkish in web environment are determined as content and material. First of all, the level of the learning objectives and the learning materials in accordance with these objectives are decided.
4. The need gap is detected for web based Turkish teaching design.
5. Concerning web based Turkish teaching design, the examples in the world are analyzed. And the most suitable design model concerning the target language is adopted.

Determination of the learning environment designs the environment in which web based language teaching will be realized. Since the learning environment is internet and communication products such as computer, tablet or mobile phones, the adequacy of the environment should be determined and defined.

Task analysis

In the stage of designing web based Turkish teaching sites, the task analysis should be made following the teaching environment. Before moving to task analysis an answer should be searched for the question –what is task-. According to Ellis (2003), task is a part of transactions or activity which has pre-determined objective, and is presented in any class. All of the processes between the beginning and end of the teaching design process are indicated as task analysis. Piskurich (2000) lists the features of the task as follows:

The task has a certain beginning and end. It is completed in a short period of time. The completed parts of the task can be observed. Independent from other processes, it is a whole thing by itself. It starts with a performance including design process or special method.

Teaching designer

The teaching designer defines and implements the steps of the model that is used within professional standards in the design of the web based Turkish teaching site. The teaching designer is responsible for defining clearly the planning, analysis, design, development, implementation and evaluation stages, and transmitting these to educational technologists.

Educational technologist

The role of the educational technologist is important in the design process of language teaching sites since educational technologist is responsible for the design of the web environments (interface, teaching materials), and their development in accordance with learning objectives.

Content expert

Content has an important place in creating websites which will be created to teach languages. The content expert should include experienced experts who have trained foreigners in the field of Turkish teaching. Besides having published academic works such as books, articles in this field is one of the features that an ideal content expert should possess. The content expert prepares content in line with the designs which are set into levels as per language teaching strategies. The limits of the content which will be prepared for foreign language teaching sites should be defined in accordance with the learning objectives which are outlined in European Language Portfolio. The content expert determines the gains in line with the four main objectives of language teaching; *reading, writing, speaking and listening*.

Subject matter expert

The subject matter expert contributes to the process with his/her knowledge and experience in teaching foreign language in web based environments. The subject matter expert consults the content expert in setting language teaching to levels as per European Language Platform, defining gains and sub gains in line with learning objectives.

Evaluation expert

The evaluation expert controls the preparation of the e-learning materials that are prepared in accordance with

Table 1. Hello module in language design model.

Module	Gain	Sub gains
Hello	1. He/she gets to know main communication patterns in daily life when listened and read. 2. He/she can repeat and write main communication patterns in daily life when listened. 3. He/she can use the communication patterns related to greeting, introducing himself/herself or another person in daily life in oral and written form.	(i) He/she recognizes language patterns related to greeting, introducing himself/herself and another person in daily life.
		(ii) He/she recognizes language patterns related to greeting, introducing himself/herself and another person in daily life when read.
		(iii) He/she can repeat language patterns related to greeting, introducing himself/herself and another person in daily life when listened.
		(iv) He/she can write correctly language patterns related to greeting, introducing himself/herself and another person in daily life.
		(v) He/she can orally use language patterns related to greeting, introducing himself/herself and another person in daily life.
		(vi) He/she can use in written language patterns related to greeting, introducing himself/herself and another person in daily life.

the objectives and measurement, evaluation stages of each gain and conducts tests to see if the produced models and materials are tools suitable for the objective. The evaluation expert controls the efficiency of the teaching model which is designed with the preliminary end tests. The evaluation expert interprets the data collection and data.

Content analysis

In the stage of establishing a teaching design model, the content analysis should be made in accordance with the learning objectives. While teaching content is divided as per module and topic, it should be prepared by taking into consideration five stages: age range of learners, difficulty of learning the material, type of learning, implementation of different activities in learning and time required for learning (Dick et al., 2001). While making the teaching design for web based language teaching, it should be decided through which teaching materials the content will be presented for teaching. Taking into consideration the main gains of which the limits are defined in European Language Platform, modules and materials are defined in accordance with A-1, A-2, B-1, B-2, C-1, C-2 levels. For A-1 level, the modules are established under the below topics in spiral teaching structure.

