THE BLENDED LEARNING ENVIRONMENT
ON THE FOREIGN LANGUAGE LEARNING PROCESS:
A Balance for Motivation and Achievement

Bahar ISIGUZEL, Ph.D.
Nevsehir Hacı Bektas Veli University
Faculty of Education
Dept. of Foreign Language Education
Nevsehir, TURKEY

ABSTRACT

The purpose of this study is to determine the effects on motivation and success within the application of blended learning environments in the foreign language class. The research sample is formed by third grade students studying in the tourism and hotel management programs of the faculty for tourism and the faculty of economics and administrative sciences at the Nevsehir Hacı Bektas Veli University (Turkey) in fall semester of the 2012-2013 academic year.

The research group consists of 62 students and there of 35 students belong to the experimental group and the other 27 persons belong to the control group. While the experimental group was subject to 14 hours online and 6 hours traditional face to face learning, the control group was subject to only 6 hours traditional face to face learning. The research has been completed after a 10 week application. The data on the research have been collected with German course achievement tests via the German Language Learning Motivation Scale.

The results reveal that the experimental group of students attending the German classes in blended learning environments has more success and higher motivation compared to the control group attending German language classes in the traditional learning environment. Even if the learners achieve certain success and motivation findings in the classroom and face to face environments performed along with teaching-learning activities mainly in control of the instructor, the success and motivation effect of the blended learning environment could not be achieved.

Keywords: Blended learning, foreign language learning, motivation, success.

INTRODUCTION

In these days where we experience the information age, it can be seen, that our traditional education methods are insufficient to supply the growing education needs of individuals. Literals don't cut across in the traditional education environment of formal education, where the same activities are carried out by teachers and students in the same time and same environment.

108

One of the main goals of foreign language teaching is especially to comprehend the students how to approach to the accessed information. That the awaited success and motivation in foreign language lectures remained incapable in traditional teaching methods revealed the adoption of the learner based approach and the need to improve the students autonomous learning skills. In the scope of broad education, in distance learning environments, learning can be actualized by various ways as mail, radio and online learning. Distance learning environments are mediums, where no common physical places are in need for the learner and the instructor, and the learner is responsible for its own learning in the learning process (Johnson & Steven, 2003).

It has been given, that the activities carried out solely have not satisfied the learners even in these environments and that the face to face interactions have been especially the most lacking matters in classes (Bonk & Graham, 2004). The effort to enrich the traditional learning environments and to present the learner wide learning grounds, set forward that online learning is possible in formal education. Thus, the how-to-combine the face to face and online learning opportunities brought the blended learning concept forward. Blended learning means in general the harmonized combining of face to face and online (e-learning) environments to present the learner a large and effective learning process (Collins & Moonen, 2001; Kerres & De Witt, 2003; Graham, 2006). Blended learning combines the best features of the in-class teaching and e-learning, encourages active and self-directed learning and shortens class time. (Garnham & Kaleta, 2002). Singh (2003) discussed blended learning in certain learning aspects. One of these learning aspects is the blending of online and offline learning. At this place, online means the education via internet; offline means the education in traditional classroom matters. In the process of blended learning, a flexible and broad education ground is provided by materials, which belong to both of the learning environments and are applied together. Littlejohn & Pegler (2007) define the common utilization of face to face environments with technologies like computers, internet and web as blended learning. According to Rasmussen(2003) blended learning is a distance education method using technology combined with traditional education and teaching.
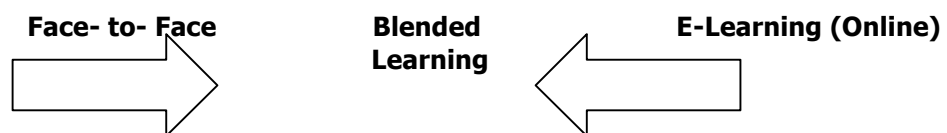
Face- to- Face   Blended   E-Learning (Online)
                      Learning

Figure: 1
Blended Learning Environment

Blended learning environments can be designed as diachronic and synchronic learning grounds. There is no space and time limitedness available in diachronic education activities applied in diachronic environments. For this reason, determining the most proper place and time to take part in the activities becomes important for the learner. Documents, web sites, web and computer based modules, tests and surveys, online learning groups and discussion groups can be counted as broad used diachronic education mediums. Synchronic learning activities offer learners real-time education process as in face to face environments. In other words, synchronic learning grounds require the participants to get online synchronously (Singh & Reed, 2001; Sauter & Sauter, 2002; Hofmann, 2004).

