



CONSTRUCTIVIST LEARNING ENVIRONMENT IN ELT METHODOLOGY II COURSES

ÖZEL ÖĞRETİM YÖNTEMLERİ II DERSLERİNDE OLUŞTURMACI ÖĞRENME ORTAMI

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ABSTRACT: The purpose of this study is to investigate to what extent the characteristics of constructivist learning environment existed in English Language Teaching (ELT) Methodology II courses and whether students' perception of the learning environment differed according to certain variables. The subjects of the study were 410 students taking ELT Methodology II course in the ELT departments of four universities. The results of the study revealed that the students perceived the learning environment to be often constructivist in nature. It was also found that students' perception of the learning environment differed according to the university they were attending, their expected average score from the course and perceived competency in English, but did not differ according to their sex and high school background.

Keywords: constructivism, learning environment, constructivist learning environment, English language teaching

ÖZET: Bu çalışmanın amacı, Özel Öğretim Yöntemleri II derslerinde oluşturmacı (constructivist) öğrenme ortamı özelliklerinin ne derece bulunduğunu ve öğrencilerin öğrenme ortamı algılarının bazı değişkenlere göre değişip değişmediğini araştırmaktır. Çalışmanın denekleri, dört üniversitenin İngilizce Öğretmenliği bölümlerinde Özel Öğretim Yöntemleri II dersini almakta olan 410 öğrencidir. Çalışmanın sonuçları, öğrencilerin öğrenme ortamını sıklıkla oluşturmacı nitelikte algıladıklarını ortaya çıkarmıştır. Ayrıca, öğrencilerin öğrenme ortamı algısının, öğrencisi oldukları üniversiteye, dersten beledikleri ortalama nota ve İngilizce yeterlik algısına göre değiştiği, fakat cinsiyete ve mezun olunan liseye göre değişmediği bulunmuştur.

Anahtar Sözcükler: oluşturmacı, öğrenme ortamı, oluşturmacı öğrenme ortamı, İngilizce öğretimi

1. INTRODUCTION

In recent years it is believed that the potential contribution of constructivism to FL teaching and teacher training should be considered seriously (Skrinda, 2004). In line with constructivist methodology, the shift has been from the learner as a passive recipient of language forms to an active and creative language user who engages in meaningful activities in an effort to construct his own knowledge related to the target language and to communicate effectively in L2 (Murphy, 2000; Skrinda, 2004).

Considering Tetenbaum and Mulkeen's (1986) assumptions about how the teachers for future generations should be, we can say that prospective FL teachers should not just be required to acquire several learning and teaching theories and recall the facts related to them. Rather, they should develop higher order thinking skills, be able to realize the students with diverse learning needs and design the learning activities accordingly and facilitate communication and collaboration among the students.

The prospective teachers trained in a constructivist learning environment can establish a meaningful link between theory and practice and have many opportunities to teach, to observe and to reflect on their own and the other prospective teachers' teaching (Cochran, DeRuiter and King, 1993). For significant learning to occur, students should be provided with a supportive, nonthreatening, safe, free and responsive environment that encourages disclosure of student constructions (Airasian and Walsh, 1997; Hendry, 1996). The term *constructivist learning environment* has been used to describe teaching and learning situations which are explicitly based on constructivist epistemology and are designed to support learners' knowledge construction process (Tynjälä, 1999). Wilson (1996) defines a constructivist learning environment as "a place where learners may work together and support each

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other as they use a variety of tools and information resources in their guided pursuit of learning goals and problem-solving activities” (p.5). It is called to be a *learning environment*, not an *instructional environment*, because in constructivist settings, learning, rather than teaching, is emphasized (Wilson, 1997). Wilson (1996) categorized the learning environments as computer microworlds, classroom-based learning environments and open, virtual environments.