1. Alphabet
2. Hello
3. How are you
4. Where are you from
5. Where are you
6. What are you doing
7. My hobbies
8. My profession
9. My family
10. Our house
11. When
12. Shopping
13. How can I go
14. Get well soon
15. Enjoy your meal
16. Have a nice holiday

For each module that is established, the gains of language teaching towards learning objectives are determined. Besides sub-gains required for each gain are defined. Table 1 presents the gains and sub-gains prepared for Hello (meeting) module in language teaching design model prepared for A-1 level language teaching.

Learner analysis

While the part of learner analysis in web based language teaching design does not provide clear data since the target group is not completely and definitely known, it is carried out to determine the needs of the learner in line with learning objectives. The target group which wishes to learn language may consist of students with different age, language, sex, education status and expectations. The web based language teaching design which will be derived from this point should have a functional structure responding to the needs and expectations of all groups. In learner analysis, it should be detected which one of the needs listed by Maslow (1943) (psychological need, safety need, love need, esteem need, self-development

Table 2. Leaner analysis.

Module	Similarities	Differences
Fixed	(i) Emotional skills (ii) Information processing process (iii) Learning conditions (iv) Learning environment (v) Learning materials	(i) Intelligence level and type (ii) Cognitive skills (iii) Psychosocial features (iv) Gender ethnics origin (v) Mother tongue (vi) Second language
Variable	(vi) Mental (vii) Language (viii) Psychosocial (ix) Ethics	(vii) The knowledge of using technology (viii) Learning level (ix) Learning environment conditions (x) Expectations

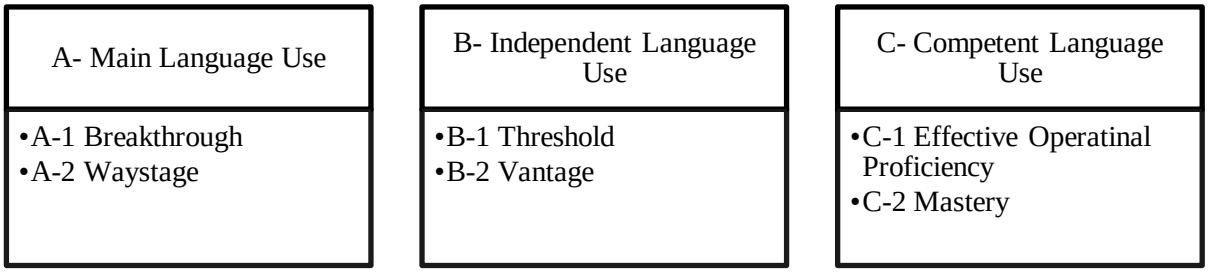

Figure 2. EPL language levels.

need) is preferred in language learning process.

The students who wish to learn language in web based learning environments may have different life experiences, personalities, intelligence and expectations. Thus, designers should gather information on the interests, needs and abilities of the students, and they can use these information in selection of the content and objectives and deciding for the teaching activities (Morrison et al., 2001). It should be taken into consideration that students may have similar and different languages, knowledge or abilities in designing web based language teaching sites. The similarities and differences are defined in the study of Smith and Ragan (1999). Then the fixed and variable ones of these differences are detected. In Table 2, learner analysis is made for web based language teaching design as per the study of Smith and Ragan (1999). The learner analysis is detection of the qualifications that students possess. Knowing the learner both personally and cognitively will allow web based teaching design to be designed in accordance with learning objectives.

Design

In the design stage of web based language teaching sites, “Module, Objective, Gain, Taxonomic Level, Sub Gain” tables are formed. The limits of the content are defined in accordance with the level which is outlined in European Language Portfolio (ELP). ELP defines the language levels as A-1, A-2, B-1, B-2, C-1, C-2 (Figure 2). The modules have four main objectives. These objectives are learning objectives valid for the teaching of all languages. The order that will be established for realizing these objectives in web environment should be:

1. Reading
2. Writing
3. Listening
4. Speaking

The spiral structure that will be established for realizing the earlier mentioned objectives is planned on the web. For example, modules are created for teaching language in A-1 level. Each module is structured within itself with content materials in line with the learning objectives. The modules that are created for A-1 level and the structured version of these models in line with learning objectives are presented in Table 3. Regarding the language teaching in A-1 level, objectives and gain tables are prepared in line with the modules in Figure 3.

Home page

This is the page that the user will see when he/she enters

Table 3. A sample objective realization table is formed for “Alphabet” module.

