Mediated Learning Experience in Iranian EFL Settings: Focusing on Levels of Teaching and Pedagogical Conceptions

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Abstract

The aim of the study was to examine the Iranian learning settings according to the 12 features of the Mediated Learning Experience proposed by Feuerstein (1990). The study also aimed at inspecting the impact of the level being taught and teacher's pedagogical conception on their mediation performance. To this end, the MLE questionnaire was applied to investigate Iranian EFL teachers' mediation performance in the language learning settings. The results specified that their act of mediation needed more deliberation in some of the MLE parameters more than the others, namely mediation for challenge, goal-setting, awareness of change, reciprocity, and transcendence. As for the impact of teacher's pedagogical conception of teaching on their mediation of learning, the results showed that there was only a moderate positive influence on their mediation practice. Nonetheless, the study concluded that the participants' mediation performance is not affected by the level they are teaching.

Keywords: Mediated Learning Experience (MLE); pedagogical conception; mediation performance; mediation for challenge; mediation for awareness of change

INTRODUCTION

In recent years, the objective of education has been experiencing a change favoring problem-solving skills and lifelong learning rather than memorization of facts. As Yarger, at al. (1999) state in their 1999 study, a constructive model of learning is replacing the traditional model of transmission of knowledge and information. According to the constructivist approach, learning is an active procedure of restructuring the information that an active learner receives to build a meaningful personal representation of experience (Gallus, et al. 2000). The essence of the construction of meaning on the part of the learner is the interaction between the instructor and the learner which is termed as 'mediation' in the sociocultural theory. To keep up with the current developments, mediation should be taken into account in the leaning settings.

LITERATURE REVIEW

A Historical Background to Constructivism and Mediation

Constructivism can be traced back to the philosophies of Socrates, Plato, Rousseau, Locke, and Dewey to mention but a few. This notion goes back to Socrates, who was the first to hint at knowledge construction by proposing the Socratic questioning model. Glasersfeld reemphasized this approach in constructivism and for him it is a "...powerful educational tool" and he suggested that "...its power greatly increases if the learners come to see it as fun" (Glasersfeld, 1995, p. 50).

Duckworth (2006) defines construction of meaning and explains, "Meaning is not given to us in our encounters, but it is given by us, constructed by us, each in our own way, according to how our understanding is currently organized". Construction of knowledge approach to learning is also found in Dewey's pragmatism. Dewey (1966) puts forward a technical definition for education in his Democracy and education as "reconstruction or reorganization of experience which adds to the meaning of experience, and which increases ability to direct the course of subsequent experience" (p. 81). For him, knowledge and thoughts emerge only from a situation in which the learner has to draw them out of experiences which are meaningful and significant to them.

To the developmental psychologist, Piaget (1964), knowledge is not a copy of reality. Rather it is grounded in the idea of operation. He posits that to know an object or event is to act on it. Operation is therefore the essence of knowledge. It is an interiorized action to know an object of knowledge. He stated that "to know is to modify, to transform the object, and to understand the process of transformation, and as a consequence to understand the way the object is constructed" (p. 20). Operation is a set of acts such as adding, subtracting, joining, and separating to make up logical mental structures, which can be seen as the act of constructing knowledge.

Feuerstein initiated his work in the late 1940s and was a learner of Jean Piaget at a time. He posited the theory of Structural Cognitive Modifiability _modifiability of cognition_ at the heart of which lies the theory of Mediated Learning Experience (MLE). To put simply, MLE states that the aspect of interaction between the individual and the setting by means of an intended human being or the teacher, plays an essential role in the cognition of the individuals (Seng, et al. 2003). Feuerstein (1990) highlights the important figures or "mediators" in children's learning or constructing meaning and they identify 12 features of mediated learning experience (MLE) which is described in the following table (Table 1). These are the features of any mediated learning experience which are also expected from constructivist tasks.

MLE was the theoretical foundation for Feuerstein's Instrumental Enrichment model, which was a model proposed to deal with the cognitive deficiencies of learners by empowering them to think more effectively. The main reason to these deficiencies was seen in the insufficient amount or unsatisfactory type of mediation (Blagg, 1991).

According to Feuerstein's Cognitive modifiability (1990), the more the MLE, the greater the capacity of the individual to become modified through autonomous exposure to the stimuli and the lack of Mediation results in less capacity of modifiability of stimuli.