Designers of constructivist learning environments emphasize the following seven pedagogical goals (Cuningham et al., 1993, cited in Wilson, 1996): 1. Provide experience with the knowledge of construction process 2. Provide experience in and appreciation for multiple perspectives 3. Embed learning in realistic and relevant contexts 4. Encourage ownership and voice in the learning process 5. Embed learning in social experience 6. Encourage the use of multiple modes of representation 7. Encourage self-awareness of the knowledge construction process

Honebein (1996, cited in Wilson, 1996) also developed some pedagogical goals that should be achieved in constructivist learning environments. These goals can be summarized as facilitation of knowledge construction process, an interactive environment between the students and the teacher as well as among students, engagement of students in activities, collaborative activities such as teamwork, leadership, negotiation and cooperation, encouragement of learners’ individual thinking, provision of authentic ways to learn content and students’ optimal use of what they know.

Taylor (1995) stated that universities usually have been exemplars of the *transmissionist paradigm* typified by the dominance of lecturing. In such classes knowledge is regarded as a commodity which can be transmitted to the students’ minds. He believes that the university teaching should be reformed and the learning environments should be resigned based on social-constructivist epistemology. According to him, in a constructivist learning environment: 1. knowledge is a *transformative growth process* shaped by the learner’s sense of purpose rather than a product to be received externally (Reflexivity, Relevance and Management) 2. the teacher is a *craftsman and facilitator* of knowledge growth, rather than a disseminator, and modifies and adapts learning activities, rather than adheres to a prescribed curriculum (Accountability) 3. students *interactively* construct their knowledge in social and cultural contexts (Negotiation) 4. the curriculum goals are concerned *how* and *why* we know what we claim to know (Reflexivity).

Fisher, Fraser and Taylor (1996) developed UCLES (University Constructivist Learning Environment Survey) based on earlier learning environment research and constructivist research on teaching. The purpose of the survey was to investigate characteristics of a university learning environment to highlight its important psycho-social dimensions in which communicative and reflective activities are valued most. The first three scales - *Relevance, Reflection, Negotiation* - were concerned with opportunities provided by the university teacher to engage students in communicative activity and reflective thinking leading to their development of deep conceptual understandings within the discipline. The second three scales - *Leadership, Empathy, Support* - were concerned with important interpersonal qualities that need to be displayed by a university teacher interested in persuading students to transform their established epistemologies and approaches to learning. The UCLES has been considered to be useful for examining students’ perceptions and preferences and characteristics of a constructivist learning environment (Fisher et al., 1996).

Research on factors affecting the nature of instruction and learning environment has yielded contradictory results. However, the research studies usually indicate that teachers’ beliefs about students’ capacities and abilities affect their choices of learning activities and the learning environment they create in the classroom. A study by Smerdon Burkam and Lee (1999) revealed that didactic instruction was more common among higher socioeconomic status (SES) and female students, while constructivist instruction was practiced more often among students of lower ability. Constructivist teaching was common in both higher-level science courses and lower-level courses. The students with average social and academic status were the ones who received the least constructivist instruction. It was also found out that the teachers with less experience and who were not the graduate of science departments taught more didactically. Herr (1992) also found out that teachers of higher-level courses were more likely to use a strong lecture format.

Other research studies reveal that the teachers differentiate their objectives according to the level of the students (Raudenbush, Rowan and Cheong, 1993) and use didactic instructional techniques for the students with lower intellectual abilities (Talbert and McLaughlin, 1993, cited in Smerdon, 1992) and who are academically and socially disadvantaged (i.e., low-achieving, minority, and low-SES students) (Oakes, 1990, cited in Smerdon, 1992). Furthermore, the language status of the students also influenced teachers' pedagogical choices; teachers report that they teach basics to students who are not fluent in English (Raudenbush et al., 1993). By contrast, Newman, Marks and Gamoran (1996) found out that the exposure to authentic instruction was equal in the schools they studied; i.e. it was unrelated to race / ethnicity, SES or gender. School level and subject area, systematic structural and organizational variations among different school levels also influence instructional goals and practices (Firestone and Herriott, 1982).