Name of the module	Objective	Gain	Taxonomic level	Sub gain
Alphabet	Reading	S/he gets to know the letters and vocals in the alphabet	Knowledge	S/he gets to know the upper case letters in the alphabet
			Knowledge	S/he gets to know the lower case letters in the alphabet
	Writing	S/he writes the letters and vocals in the alphabet	Skill	S/he writes the upper case letters in the alphabet
			Skill	S/he writes the lower case letters in the alphabet
	Listening	S/he recognizes the letters and voices in the alphabet when listened	Knowledge	S/he recognizes the letters in the alphabet and differentiates them from the likes of them
			Skill	S/he recognizes the letters in the alphabet and differentiates the vowels and consonants
	Speaking	S/he recognizes the letters and vocals in the alphabet and voices them	Skill	S/he can voice the letters in the alphabet
			Ability	S/he can voice the letters in the alphabet within context

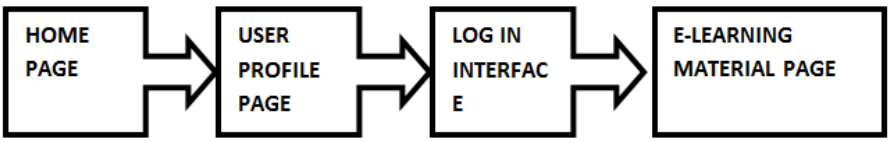

Figure 3. Design of the web based foreign language teaching sites.

the website. This page provides general information about the site. It informs the student in general terms on the level of the language which is aimed to be taught and for which users it is appropriate.

User profile page

It is the page which includes information specific to the user. The frequency of visiting the site, the day and hours the user visits the site are seen in the profile page. Besides communication with other users, consultancy support are provided from the profile page.

Teaching interface page

The user interface should provide an independent learning environment for the student in web based language teaching sites. As seen in Figure 4 (http:// yutop.auzefim.com/turkce/A1.html) the parts should be included together with international computer instructions towards language teaching.

1. Level information (A1, A2, B1, B2, C1, C2)
2. In the interface page that is used, there should be an instruction showing for what language teaching is designed.

i). For reading texts, book
ii). For speaking sections, microphone
iii). For listening sections headphones
iv). For writing sections, pencil icons may be used.

3. The interface should include forward or back icons for the users to go to the previous page or next page.
4. There should be refresh icon for the user to update the activity in the page.
5. There should be profile view which includes the picture of the user.

Figure 4. Teaching interface page.

Table 4. E- learning materials learning objective table.

Material	Reading	Listening	Speaking	Writing
Video film	+	+	-	-
3D animation	+	+	-	+
Drag and drop	+	+	-	-
Read and write	+	-	-	+
Listen and read	+	+	-	-
Interactive gallery	+	+	-	-
Matching game	+	+	-	+
Reading text	+	-	-	-
Dropdown list	+	+	-	+
Vocabulary box	+	-	-	-
Listen read and write	+	+	-	+
Listen and drag		+	-	-
Watch and write	+	+	-	+
Multiple choice	+	+	-	-
Audio puzzle	+	+	+	-

6. There should be a dictionary icon which will enable that the user learns the meaning of the word s/he wishes to learn in target language without leaving the page.
7. The icons that show the learning steps of the current level and module order should be place in the top of the page or next to the page.

Material page, e-learning materials which are produced in accordance with learning objectives should be designed differently from each other in the design process, and should be produced accordingly. Taking into consideration the opportunities provided today by the computer technology, teaching materials such as video films, 3D animations, drag and drop, read and write, listen and read, interactive gallery, matching game, reading texts, dropdown list, vocabulary box, listen read and write, listen and drag, watch and write, multiple choice and audio puzzle can be prepared for web based language teaching. Table 4 shows for which learning objectives the materials are prepared. The software coding of the materials is realized by taking the content prepared in accordance with the materials from the content expert as per course level. The software language (Java, Action Script, HTML, etc.) is selected by the educational technologist. The e-learning materials which will be prepared as per the selected software language are

coded. In the process of coding it should be taken into consideration that material will be working in different devices (Computer, smart phones, tablet, etc.). Furthermore the view and measures of the material should be supported with learning objectives and international computer instructions.

Development

After the web environments which were prepared for web based language teaching and designed, materials are produced in accordance with the designs. The materials which the teaching designer, content expert and educational technologist decide to use in the design state in accordance with learning objectives are produced. The features that should be possessed by the materials:

1. For which main objectives in language teaching the e-learning material is prepared?
2. How are the e-learning materials listed taxonomically?
3. Can the gains obtained in e-learning materials be measured and evaluated in measurement and evaluation stage?
4. Can the student use the e-learning materials that are prepared on his/her own?
5. Can the e-learning platform that is established offer the student a rich and enjoyable learning environment?