There are significant arguments in literature regarding the assistance and strong ways of blended learning (Garrison & Anderson, 2003; Conrad & Donaldson, 2004; Ross & Gage, 2006; Littlejohn & Pegler, 2007). Garrison & Vaughan (2007) remark that blended learning approaches and designs increase the learning experiences at a significant level and that more effective learning-teaching processes are gained within the joint use of face to face and online learning. In the process of blended learning, it can be said that the main role of the learner is to materialize learning, and that its main task is to manage its own learning process. In this context, it can be said that blended learning has contribution in providing learner centered learning environments and supports the progress of autonomous learner skills.

The teaching method in the foreign language learning process expects that the learner experiences successful learning, meets positive learning moods and provides motivation hidden in success feelings as a result. Individuals with contrary experiences encounter despair, discomfort, negative emotions and inevitable failure at the end of the process. In the process of foreign language learning, even maintaining a positive attitude to that language comes across as one of the most important factors to be achieved. On the contrary, at the end of a negative attitude process, foreign language losses can be caused even at short breaks (Albayrak, 2006; Albayrak & Serindağ, 2007).

There is a direct correlation between the cognitive functions of the new information processing of the language learner with the affective dimension. Cognitive and affective dimensions confront us in learning processes as two strong partners working together (Metzig & Schuster 1982). For this reason, the language learners emotions, desires, goals etc. towards the learned foreign language, come to the forefront as substantial factors. At this point, the motivation gains importance, especially its effects on the success in educational scope.

Motivation holds much information of our inner lives. It supports us as an impulse to direct our behaviors and reach our goals (Kupfermann & Schwartz 1996). Motivation as function is considered as a power, which lets the individual increase it energy and sustains its active condition (Berelson & Steiner, 1969). In terms of pedagogics, the learner develops an individual attitude relevant to its own learning behavior in the learning environment and decides whether to participate in the learning process or not (Ipfling, 1974).

As seen in all fields, motivation is qualified as „the key to success"in the foreign language learning process in foreign language education (Apeltauer, 1997). There is a cyclical relation between motivation and learning performance. Positive emotions (motivation) affect the cognitive process in a positive way; the cognitive process transmits to the new information; and the new learned information strengthens the positive emotions (motivation) (Kullmann & Seidel, 2000).

Motivation, as a strong requirement of foreign language learning, is seen as a smooth passage with an adequate learning environment to the target language, and by maintaining thus, as a guarantee of a long term learning success (Müller, 1995). Based on all these knowledge, the aim of this research is to determine the effect of blended learning in the foreign language class (German) on the academic success of the students and on the motivation oriented at the lectures. The sub-goals of this study are;

> - **Is there a significant difference before and after the implementation by means of success in the foreign language classes (German) between the experimental group (blended learning environment) and the control group (traditional learning environment) available?**
> - **Is there a significant difference before and after the implementation by means of motivation towards the foreign language classes (German) between the experimental group (blended learning environment) and the control group (traditional learning environment) available?**

METHOD

Research Model

In this study, analyzing the effects on motivation and success within the application of blended learning environments on university levels in foreign language classes (German) of students studying in the tourism and hotel management program, a research model with pretest and posttest control groups in scope of quasi experimental design has been used.

Study Group

The population of the study is constituted by third grade students of the tourism and hotel management programs of Turkish universities in fall semester of the 2012-2013 academic years, and who have chosen German as an optional foreign language. According to this, the research sample is formed by third grade students studying in the tourism and hotel management programs of the faculty for tourism and the faculty of economics and administrative sciences at the Nevsehir Hacı Bektas Veli University (Turkey) in fall semester of the 2012-2013 academic year. The research group consists of 62 students and thereof 35 students belong to the experimental group and the other 27 persons belong to the control group.

A chi-square analysis has been made, since the gender distribution was required to indicate similar characteristics before the application of the work group. Gender related frequencies and percentage distributions have been presented with chi-square results on Table: 1.

Table: 1
Frequency and Percentage Distributions with Chi-Square Results of the Control-Experimental Group related to Gender (N:62)

Gender	Frequency-Percentage	Female	Male	
Experimental	f	20	15	**Pearson Chi-Square:**
	%	64.5	48.4	
Control	f	11	16	X^2: **1.64, p= .20**
	%	35.5	51.6	
Total	f	31	31	
	%	100	100	

As seen on Table 1, a significant relation ($p>.05$) between the control-experimental groups and gender has not been found. In other words, it has been determined, that both groups indicate similar characteristics in the point of gender distribution.