The relevant research studies also indicate that teachers' personal and professional characteristics are related to how they teach. For example, teachers who have limited subject matter knowledge are reported to be less flexible in the type of instruction they use and thus are more likely to employ didactic teaching (McLaughlin and Talbert, 1993, cited in Smerdon, 1992).

The studies related to constructivist learning environment in teacher training institutes in Turkey are scarce although constructivist teacher education gained considerable attention recently and the relevant studies have been conducted in the world to find out the effects of constructivist learning environments on students' perceptions and learning. However, the existing studies in the world are usually conducted in science or mathematics despite an increasing interest on the contribution of constructivist learning approaches on FL learning. Therefore, this study was designed to investigate whether the characteristics of constructivist learning environment, including subdimensions *professional relevance, reflective thinking, negotiation, leadership, empathy and support* existed at ELT departments in Turkey and the factors affecting perception of these characteristics. These subdimensions were selected to be measured because the literature indicates that they constitute a good framework for a university constructivist learning environment (Fisher et al., 1996; Taylor, 1995).

ELT Methodology course (Özel Öğretim Yöntemleri) in which the present study was conducted is a compulsory course that the ELT students take at the third year for two semesters (*ELT Methodology I and II*). The course covers teaching methods in the field, learning and teaching processes, implementation of general teaching methods to the field, critical examination of course books and relating them with the teaching methods and strategies, microteaching practices and evaluation of teaching (Türkiye Cumhuriyeti Yüksek Öğretim Kurulu [T.C. YÖK], 1998). The study was conducted only in *ELT Methodology II* classes because of the necessity of limiting the focus of the study. Moreover, *ELT Methodology* is one of the most basic teacher education courses in ELT departments in which the students practice microteaching frequently implementing what they have learnt in previous courses and getting prepared for the subsequent ELT courses.

The research questions of the study are:

1. To what extent are the current characteristics of the learning environment (*professional relevance, reflective thinking, negotiation, leadership, empathy and support*) in *ELT Methodology II* courses constructivist as perceived by students?
2. Do the perceived characteristics of constructivist learning environment in *ELT Methodology II* courses differ according to certain variables (*universities, sex, high school background, expected average score, competency in English*)?

2. METHOD

2.1. Subjects

To identify subjects of the study, first, the universities with ELT departments (n =18) were determined. Next, based on the percentile ranks in the latest university entrance exam, the

universities were ranked from the one with the highest percentile rank to the one with the lowest. Afterwards, the universities were grouped around four percentile intervals (01-03, 04-08, 09-11, 13-19) and one university was selected from each interval purposefully. In other words, while selecting the universities, the formal consent received from each university and transportation facilities were also considered. The universities in each percentile interval were assumed to be similar with each other with respect to their student characteristics. As a result, four universities were involved in the present study. The university selected from each percentile interval was named as A, B, C and D for the sake of confidentiality. University A represents a university whose percentile rank is the highest while university D represents the one with the lowest percentile rank. Subjects of the study consisted of all the students taking ELT Methodology II course at their sixth semester at the ELT departments of four universities. As a whole, 410 students participated in the study. Table 1. presents the subjects of the study including the total number and percentages of the students from each university.

Table 1. Subjects of the Study

University	STUDENTS		
	Female	Male	Total
A	75 (70,1 %)	32 (29,9 %)	107 (26,1 %)
B	104 (81,3 %)	24 (18,8 %)	128 (31 %)
C	55 (61,1 %)	35 (38,9 %)	90 (22,2 %)
D	57 (67,1 %)	28 (32,9 %)	85 (20,7 %)
TOTAL	284 (69,3 %)	126 (30,7 %)	410 (100 %)

The students were also grouped based on their high school background as the graduates of Anatolian Teacher High Schools and the graduates of other type of high schools. With respect to expected average score from the course, the students were divided into three groups: The students who expect to get a score between 0-69 from the course, those who expect to get a score between 70-79 and those who expect to get a score between 80-100. Finally, students were grouped into three with respect to their perceived competency in English: The students who perceived their English to be *very good*, *good* and *average*.