The table of the materials prepared for web based language teaching sites such as video films, 3D animations, drag and drop, read and write, listen and read, interactive gallery, matching game, reading texts, dropdown list, vocabulary box, listen read and write, listen and drag, watch and write, multiple choice, audio puzzle in accordance with learning objectives is given in Table 4.

As it can be seen in Table 5, e-learning materials that are prepared for web based language teaching are designed in accordance with language learning objectives. The materials which are designed with this purpose are also placed taxonomically in the order of learning and introduced to learning interface. For example, in “Listen, Read and Write” material, the objective is prepared in three different levels for the student to read, write and listen “Nation, Nationality and Language” concepts. In the below table (Table 4) it is seen how “Listen, Read and Write” material should be prepared taxonomically.

Level of knowledge

In line with the learning objectives, the user rewrites the text that he/she listens, and sees an example of it in “Listen, Read and Write” material that is structured for A-1 level. If user is successful, he/she acquires writing within knowledge level.

Level of skill

In line with the learning objectives, the user rewrites the text that he/she listens in “Listen, Read and Write” material that is structured for A-1 level without looking at the example. If user is successful, he/she acquires writing within skill level.

Level of ability

In line with the learning objectives, the user rewrites the name of the countries and language spoken in the countries by only looking at the flags and without listening, in “Listen, Read and Write” material that is structured for A-1 level. If user is successful, he/she acquires writing on this section within ability level. As it is seen in the sample material, the e-learning materials that are prepared in accordance with learning level (A-1, A-2, B-1, B-2, C-1, C-2) are introduced to the learning environment in a pedagogical order, and it is provided that the user acquires language with these materials.

Implementation

For the learning platform that is prepared for web based language teaching to be used by users smoothly, the implementation stages are listed as:

First stage: It should be tested if all produced materials work smoothly in all e-learning environments. The transitions and connections between the materials should function correctly. E-learning materials should be tested visually in terms of picture quality, resolution, colours for the users to use the learning platform smoothly. In addition to this, it should be tested how the produced materials are used in different devices (Computer, Tablet, Mobile Phone) and how they are used in different browsers through internet (Internet Explorer Mozilla Firefox, Google Chrome etc.) and in different operating systems (Windows, Mac vb.). If the e-learning platform that is prepared is to be opened for use through learning management system (LMS) e-learning platform should comply with SCORM (Sharable Content Object Reference Model)’. The compliance of the e-learning platform that is prepared with SCORM will allow that it is used in all learning management systems. The user test should be evaluated by taking into consideration variables such as nationality, race, age, gender, education status. Changes can be made in the platform that is prepared as per the approaches of the users concerning the web based language teaching platform. The opinion of the students which will be received concerning the materials that are

prepared, the facility of the use of these materials and access to these materials will provide important information to the ones who prepared the e-learning environment. In the implementation stage, the opinion and approaches of the users can be received on the below topics:

1. Learning environment,
2. Content,
3. E-learning materials,
4. Learning process.

The feasibility of the approach tests should be suitable for the time, person and managers test evaluation experts. Tests should not restrict teaching, they should be objective and the difficulty level should be arranged. (Lee, 2000). The control of all informatics related substructures that will ensure the smooth use of the teaching portal by users should be tested in the implementation stage.

Evaluation

Evaluation consists of two stages in ADDIE design model. While the teaching design process is evaluated in the first stage, the results are evaluated with the information received from students in the second stage. In the evaluation stage, the design process should be evaluated, and the produced learning environment should be addressed as a whole. Answers are searched for the below questions:

1. Has the learning environment, which is aimed in teaching design, been created?
2. Has web based language teaching environment been created in accordance with ADDIE design model?
3. Has the *analysis, design, development and implementation* stages which are provided in ADDIE been covered in accordance with teaching design?
4. Has the web based language teaching site been designed in accordance with language teaching objectives?
5. Have materials been produced in the designed web based language teaching site for gains according to learning objectives?
6. Has a learning step been formed pedagogically between the materials produced in accordance with the gains aimed in language teaching?
7. Do the e-learning materials which are produced in accordance with language teaching objective work smoothly?
8. Has the e-learning environment been subject to user tests in accordance with foreign language teaching objectives?