111

Data Collection Device

The data on the research have been collected with German course achievement tests via the „German Language Learning Motivation Scale". The motivation scale developed by Çam et al. (2010) consists of 20 articles and uses the Five Point Likert Scale as „Strongly Agree", „Agree", „Neutral", „Disagree", „Strongly Disagree".

The Cronbach Alpha Reliability Coefficient of the scale has been determined as .82. The Cronbach Alpha Reliability Value for this study has been calculated for the overall study as 0.71.

As to the German achievement test, it's an achievement test aiming to evaluate the expected foreign language level of the students (A1 Level: Common European Framework of Reference for Languages, beginner level) and is prepared by the researcher according to the topics in the German course book.

The motivation scale and the German Language Achievement Test have been performed as a pretest before the experimental process and as a posttest after the accomplishment of the experimental process.

Application

The study has been performed in fall semester of the academic year 2012-2013 with the participation of the third grade students studying in the tourism faculty and the faculty of economics and administrative sciences at the the Nevsehir Hacı Bektas Veli University in 10 weeks at vocational German language lectures.

The online education medium of the course has been used for the online part of the blended learning environment. The reason of the selection of the course books online medium is the expectation of easy use after a short-training given to the students.

Before the execution has started, a one week training concerning online application has been given to the experimental group. During this training, registrations to online mediums and example activities have been provided. In the course of the ten week term, the students had the opportunity to make use of the computer labs in their faculties.

Whereas the experimental group received blended learning in the application, the control group received traditional face to face learning. While the experimental group was subject to 14 hours online (2 hours weeknights and 2 hours weekend days) and 6 hours traditional face to face learning, the control group was subject to only 6 hours traditional face to face learning. The research has been completed after a 10 week application.

Group: Experimental Group   -   Control Group
Method: Blended Learning Environment   - Traditional Learning Environment
Weekly Course: 14 hours+ 6 hours   6 hours
Research Duration: 10 weeks

Figure: 2
Application Plan of Research   112

In the online learning environment of the experimental group, the following took part each week: videos related to the topics, web sites, topic scanning tests, interactive exercises, individual and group activities, online exercises, group works described as wiki, chat rooms, blog activities. As to the face to face environment of the experimental group, the following took part; presentations, lectures given with beamers, catechizes, discussions and instructions. In the online part of the experimental groups blended learning process, the German Language Course Online Lecture Example performed weekly by the students, has been given below.

Lernziele: (Learning Goals)

- grüßen und verabschieden
- sich und andere vorstellen
- über sich und andere sprechen
- Zahlen bis 20, Telefonnummer und E-Mail-Adresse sagen
- buchstabieren
- über Länder und Sprachen sprechen

Machen Sie die Online-Übungen (Übung 1 - Übung 4).

Online-Übungen: Kapitel 1 - Guten TagURL/Link
Wie heißen diese Wörter in Ihrer Sprache? (Aufg. 1b)

Wiki: Wörter in Ihrer Sprache
Sammeln Sie noch mehr deutsche Wörter im Kurs. (Aufg. 1c)

Wiki: noch mehr deutsche Wörter Sammeln Sie im Kurs deutsche Namen oder bekannte   Personen aus Deutschland,   Österreich und der Schweiz. (Aufg. 2c)

Wiki: deutsche Namen oder bekannte Personen Begrüßen, Vorstellen und Verabschieden in Sie-Form. Chatten Sie mit einem Partner / einer Partnerin. (Aufg. 4b

Chat: Begrüßen, Vorstellen und Verabschieden . Machen Sie eine Kursliste. Notieren Sie im Wiki Name, E-Mail-Adresse, Telefonnummer, Ihre Sprachen und Ihr Land. (Aufg. 8d)

Wiki: Kursliste

Figure: 3
German Language Course Online Lecture Example

Kursliste

Machen Sie eine Kursliste.
Notieren Sie Name, E-Mail-Adresse, Telefonnummer, Ihre Sprachen und Ihr Land.

Klicken Sie auf „**Bearbeiten**" und füllen Sie die Tabelle im Editor aus. Klicken Sie dann unten auf „**Speichern**".