Table1. Feuerstein's MLE features as cited in Williams & Burden (1997, p.69)

	Features	Description of features
1	Significance	The teacher makes learners aware of the significance of the learning task.
2	Transcendence	The teacher makes learners aware of the purpose of the task beyond now and then.
3	Reciprocity	The teacher makes the instruction and intention of the tasks clear for the learners.
4	Sense of competence	The learner's feeling of being capable of managing to finish any language task.
5	Control of own behavior	The learner's ability to control and regulate their own learning.
6	Goal-setting	The ability of setting goals and achieving them.
7	challenge	The teacher provides appropriate challenge in the task as well as helping them to do the task.
8	Awareness of change	The teacher's monitoring and evaluating any cognitive and emotional change in learners.
9	A belief in positive outcomes	The learner's feeling of being capable of finding a solution even when facing with problems.
10	Sharing	Co-operation and exchange of meaning between learners.
11	Individuality	Learner's recognition of their own individuality.
12	A sense of belonging	Learner's sense of belonging to the learning environment.

The MLE is theorized by Feuerstein (1990) to be operationalized in twelve parameters. The first three are the universal criteria of any mediated learning experience or to be exact, the mediation of intentionality and reciprocity, the mediation of transcendence, and the mediation of meaning (or significance). Through the first, the stimulus is modified by the mediator's intention provoking a change in the mediatee's "state of mind, level of vigilance and alertness" (p.97). As for the second parameter, Feuerstein (1990) states that "In transcending the immediacy of the required interaction, the mediator establishes the way in which the mediatee can relate objects and events in broader systems, categories and classes" (p.98). Moreover, the mediation of meaning provides the essence of the mediational interaction which is the generator of all kinds of human behavior. The mediation of intentionality, transcendence and meaning might have to be altered "in terms of intensity, frequency, content, and language in order to overcome barriers created by individuals" (p.99).

The next nine parameters may exist, but need not, in MLE for the diversification of cultural cognitive styles and emotional behavior, namely "the mediation of a feeling of competence; the mediation of regulation and control of behavior; the mediation of sharing behavior; the mediation of individuation and psychological differentiation; the mediation of goal-seeking, goal-setting, planning, and goal-achieving behavior; the mediation for challenge, the search for novelty and complexity; the mediation of

awareness of change; and the mediation of an optimistic approach" (Feuerstein, 1990, p.99-100). The question of whether construction of meaning is individual or not caused much discussion between Piaget and Vygotsky for about five years. To Piaget, although learning settings can encourage knowledge construction, they cannot have a direct impact on such constructions (Pass, 2007).

Vygotsky, on the other hand, held a social view of constructivism and introduced the concept of mediation to the field of constructivism and he founded social constructivism. From his viewpoint, learners construct meaning of the world or learn the world around them through interaction with more capable peers or significant others (Williams & Burden, 1997). For him, sociocultural factors are necessary prerequisites for learning processes to develop in addition to biological factors especially in the earlier stages of life (Turuk, 2008). Wertsch, et al. (1995) defines Sociocultural Theory as a general approach to human sciences whose goal is "explicate the relationships between mental functioning, on the one hand, and the cultural, institutional, historical situations in which this functioning occur, on the other" (p.3).

Mediation is a central principle to sociocultural theory of Vygotsky. As Williams and Burden (1997) explain, "For Vygotsky and his followers, mediation refers to the use of tools. Tools in this sense refers to anything that is used in order to help solve a problem and achieve a goal" (p.65). There are three orders of mediation in Vygotsky's writings and the feature of all orders is "the interception of the self by the other" (Miller, 2011). The first is the metacognitive mediation originating in interpersonal interaction; the second is the mediation by culturally constructed tools; the third-order mediation which is dealt with in a substantial portion of Vygotsky's writings is encompasses macro cultural institutions such as education, politics, region, economy, leisure, family, science, and as such. (Lantolf & Poehner, 2014).

The three dimensions of mediation are promoted in a more collaborative setting of Leontiev's 'Activity Theory' and then modelled by the contemporary activity theorists, such as Engeström, into the so-called 'activity systems'. This model shows the interconnection of individual actions and goals with sociocultural context (Mitchell, et al. 1998). Engeström (1999) refers to mediation as the 'germ cell' of the activity approach.