The controls of the web based language teaching site that is created are made at this stage as per the questions earlier raised. Besides the effect, efficiency of the learning environment as well as its compliance with objectives are discussed, and necessary adjustments are made in e-learning environment. Necessary adjustments are made as per the opinion of field experts, educational technologists and users.

User opinions

In this part of the research, the opinions of 108 students from 21 countries studying in bachelor's, master's and doctoral programs in Istanbul University have been studied for the Portal for Teaching Turkish as a Foreign Language, abbreviated as YUTÖP, and designed and produced as per ADDIE model and the results have been discussed.

Purpose of the research

The purpose of this study is to determine the user opinions on the learning portal, shortly referred to as YUTÖP and prepared for teaching Turkish as a foreign language in web based environments, in terms of instructiveness, usability, variety of materials and measurement-assessment, as per main language learning objectives.

METHODOLOGY

Scanning model has been used in this study. The quantitative data obtained has been analyzed through statistical methods. The findings related to percentage, frequency and standard deviations are shown in table and interpreted accordingly.

Sampling

The sample for the research consists of 108 foreign students coming from 21 different countries and studying in various faculties, institutes and directorates of Istanbul University in the academic year 2015 to 2016. All of the students included in the sample are foreign students who have learnt Turkish as a foreign language and who continue to learn it.

Data collection tool

Likert type survey consisting of 10 questions with three options prepared by the researcher has been used in the collection of the data for the research. The data obtained in opinion survey has been analyzed with statistical transactions, and it has been converted to frequencies and percentages. The opinions of the students have been discussed in the result section of the research.

Analysis of data

The data collected for this research has been analyzed and frequencies, percentages and standard deviations have been obtained through the use of SPSS for Windows 22.00 statistical package program in the computer.

Table 5. Distribution as per the demographic characteristics of the people forming the sample of the research.

Characteristics		f	Percentage (%)
Sex	Female	58	53.70
	Male	50	46.30
Educational status	Bachelor	61	56.48
	Master	33	30.56
	Doctorate	14	12.96

Table 6. Distribution of the nationalities of the users who have participated in the research.

Variable	f	Percentage (%)
Germany	2	1.85
Austria	5	4.63
Azerbaijan	9	8.33
Bulgaria	4	3.70
Morocco	2	1.85
Holland	4	3.70
Iraq	8	7.41
Iran	8	7.41
Spain	1	0.93
Kazakhstan	12	11.11
Kyrgyzstan	10	9.26
Lebanon	2	1.85
Egypt	1	0.93
Pakistan	3	2.78
Romania	4	3.70
Russia	5	4.63
Syria	15	13.89
Saudi Arabia	2	1.85
Turkmenistan	6	5.56
Ukraine	4	3.70
Greece	1	0.93
Total	108	100

FINDINGS

The findings related to the demographic characteristics of the people forming the sample of the research are given in Table 5. When the table is analyzed, it is seen that 53.70% of the people who are included in the research are female while 46.30% of them are male. Concerning the education status of the people who are included in the research, it is seen that 56.48% of them are students of bachelor's programmes, 30.56% of them are students of master's programmes, and 12.96% of them are students of doctoral programmes. The nationalities of the people who have participated in the research are given in Table 6.

When the countries of the users who have participated in the research are examined, it is observed that the highest participation is from Syria with 15 students. Syria is respectively followed by Kazakhstan, Kyrgyzstan and Azerbaijan. It is seen that the least participation to the research is from Spain, Egypt and Greece. The findings related to the general distribution of the responses given by the participants of the research in the survey are given in Table 7.

68.5% of the participants of the research have responded "I agree", 3.7% of them have responded "I do not agree" and 27.8% of them have responded "I am indecisive" to the item "A learning environment in line with the main language learning objectives (Reading, Writing, Speaking, Listening) has been established in YUTÖP created by ADDIE design model." As a conclusion, it is seen that the participants of the research have agreed with the item "A learning environment in line with the main language learning objectives (Reading, Writing, Speaking, Listening) has been established in YUTÖP created by ADDIE design model."

65.7% of the participants of the research have responded "I agree", 4.6% of them have responded "I do not agree" and 29.6% of them have responded "I am indecisive" to the item "The learning materials used in YUTÖP created by ADDIE design model have been designed and produced for realizing main learning objectives." As a conclusion, it is seen that the participants of the research have agreed to the item "The learning materials used in YUTÖP created by ADDIE design model have been designed and produced for realizing main learning objectives."