2.2. Data Collection and Data Analysis

Data were collected through *The Constructivist Learning Environment Questionnaire (CLEQ)* administered to 410 students taking *ELT Methodology II* course in four universities. The questionnaire was developed by the researcher through translating and adapting *The University Social Constructivist Learning Environment Survey (UCLES)* developed by Fisher, Taylor and Fraser (1996) into Turkish. The questionnaire consisted of two parts. The first part was designed to collect information about student background characteristics including the university the students were attending, their sex, expected average score in the course, high school background (type of school the students graduated from), and perceived competency in English. These background characteristics were selected to collect information about students because the literature demonstrates that these characteristics may influence the nature and the perception of the learning environment in the classroom. The second part is a five-point Likert scale ranging from Always (5) to Never (1) and consisted of 6 subdimensions. The first three subdimensions assessed students' learning experiences in the classroom while the next three subdimensions assessed the instructor roles in the classroom. Each subdimension had 6 items. As a whole, the questionnaire was comprised of 36 items. Table 2. presents the subdimensions and the sample items of the questionnaire.

Table 2. The CLEQ Subdimensions and Sample Items

Subdimension	Sample Item
	<i>In this class...</i>
Professional Relevance (perceived relevance of what has been learnt to the prospective teachers' future teaching needs and aspirations)	... I learn about teaching profession
Reflective Thinking (Perceived need for thinking critically on background knowledge, new ideas and one's own learning experiences)	... I think carefully about how I learn
Negotiation (perceived need for thinking critically on background knowledge, new ideas and one's own learning experiences)	... I get the chance to talk to other students
Leadership (perceived instructor roles such as managing the classroom, organizing learning activities, setting tasks and holding attention)	... the instructor is a good leader
Empathy (perceived instructor roles such as understanding, listening attentively, showing confidence in students and being patient)	... the instructor has trust in students
Support (perceived instructor roles such as assisting in student learning, showing concern and inspiring confidence and trust in students)	... the instructor helps students with their work

Translation of the UCLES was done by the researcher through trying to convey the exact meaning of the statements into Turkish translation as much as possible. The Turkish translation of the instrument was translated back into English by two instructors at Middle East Technical University (METU) specialized in ELT in order to check the consistency of the Turkish translation with the original one. Finally, the instrument was translated again into Turkish by the researcher through making appropriate changes in it. Although the students were possibly competent enough to understand the questionnaire in English, the UCLES was given in Turkish to prevent any kind of misunderstanding.

For obtaining evidence for its validity, the questionnaire was examined by 6 instructors who were specialized in Educational Sciences and ELT. On the basis of the recommendations, the items, instructions and the format of the questionnaire were revised. Next, the questionnaire was piloted. First, the questionnaire was piloted with 50 students at METU who were taking *ELT Methodology II* course in order to check the clarity and understandability of the items in the questionnaire. On the basis of the piloting, some statements in the questionnaire were clarified further. The questionnaire was piloted for the second time with 322 students at Gazi University and METU who took the course the previous year in order to conduct factor analysis and to assess the reliability of the questionnaire. Six subdimensions, whose names were mentioned above, were derived from maximum likelihood factor analysis. The reliability of the whole questionnaire was .95 while the reliability of its subdimensions ranged from .84 to .92.

Data were analyzed by SPSS PC software program using descriptive statistics to find out an answer for research question 1 and one-way ANOVA to find out an answer for research question 2.

3. RESULTS

3.1. Current Characteristics of the Learning Environment

In order to give an answer to research question 1. "To what extent are the current characteristics of the learning environment (*professional relevance, reflective thinking, negotiation, leadership, empathy and support*) in *ELT Methodology II* courses constructivist?", the responses given to the questionnaire by the students in ELT departments (n = 410) were analyzed. The mean score of each item in the questionnaire was reported in the following way: Always is 4.5 - 5.00, Often is 3.51- 4.50, Sometimes is 2.51 - 3.50, Seldom is 1.51 - 2.50 and Never is 0 -1.5.