Name	E-Mail-Adresse	Telefonnummer	Sprache	Land

Figure: 4
Wiki (Group Work) Example

Chat: Begrüßen, Vorstellen und Verabschieden
Begrüßen, Vorstellen und Verabschieden in Sie-Form. Chatten Sie mit einem Partner / einer Partnerin. Verwenden Sie zum Beispiel diese Ausdrücke: *Guten Abend. – Auf Wiedersehen. – Wie geht's? – Mein Name ist … –* *Guten Tag. – Woher kommen Sie? – Wie heißen Sie? – Und   Ihnen? – Wo* *wohnen Sie? – …*

Chat betreten (klicken Sie)

Guten Tag……

Figure: 5
Chat Room Example

Data Analysis

The motivation data of the research has been obtained by the German Language Learning Motivation Scale before the experimental process to both groups as a pre-test and after the accomplishment of the experimental process as a post-test.

The scores for the data process of the articles according to the 5 point Likert scale have been set as "Strongly Agree=5, Agree=4, Neutral=3, Disagree=2, Strongly Disagree=1". The maximum score to get from the scale are 20 x 5=100 points. As to the German language course success data; an achievement test, prepared in accordance with the topics of the German course book by the researcher and containing the expected foreign language level, has been performed before the experimental process to both groups as a pre-test and after the accomplishment of the experimental process as a post-test. The maximum score to get from the achievement test are 100 points.

In the analysis of the collected data, a two way ANOVA analysis for mixed measures has been performed in order to determine the differences between the experimental and control groups. The significance level has been token as .05 for interpreting the results. A packaged statistic software has been used for the complete statistical analysis.

FINDINGS

As a result of the analysis of the obtained data by researching the effects on motivation and success within the application of blended learning environments on university levels in German language classes of students studying in the tourism and hotel management program, the achieved findings have been converted into tables and interpreted.

114

The sub-goal findings of "Is there a significant difference before and after the implementation by means of success in the foreign language classes (German) between the experimental group (blended learning environment) and the control group (traditional learning environment) available?" have been given below on Table: 2 and Table: 3.

Table: 2
Average Scores and Standard Deviation Values
of the German Language Course Achievement Test

Group	N	Pre-test		Post-test	
		$\overline{X}$	df	$\overline{X}$	df
Experimental	35	33.08	10.18	69	8.24
Control	27	30.40	10.41	57.18	10.48
Total	62	31.91	10.28	63.85	10.93

When Table 2 is examined, it can be realized that the success points of the experimental group attending German language classes in the blended learning environment is 33.08 before the application, and that the value after the application is 69. The success points of the control group attending solely the traditional learning environment before the application is 30.40, and after 57.18.

Table: 3
Pre-Test and Post-Test Success Points of the ANOVA
Results of the German Language Achievement Test Success

Variance Source	Sum Sum of squares	sd	Mean Square	F	S Sig.
Between Subjects	7885.42	61			
Group (Person/Group)	1600.789	1	1600.789	15.283	.000
Error	6284.631	60	104.744		
Intersubjective	35823.521	62			
Measurement (Pre-Test-Post-Test)	29952.650	1	29952.650	343.316	.000
Group*Measurement	636.166	1	636.166	7.292	.009
Error	5234.705	60	87.245		
Total	43708.941	123			

After this result, it has been detected that there is an increasing available on both group's German language class success points, at the blended learning environment and also at the traditional learning environment. The two way ANOVA results related to significant differences on the success points at the achievement test after and before the experiment of the German classes of both groups have been indicated on Table: 3 after performing two measurements. According to the results of the analysis, it has been found that a significant difference in German language success is available at the students attending German language classes in blended learning environments and traditional learning environments before and after the experiment. In other words, it has been ascertained, that the learning environments have a significant effect on the repeated measurement factors of German language class success on both groups. [$F_{(1-60)}$= 7.292, p< .005].

This finding indicates that the German language classes performed in the blended learning environment and the traditional learning environment have different effects by means of increasing success. It can be understood, that the blended learning environment, which approaches to more points on the German language achievement test scores before the experiment than the traditional learning environment, is more effective at increasing success in German classes. The findings of the subgoal "Is there a significant difference before and after the implementation by means of motivation towards the foreign language classes (German) between the experimental group (blended learning environment) and the control group (traditional learning environment) available?" have been indicated on Table: 4 and Table: 5.