58.3% of the participants of the research have responded "I agree", 4.6% of them have responded "I do not agree" and 37.4% of them have responded "I am indecisive" to the item "There is sufficient material for reading objective in YUTÖP created by ADDIE design model". As a result, it is seen that the participants of the research have agreed to the item "There is sufficient material for reading objective in YUTÖP created by ADDIE design model".

67.6% of the participants of the research have responded "I agree", 16.7% of them have responded "I do not agree" and 15.7% of them have responded "I am indecisive" to the item "There is sufficient material for writing objective in YUTÖP created by ADDIE design model". As a result, it is seen that the participants of the research have agreed to the item "There is sufficient material for writing objective in YUTÖP created by ADDIE design model".

46.3% of the participants of the research have responded "I agree", 15.7% of them have responded "I do not agree" and 38% of them have responded "I am indecisive" to the item "There is sufficient material for listening objective in YUTÖP created by ADDIE design model.". As a conclusion, it is seen that the participants of the research have agreed to the item "There is sufficient material for listening objective in YUTÖP created by

Table 7. Findings related to the general distribution of the responses given by the participants of the research in the survey.

S/N	Items of survey	Variable	f	Percentage (%)	Standard deviation
1	A learning environment in line with the main language learning objectives (Reading, Writing, Speaking, Listening) has been established in YUTÖP created by ADDIE design model	I agree	74	68.5	0.55222
		I do not agree	4	3.7	
		I am indecisive	30	27.8	
		Total	**108**	**100.0**	
2	The learning materials used in YUTÖP created by ADDIE design model have been designed and produced for realizing main learning objectives	I agree	71	65.7	0.57735
		I do not agree	5	4.6	
		I am indecisive	32	29.6	
		Total	**108**	**100.0**	
3	There is sufficient material for reading objective in YUTÖP created by ADDIE design model	I agree	63	58.3	0.58686
		I do not agree	5	4.6	
		I am indecisive	40	37.4	
		Total	**108**	**100.0**	
4	There is sufficient material for writing objective in YUTÖP created by ADDIE design model	I agree	73	67.6	0.76727
		I do not agree	18	16.7	
		I am indecisive	17	15.7	
		Total	**108**	**100.0**	
5	There is sufficient material for listening objective in YUTÖP created by ADDIE design model	I agree	50	46.3	0.72934
		I do not agree	17	15.7	
		I am indecisive	41	38.0	
		Total	**108**	**100.0**	
6	There is sufficient material for speaking objective in YUTÖP created by ADDIE design model	I agree	46	42.6	0.92726
		I do not agree	46	42.6	
		I am indecisive	16	14.8	
		Total	**108**	**100.0**	
7	The measurement and assessment questions at the end of units in YUTÖP created by ADDIE design model have been prepared in line with the topics studied	I agree	74	68.5	0.70078
		I do not agree	13	12.0	
		I am indecisive	21	19.4	
		Total	**108**	**100.0**	
8	There is sufficient visual material for me to learn Turkish in YUTÖP created by ADDIE design model	I agree	76	70.4	0.66863
		I do not agree	11	10.2	
		I am indecisive	21	19.4	
		Total	**108**	**100.0**	
9	Turkish learning materials work smoothly in YUTÖP created by ADDIE design model	I agree	76	70.4	0.45875
		I do not agree	32	29.6	
		I am indecisive	0	0	
		Total	**108**	**100.0**	
10	I can learn and improve Turkish with YUTÖP created by ADDIE design model	I agree	81	75.0	0.57125
		I do not agree	6	5.6	
		I am indecisive	21	19.4	
		Total	**108**	**100.0**	

ADDIE design model."

42.6% of the participants of the research have responded "I agree", 42.6% of them have responded "I do not agree" and 14.8% of them have responded "I am indecisive" to the item "There is sufficient material for speaking objective in YUTÖP created by ADDIE design model." As a conclusion, it is seen that the participants of the research have not agreed and they have been indecisive on the item "There is sufficient material for speaking objective in YUTÖP created by ADDIE design model."

68.5% of the participants of the research have responded "I agree", 12% of them have responded "I do not agree" and 19.4% of them have responded "I am indecisive" to the item "The measurement and assessment questions at the end of units in YUTÖP created by ADDIE design model have been prepared in line with the topics studied." As a result, it is seen that the participants of the research have agreed to the item "The measurement and assessment questions at the end of units in YUTÖP created by ADDIE design model have been prepared in line with the topics studied."