The maximum score that could be obtained from the whole scale was 180 while the minimum score was 36. First, the mean score (M) and the standard deviation (SD) of the total score were calculated and found out to be 146.36 and 19.16 respectively (M = 4.07 out of 5, SD = .55) revealing that the students perceived the learning environment to be *often* constructivist. Secondly, students'

responses to the whole scale were reported through frequencies and percentages. A great deal of the students ($n = 266$, 66.3 %) perceived the learning environment to be *often* constructivist while only 1.75 % of them ($n = 7$) perceived it to be *seldom* constructivist. 17.96 % of the students ($n = 72$) perceived the learning environment to be *always* constructivist while 13.97 % of them perceived it to be *sometimes* constructivist. On the other hand, there were no students who perceived the learning environment to be *never* constructivist.

Thirdly, students' responses related to each subdimension of the questionnaire were calculated. As seen in Table 3., since the range for *often* was accepted as 3.51 to 4.50, it can be concluded that all subdimensions of learning environment were perceived to be *often* constructivist. The subdimension with the highest mean score was *Leadership* ($M = 4.35$, $SD = .74$) while the one with the lowest mean score was *Reflective Thinking* ($M = 3.80$, $SD = .81$).

Table 3. Students' Responses Related to the Subdimensions of the Questionnaire

SUBDIMENSIONS	M	SD	PERCENTAGES				
			Always %	Often %	Sometimes %	Seldom %	Never %
Professional Relevance	4.19	.67	42.3	48.9	6.8	1.7	0.3
Reflective Thinking	3.80	.81	22.6	53.3	18.4	4.7	1
Negotiation	3.82	.77	22.7	48.9	24.1	4.1	0.2
Leadership	4.35	.74	58.8	28.6	10.4	1.7	0.5
Empathy	4.09	.78	41.9	40.4	14.2	2.7	0.8
Support	4.09	.81	39.6	42.3	14.2	2.9	1
TOTAL	4.07	.55	17.96	66.33	13.97	1.75	-

(Means out of 5)

3.1.1. Difference in Perception of Constructivist Learning Environment According to Certain Variables

In order to answer research question 2. "Do the characteristics of constructivist learning environment in *ELT Methodology II* courses differ according to certain variables (*universities, sex, high school background, expected average score, competency in English*)?", one-way ANOVA was conducted and the results were summarized below.

Firstly, students' perception of constructivist learning environment differed according to universities they were attending, $F(3, 397) = 11.33$, $p < .05$, $\eta^2 = .08$. Tukey test for pairwise comparisons usually revealed significant differences between the mean scores of the students. However, there were no significant differences between the students from university B and university C, and the ones from university B and university D. The students from university A perceived the learning environment to be more constructivist ($M = 4.32$) while the students from university D ($M = 3.86$) perceived the learning environment to be less constructivist compared to the other students. Secondly, students' perception did not differ according to their sex, $F(1, 399) = .70$, $p > .05$, $\eta^2 = .00$. Female ($M = 4.08$) and male ($M = 4.03$) students' perceptions of the learning environment were similar to each other.

Thirdly, students' perception did not differ according to their high school background, $F(1, 399) = .00$, $p > .05$. There were no significant differences in perception of the graduates of Anatolian Teacher High Schools ($M = 4.04$) and the graduates of other high schools ($M = 4.09$). Fourthly, students' perception differed according to expected average score from the course, $F(4, 387) = 5.52$, $p < .05$, $\eta^2 = .05$. Tukey test for pairwise comparisons usually indicated significant differences between the mean scores of the students. Nevertheless, there were no significant differences between the students who expected to get a score between 0-69 and those who expected to get a score between 70-

79. The students with the expected average scores of 80-100 ($M = 4.21$) perceived the learning environment to be more constructivist compared to the ones with the expected average scores of 0-69 ($M = 3.97$) and 70-79 ($M = 3.96$).