The concepts of MLE are elucidated in the book 'Mediated Learning in and Out of the Classroom' (Skuy, M. 1996). This book also weighs the effectiveness of a learning experience, and offers ideas for implementing MLE. This manual enumerates the advantages of applying MLE, namely autonomous learning, promoting the use of effective thinking skills, improving parenting, remediating cognitive dysfunctions, analyzing a student's cognitive strengths and weaknesses, and encouraging metacognition.

Empirical Studies

There is much literature on the extent to which practitioners in different fields apply mediation, and investigate the effectiveness of mediation techniques in social and cognitive sciences focusing on learning.

To that end, Tynjälä (1999) conducted an experiment in an educational psychology course and compared the learning outcomes of students who studied the course material in a constructivist learning environment with another group of students who learned it in a traditional teaching and studying setting. The results of the study showed that students in the constructivist learning environment acquired more expanded knowledge.

Seng, et al. (2003) highlighted the importance of mediation and suggested that to remain relevant to a new generation of students, the roles of teachers would have to change intensely. Actually, it is a challenge for educators to design new learning environments and curricula which inspire motivation and independence and provide students with learning, thinking, and problem-solving skills by the means of good mediation.

Cheng (2011) has a survey study in which he tried to work out the reasons why mediation was performed by the secondary school teachers insufficiently. The survey findings indicated the teachers' misconceptions and inadequate knowledge of mediation led to lack of mediation performance. He revealed that the misconceptions are embodied in two aspects. Some teachers considered the role of mediator as the transmitter of knowledge, learning strategies and learning how to be. Some others thought the process of mediating was considered to create a sense of teacher-centered learning setting.

Naeini (2014) attempted to apply Feuerstein's Mediated Learning Experience (MLE), to develop Iranian EFL learners' reading comprehension. The results of the qualitative as well as quantitative data analyses revealed that MLE as intervention approach of dynamic assessment was effective and exerted profound impacts on the learners' reading comprehension.

Moreover, in his survey study on mediation performance of teachers in the school of foreign languages, Zhao (2015) concluded that they all put 'A sense of competence' and 'Control of behavior' in the first place. Yet, both teachers and students neglect the importance of 'Significance', 'Purpose beyond here and now' and 'Challenge'. He proposed that teachers' recognition of the concept of mediation and their actual usage of mediation still have some inconsistencies which needs to be improved.

Mellati, et al. (2015) investigated the significance of mediation theory and gender difference in Iranian EFL context. The quantitative and qualitative data revealed that applying mediation theory in language teaching contexts needs some prerequisites that cannot be arranged normally in every teaching environment. Additionally, the findings displayed that there is a general difference between male and female teachers in the order of mediation theory in Iranian EFL context.

Tahriri and Rezaee-Manesh (2015) investigated the relationship between EFL instructors' knowledge of mediation and their classroom practice. EFL instructors in junior and senior high schools, institutes, and universities in Iran were studied and it was discovered that there is a relationship between the instructors' knowledge of mediation which is not totally reflected in their practice.

Rivera and Barboza (2016) studied the way how a Colombian ESL teacher mediated her ninth-grade students' participation during classroom interaction through recording and transcription of lessons and interviews. They concluded that such mediation tools as

questions, elaborations, recasts, and continuatives in patterned combinations helped learners co-construct relevant content and sustained participation, providing learners with frequent affordances to engage in meaning-making, a necessary condition for developing a new language.

Ahmadi and Rozati (2016) conducted a study on the effectiveness of scaffolding on second or foreign language learning focusing on listening comprehension. The findings showed that the peer's scaffolding was the most effective procedure for the intermediate EFL learners' listening comprehension development.

Daftarifard and Birjandi (2017) examined the effect of two approaches of response-based (RB) mediation (Vygotsky's mediation) and task-based (TB) mediation (Bruner's mediation) on learners' reading comprehension strategy. The analysis revealed that the mediation interventions improved learners' monitoring metacognitive strategies.

Based on the findings of a study in China by Xiongyong (2012), a conclusion was drawn that most English as a foreign language (EFL) teachers among secondary schools in China were incapable of mediating learners' learning due to the fact that most Chinese EFL learners were weak at communicative competence in English.

Hassaskhah (2011) investigated the impact of MLE on EFL teacher's sense of efficacy and it was found that the three key components in teachers' self-efficacy, namely efficacy in student engagement, efficacy in instructional practices, and efficacy in classroom management.

Research suggests that mediation induces a better learning environment and therefore one can see the advantages in the teacher's pedagogy.