70.4% of the participants of the research have responded "I agree", 10.2% of them have responded "I do not agree" and 19.4% of them have responded "I am indecisive" to the item "There is sufficient visual material for me to learn Turkish in YUTÖP created by ADDIE design model." As a result, it is seen that the participants of the research have agreed to the item "There is sufficient visual material for me to learn Turkish in YUTÖP created by ADDIE design model."

70.4% of the participants of the research have responded "I agree", 29.6% of them have responded "I do not agree" to the item "Turkish learning materials work smoothly in YUTÖP created by ADDIE design model". As a conclusion, it is seen that the participants of the research have agreed to the item "Turkish learning materials work smoothly in YUTÖP created by ADDIE design model".

75% of the participants of the research have responded "I agree", 5.6% of them have responded "I do not agree" and 19.4% of them have responded "I am indecisive" to the item "I can learn and improve Turkish with YUTÖP created by ADDIE design model." As a result, it is seen that the participants of the research have agreed to the item "I can learn and improve Turkish with YUTÖP created by ADDIE design model."

Conclusion

Different teaching design models can be used in creating web based language teaching sites. This study has addressed the design staged and process structure of the web based language teaching site as per ADDIE design model. Teaching foreign language in web environments is becoming popular in parallel to technological developments. It is important that the background preparation and production stages of language teaching portals that will be created in this framework are based on scientific basis and provided to the users.

In the first section of the study, analysis stage is addressed. In the analysis stage, respectively *teaching environment, task analysis, content analysis and measurement-evaluation analysis* have been made. In the design stage, levels such as A-1, A-2, B-1, B-2, C-1, C-2 have been defined as per ELP and according to these levels, the learning objectives are examined through a sample module. The gains and sub gains which are in accordance with knowledge, skill and ability levels as well as reading, writing, listening and speaking objectives, accepted as four main learning objectives in language teaching, are shown in a sample table. Explanatory information is provided on how *home page, user profile page, log in interface and e-learning material pages* should be for the design to be made through web. In the development section, material production has been addressed and e-learning materials which will be produced in accordance with gains and sub gains defined as per learning objectives (*video films, 3D animations, drag and drop, read and write, listen and read, interactive gallery, matching game, reading text, dropdown list, vocabulary box, listen and read, listen and drag, watch and write, multiple choice, audio puzzle*) have been defined. Besides it is shown in the sample table for which learning objective these materials are prepared and produced.

The produced materials are listed taxonomically as *knowledge, skill and ability* level. It is explained how the material should be for each level. In the implementation section, the test stages of the web based language teaching environment visually, in terms of picture quality, resolution, colours are addressed for the users to use the learning platform smoothly. In addition to these, it is addressed that tests should be carried out to see how the produced materials are used in different devices (Computer, Tablet, Mobile phone) and in different browsers through internet (Internet Explorer Mozilla Firefox, Google Chrome etc.) and different operating systems (Windows, Mac etc).

In the evaluation stage, all stages of the design architecture and web based language teaching portal created according to this architecture are controlled. In the assessment stage, all stages of the design architecture and the web based language teaching portal created in line with this architecture have been controlled and user opinions have been obtained. When the obtained data is analyzed, it is seen that the users agree that the learning materials produced as per ADDIE design model create a learning environment in line with the main language learning objectives. In addition to this, users have given positive opinion on the learning environment's being designed in accordance with the main language learning objectives. It is seen that the

users have found the materials for reading, writing and listening objectives in the designed and produced model sufficient yet have given negative opinion and they have been indecisive on the materials for speaking objective.

According to this result, it is seen that while designing teaching modules, different materials should be produced for achieving results in speaking. The participants have agreed on the compliance of the measurement and assessment questions in YUTÖP with the learning objectives and topics studied. As per the opinion of the users, it is seen that foreign language can be efficiently thought in web based environments. This view is supported by the researches of (Oxford, 1994; Adıyaman, 2002; Pilancı, 2015; Stephenson, 2001; Owens, 2015; Shrum and Glisan, 2015). It can be said that YUTÖP which is designed and produced according to ADDIE design model is a suitable language learning environment for foreign users who wish to learn Turkish through web.

Conflict of interests

The author has not declared any conflicts of interest.

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