Table: 4
Average Scores and Standard Deviation Values of the Motivation Scale

Group	N	Pre-Test		Post-Test	
		$\overline{X}$	df	$\overline{X}$	df
Experimental	35	57.80	10.62	74.77	3.99
Control	27	59.33	8.93	62.70	7.79
Total	62	58.46	9.87	69.51	8.43

As seen on Table: 4, whereas the motivation points of the experimental group attending German classes in the blended learning environment before the application are 57.80, this value becomes after the experiment 74.77. Only the motivation points of the control group attending the traditional learning environment is before the application as 59.33 and after 62.70. After this result, an increasing has been determined on motivation points relevant to the German language classes of both groups in the blended learning environment and also in the traditional learning environment.

Table: 5
ANOVA Results of the Motivation Scale's Pre-Test and Post-Test Scores

Variance Source	Sum of squ	df	Mean Squre	F	Sig.
Between Subjects	4733.492	61			
Group (Person/Group)	845.725	1	845.725	13.052	.001
Error	3887.767	60	64.796		
Intersubjective	8712.899	62			
Measurement (Pre-Test-Post-Test)	3153.471	1	3153.471	45.596	.000
Group*Measurement	1409.794	1	1409.794	20.384	.000
Error	4149.634	60	69.161		
Total	13446.391	123			

Accordingly, it has been found that a significant difference in motivation towards German language classes is available at the students attending German language classes in blended learning environments and traditional learning environments before and after the experiment. In other words, it has been ascertained, that the learning environments have a significant effect on the repeated measurement factors of motivation towards German language classes on both groups. [$F_{(1-60)}$= 20.384, p< .005]. This finding indicates that the German language classes performed in the blended learning environment and the traditional learning environment have different effects by means of increasing motivation.

It can be understood, that the blended learning environment, which approaches to more points on the motivation scale scores before the experiment than the traditional learning environment, is more effective in increasing motivation in German language classes.

DISCUSSION

The findings of the sub-goal "Is there a significant difference before and after the implementation by means of success in the foreign language classes (German) between the experimental group (blended learning environment) and the control group (traditional learning environment) available?" indicate that the German language classes performed in the blended learning environment and the traditional learning environment have different effects by means of increasing success. It can be understood, that the blended learning environment, which approaches to more points on the German language test scores before the experiment than the traditional learning environment, is more effective in increasing success in German classes.

According to the research findings of Akkoyulu & Soylu (2006), showing parallelism with this study, it has been found that the students gained high academic success in the blended learning environment. Alike have Garrison & Kanuka (2004) asserted in their study, where they have researched blended learning environments that blended learning increases student success. The blended learning method has been performed in many educational institutions in online classes and also in-class tuition and successful results have been achieved. Educational institutions preferring any of the blended learning types grow day by day (Young, 2002).

According to the findings of the sub-goal "Is there a significant difference before and after the implementation by means of motivation towards the foreign language classes (German) between the experimental group (blended learning environment) and the control group (traditional learning environment) available?", it has been found that a significant difference in motivation towards German classes is available at the subjects attending German classes in blended learning environments and traditional learning environments before and after the experiment. The works of Utts vd. (2003) and Karchmer (2011) support this study's result. They have determined in their studies that blended learning has positive effects motivation from different views of learning.

If viewed from the positive in-class attitude closely associated with motivation, Korkmaz & Karakuş (2009), Kirişçioğlu (2009) introduced in their works performed within various lectures, which blended learning effects the attitude towards the lecture in a positive way.

CONCLUSION AND RECOMMENDATIONS

The blended learning environment enriched with face to face and online activities offers students a wide variety of discussion, exploring and cooperation opportunities in their learning experiences. As to provide these stated opportunities, the blended learning environment and its activities have to be designed in the eye of blended learning supplements and constraints, and the instructor and the learner have to carry through their tasks and responsibilities (Littlejohn & Pegler, 2007).

When the achieved results directed to the experiment findings, which aim to determine the motivation effects of blended learning environments on the academic success of the students in German classes, are evaluated, it has been defined that the experimental group of students attending the German classes in blended learning environments have more success and higher motivation compared to the control group attending German language classes in the traditional learning environment. Even if the learners achieve certain success and motivation findings in the classroom and face to face environments performed along with teaching-learning activities mainly in control of the instructor, the success and motivation effect of the blended learning environment could not be achieved. These suggestions may be made in consideration of this study's findings:

As this study has been made in the German language lecture Level A1 with students studying in the Tourism and Hotel Management program, it is limited with elementary German level lectures. It can be expected, that the blended learning environment may form students more active and independent in improving German lectures, as the foreign language level advances. The blended learning environment within this dimension shall be a source of success and motivation and shall be stimulated with its student centered characteristic.