Finally, students' perception differed according to perceived competency in English, $F(1,165) = 5.07$, $p < .05$, $\eta^2 = .03$. In this study, only the scores of the students who perceived their English to be *very good* and those who perceived it to be *average* were compared because the number of these students were closer and therefore comparable to each other. The students who perceived their English to be *very good* ($M = 4.08$) perceived the learning environment to be more constructivist compared to the ones who perceived it to be *average* ($M = 3.88$).

4. DISCUSSION AND IMPLICATIONS

The study revealed that students perceived the learning environment in *ELT Methodology II* classes to be *often* constructivist. Within all the subdimensions, *Leadership* had the highest mean score indicating that the students perceived their instructors to be constructivist leaders and classroom managers. With respect to learning experiences, the students perceived that the course was *often* relevant to teaching profession and interesting, enhanced reflective thinking skills and encouraged negotiation among students. The literature also emphasizes that in constructivist learning environments the content of the courses should be of interest for the students (Brooks and Brooks, 1993), the teacher candidates should perceive what has been learnt to be connected with teaching practices (Richardson, 1997) and their prior knowledge and experiences on teaching and learning (Cochran et al., 1993; Dewey, 1938, cited in Hassard, 1999). Moreover, the method courses should promote higher-level student thinking, especially critical thinking over one's own learning and others' ideas (Fisher et al., 1996) and enhance negotiation and communicative skills (Bonstetter, 1998).

With respect to instructor roles, the students perceived that the instructors *often* had leadership qualities and were empathetic and supportive. The literature also emphasized that constructivist teachers should be effective leaders and classroom managers, empathize with students' difficulties and problems and provide support for their learning through showing them friendship and concern and helping with their work (Fisher, Taylor and Fraser, 1996).

The results related to difference in perception of learning environment according to certain variables revealed the following results: Firstly, the students who were from the universities with higher percentile ranks perceived the learning environment to be more constructivist compared to those from the universities with lower percentile ranks. This result indicated that percentile ranks of the departments in the university exam might be considered as one of the good indicators for revealing the difference in students' perception of the learning environment. The difference in perceptions may also be attributed to the unique characteristics of the universities and their effects on the learning environment in the classroom. The study conducted by Raudenbush et al. (1993) also revealed that systematic structural and organizational variations among different school levels influenced instructional goals and practices. Since there was no adequate relevant literature related to the potential reasons for the differences in perception of classroom learning environments across universities, further studies are needed in this area.

Secondly, students' perception of learning environment did not differ according to their sex and high school background. Thirdly, the higher score the students expected to get in the course, the more they perceived the learning environment to be constructivist. Finally, the students who perceived themselves to be competent in English perceived the learning environment to be more constructivist compared to the ones who did not think like that.

The research studies related to the effects of student characteristics on the perception of the learning environment were few and as far as the researcher could reach and the existing studies revealed conflicting results. The studies usually indicated that teachers' beliefs about students' characteristics affected their instructional choices (Newman et al., 1996; Raudenbush et al., 1993; Smerdon et al., 1999). Therefore, it could be inferred from the results of the study that the instructors'

beliefs about students' capacity and competency might have affected the nature of the learning experiences and instructor roles in the classroom. In other words, the instructors who perceived their students to be successful and competent in English may have encouraged them to engage in constructivist learning experiences more compared to the instructors who did not perceive their students to be like that.

Moreover, it could be inferred from the results of the study that the students who were from the universities with higher percentile ranks in the university exam expected to get higher scores from the course and perceived themselves to be more competent in English. Therefore, perception of classroom characteristics according to universities, expected average scores and competency in English could be interrelated to each other.

As a whole, the results of the study imply that in order to create constructivist learning environments in ELT classrooms, the students should be provided with learning experiences which enable them to relate their learning to their future teaching needs, develop their higher thinking skills, especially reflective thinking and to negotiate with their classmates. The instructors should facilitate students' learning through being effective leaders and classroom managers, empathizing with students' difficulties during learning process and providing necessary cognitive and affective support for their learning. Moreover, further studies investigating the characteristics of constructivist learning environments across various levels of education, fields and courses and the effect of some student and teacher characteristics on perception of the learning environment are needed.

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