Purpose of the study

The purpose of this research is to check the EFL settings in Iran according to the MLE features and to check if their mediation is affected by the level being taught and the teacher's conception of teaching. Therefore, these are the null hypotheses:

1. Mediation of learning is not practiced by the teachers in the EFL classes.
2. There is no significant correlation between teacher's mediation Performance and the level s/he is teaching.
3. Teachers' conception of teaching is not correlated with their mediation performance

METHOD

Instrumentation

The Williams and Burden (1997)'s mediation questionnaire was applied in this research. It contains 12 Likert-scale statements respectively related to the 12 mediated learning experience (MLE) criteria proposed by Feuerstein (1990). Teachers are required to choose 1 (for never) to 5 (for always) from among the choices that most closely agree with their routine teaching practices in the context of their current job or past work experience. The following table (Table 2) represents the sample items of this questionnaire.

Table 2. Sample items of the mediation questionnaire as cited in Williams &Burden (1997, p.87)

	Features	Sample items:
1	significance	How often do you make your instructions clear when you give a task to your learners?
2	transcendence	How often do you tell your learners why they are to do a particular activity?
3	Reciprocity	How often do you explain to your learners how carrying out a learning activity will help them in the future?
4	Sense of competence	How often do you help learners to develop a feeling of confidence in their ability to learn?
5	Control of own behavior	How often do you teach learners the strategies they need to learn effectively?
6	Goal-setting	How often do you teach learners how to set their own goals in learning?
7	challenge	How often do you help your learners to set challenges for themselves and to meet those challenges?
8	Awareness of change	How often do you help your learners to monitor changes in themselves?
9	A belief in positive outcomes	How often do you help your learners to see that if they keep on trying to solve a problem, they will find a solution?
10	Sharing	How often do you teach your learners to work co-operatively?
11	Individuality	How often do you help your learners to develop as individuals?
12	A sense of belonging	How often do you foster in your learners a sense of belonging to a classroom community?

After these items, a multiple-choice question was added to the end of the survey asking the participants what their conception of teaching was. There were 4 choice as follows:

_Teaching is to enable an individual to acquire the desired behavior through shaping his behavior with various reinforces and stimulus.

_Teaching is to help the individual to acquire various cognitive skills through pre-specified activities designed in a particular sequence.

_Teaching is to help the individual recognize himself and improve his potentialities in any area he chooses.

_Teaching is to create a learning environment which facilitates an individual to Construct his own knowledge and work cooperatively with other learners.

Actually, these four choices are four definitions based on four conceptions of teaching respectively: Behaviorist, Cognitivist, Humanistic and Constructivist. As can be noticed, the teachers choosing the last option have more constructivist perspectives of teaching. On the other hand, the more they choose beyond the last one, the less constructivist their viewpoints are.

Participants

The survey was given to a sample of 45 Iranian EFL teachers of three levels of student according to their age and proficiency. That is, 15 teachers of intermediate teenagers, 15 of the intermediate adults, and 15 of the advanced adults were chosen to participate in this study.

RESULTS

Each item had 5 points and the total score of the twelve Likert-scale items was calculated and reported out of 60. Using IBM SPSS 22, the scores obtained from the questionnaire were analyzed. Total scores of the participants on this questionnaire ranged from a minimum score of 22 out of 60 (36.66%) to the maximum score of 58(96.66%). The mean score was 42.64 (71.06%) and the standard deviation of the scores was 8.871.

The following table shows the frequencies of scores. The scores are in percentage and classified into four groups of 1-25 percent, 26-50 percent, 51-75 percent, and 76-100 percent. The majority of teachers declared to have 51-75 percent meditation performance in their classes. And seventeen teachers had more than 75 percent mediation performance. In other words, 62 percent of the teachers had mediation performance of less than 75 percent.

Table 3. Frequencies of the scores in percentage obtained from the mediation questionnaire

		Frequencies of scores in percentage			
		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	25-50%	7	15.6	15.6	15.6
	51-75%	21	46.7	46.7	62.2
	76-100%	17	37.8	37.8	100.0
	Total	45	100.0	100.0	

Factor analysis of the Mediation Questionnaire

The mean score and standard deviation of the first questionnaire, which was to check teachers' mediation, was measured through SPSS. The factor loadings obtained for the entire sample using the mediation questionnaire are shown in the following table. The mediation questionnaire included 12 items of MLE criteria. The mean score of each item is shown in the following table representing the MLE criteria described previously.