It's a demand of today's world that the foreign language course books constitute in the mean time a parallel online learning environment for the course book. By building a blended learning environment in this way, an enhancement can be made via face to face lectures, and distant learning can be verified in an effective and active way, with flexible person and group based online aspects, and without time and place concerns.

Motivation in foreign language education shall always be taken in consideration. Motivation, as a strong requirement of foreign language learning, is seen as a smooth passage with an adequate learning environment to the target language, and by maintaining thus, as a guarantee of a long term learning success. Motivation and memory activities are notions which can't be thought separately in terms of information processing.

BIODATA and CONTACT ADDRESS of AUTHOR

Bahar ISIGUZEL is an assistant professor at the Faculty of Education in Department of Foreign Language Education at Nevşehir Hacı Bektas Veli University in Nevşehir, Turkey. In 2010 she received the PhD. Grade in German Language Teaching at Çukurova University in Adana, Turkey. Her research areas are; foreign language attrition, cognition and emotion in foreign language, motivation in foreign language learning, early foreign language teaching, quality of foreign language teacher training.

Bahar ISIGUZEL, Ph.D.
Nevşehir Hacı Bektas Veli University
Faculty of Education Dept. of Foreign Language Education
50300 Nevşehir, TURKEY
Tel: +90 384 228 10 04
Fax: +90 384 228 10 40
Email: bahar.isiguzel@nevsehir.edu.tr

REFERENCES

Akkoyunlu, B. & Soylu, M. (2006). A Study on Students" Views On Blended Learning Environment., *TOJDE* 7 (3), pp. 43-56.

Albayrak, B. (2006). Die Rolle der Motivation beim Fremsprachenverlust. Yayınlanmamış Yüksek Lisans Tezi, Adana: Çukurova Üniversitesi, Sosyal Bilimler Enstitüsü.

Albayrak, B. & Serindağ, E. (2007). Der Fremdspracheverlust: Eine Empirische Studie beim universitären Lernen des Deutschen. *Çukurova Üniversitesi, Sosyal Bilimler Enstitü Dergisi*, Cilt: 16, Sayı: 1, pp. 21-32.

Apeltauer, E. (1997). *Grundlagen des Erst- und Fremdsprachenerwerbs. Eine Einführung*. Fernstudieneinheit 15, Kassel: Langenscheidt.

Berelson, B. & Steiner, A. G. (1969). *Menschliches Verhalten, Band I: Forschungsmethode und Individuelle Aspekte*. Berlin: Beltz Verlag.

Bonk, C. J. & Graham, C. R. (2004). *Blended Learning Systems: Definition, Current Trends and Future Directions, Handbook of Blended Learning*: Global Perspectives, Local Designs, San Fransisco, CA: Pfeiffer Publishing.

Colis, B. & Moonen, J. (2001). *Flexible learning in a digital world: Experiences and expectations. London: Kogan Page.*

Conrad, R. M. & Donaldson, J. A. (2004). *Engaging the online learner: Activities and resources for creative instruction*. San Francisco: John Willey & Sons/Jossey-Bass.

Çam, S., Serindag, E. & Işigüzel, B. (2010). Almancanın Öğrenilmesine Yönelik Motivasyon Ölçeği'nin Türkçeye Uyarlama,Geçerlik ve Güvenirlik Çalışması (The Adaptation of German Learning Scale: A validity and reliability study). *Çukurova Üniversitesi, Sosyal Bilimler Enstitü Dergisi*, Cilt:19, Sayı:2, pp.302-312.

Garrison, D. R. & Vaughan, N. D. (2007). *Blended learning in higher education: Framework, principles, and guidelines*. San Francico: John Willey & Sons / Jossey-Bass.

Garrison, D. R. & Anderson, T. (2003). *E-Learning in the 21st Century.* London: Routledge Falmer.

Garrisson, D. R. & Kanuka, H. (2004).Blended learning: Uncovering its transformative potential in higher education. Internet ve Higher Education, 7, pp. 95-105.

Garnham, C. & Kaleta, R. (2002). Introduction to Hybrid Courses. *Teaching withTechnology Today,* 8(6). Retrieved on April 8, 2014 from http://www.uwsa.edu/ttt/articles/garnham.htm

Graham, C. R. (2006). Blended learning systems. definition, current trends, and future directions. (eds. C. J. Bonk, & C. R. Graham). *The Handbook of Blended Learning.* San Fransisco: Pfeiffer, pp. 3-21.

119

Hofmann, J. (2004). *The Synchronous Trainer's Survival Guide: Facilitating Successful Live and Online Courses, Meetings, and Events*. USA: Pfeiffer.

Ipfling, H. J. (1974). *Grundbegriffe der Pädagogischen Fachsprache*, München: Ehrenwirth.

Johnson, S. D. (Steven R. A. (2003). An Instructional Strategy Framework for Online Learning Environments. *New Directions for Adult & Continuing Education,* Number: 100, pp. 31-43.

Karchmer, R. A. (2011). The Journey Ahead: Thirteen Teachers Report How The Internet Influences Literacy and Literacy Instruction in their K-12 Classrooms. *Reading Research Quarterly*, 36 (4), pp. 442-466.

Kerres, M. & De Witt, C. (2003). A didactical framework for the design of blended learning arrangements, *Journal of Educational Media,* 28(2-3), Carfax Publishing, pp.101-113.

Kiriscioglu, S. (2009). Fen Laboratuvar Derslerinde Harmanlanmış Öğrenme Etkinliğinin Çeşitli Boyutlarda İncelenmesi (An Investigation The Application of Blended Learning Instruction In Science Laboratory Lesson). Yüksek Lisans Tezi, Manisa: Celal Bayar Üniversitesi Fen Bilimleri Enstitüsü.

Korkmaz, O. & Karakus, U. (2009). The impact of blended learning model on student attitudes towards geography course and their critical thinking dispositions and levels. *Turkish Online Journal of Educational Technology*, 8 (4), pp. 51-63.

Kullmann, H. M. & Seidel, E. (2000). *Lernen und Gedächtnis im Erwachsenenalter*, Bielefeld: W.Bertelsmann Verlag.

Kupfermann, I. & Schwartz, J. (1996). Motivation. (in):Kandel, E.R.; Schwatz, J.H. & Jessell, T. M., *Neurowissenschaften*, Heidelberg: Spektrum Akademischer Verlag, pp. 625- 644.

Littlejohn, A. & Pegler, C. (2007). *Preparing for Blended e-Learning*, London: Routledge.

Masie, E. (2002). Blended learning: The magic is in the mix. In *The ASTD e-learning handbook: Best practices, strategies, and case studies for an emerging field,* edited by Rossett, A., New York: McGraw- Hill, pp. 58-63.

Metzig,W. & Schuster, M. (1982). *Lernen zu Lernen, Lernstrategien Wirkungsvoll Einsetzen*, Berlin- Heidelberg: Springerverlag.

Müller, K. (1995). *Spracherwerb und Sprachvergessen*, Eichstätter Hochschulreden 96, Regensburg: Friedrich Pustet.

Ross, B. & Gage, K. (2006). Insight from WebCT and Our Customers in Higher Education. C. J Bonk. ve C. R. Graham (Ed.) *The Handbook of Blended Learning: Global Perspectives and Local Designs* , USA: Pfeiffer, pp. 155-168.

Sauter, A. & Sauter, W. (2002). *Blended Learning. Effiziente Integration von E- Learning und Präzenztraining.* **Neuwied: Luchterhand.**

Singh, H. & Reed, C. (2001). *A White Paper: Achieving Success With Blended Learning.* **Los Angeles: Centra Software.**

Singh, H. (2003). Building Effective Blended Learning Programs. *Educational Technology, 43* **(6), pp. 51–54.**

Utts, J., Sommer, B., Acredolo, C., Maher, M. & Matthews, H. (2003). A Study Comparing Traditional And Hybrid Internet-Based Instruction in Introductory Statistics Classes. *Journal of Statistics Education,* **11(3). Retrieved on April 8, 2014 from http://www.amstat.org/publications/jse/v11n3/utts.html**

Young, J. R. (2002). Hybrid teaching seeks to end the divide between traditional and online instruction, *The Chronicles of Higher Education***, A33-34. Retrieved on April 8, 2014 from http://chronicle.com/free/v48/i28/28a03301.htm**