Table 4. SPSS report of the Factor analysis of the teacher mediation questionnaire

		Descriptive statistics:		
		Mean	Std. Deviation	Analysis N
1	significance	4.76	.609	1
2	transcendence	3.18	1.093	2
3	reciprocity	3.09	1.258	3
4	competence	4.07	1.009	4
5	strategies	4.04	1.021	5
6	goals	2.98	1.390	6
7	challenge	2.67	1.148	7

8	change	3.00	1.206	8
9	+outcomes	3.22	1.126	9
10	sharing	4.29	.843	10
11	individuality	3.60	1.156	11
12	belonging	3.89	1.191	12

The mean scores of the items are ranged from 2.67 to 4.76. Therefore, the first null hypothesis is rejected and mediation is performed by the teachers in the target EFL institute.

However, as observed in the results, items number 6, 7 and 8 have the smallest mean scores. That is teacher's mediation practice in the sample had the weakest performance in teaching learners how to set their own goals in learning, fostering challenges for the learner, and helping learners to monitor changes in themselves. The strongest item is 'significance' with the mean score of 4.76. The results, nonetheless, illustrate that items number 1, 4, 5, and 10 have mean scores of above 4 and all other items are ranged from 2.67 to 3.89. The following line chart (Figure 1) shows the comparison between the 12 items of mediation performance in the sample regarding their means.
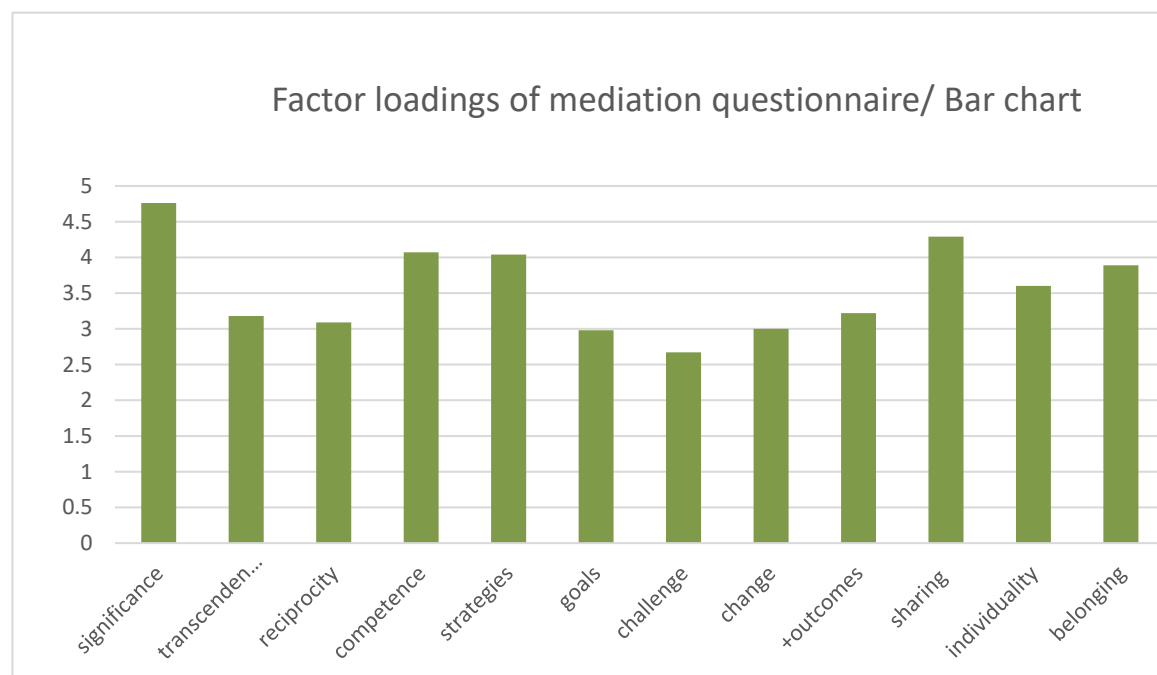

Figure 1. Bar chart illustrating the factor loadings of the items of the questionnaire or the MLE feature

Factor loadings obtained with maximum likelihood extraction shows the following percent of variance and eigenvalues shown in the following table.

Table 5. The variance and eigenvalues of each survey item

Total Variance Explained				
	Factor	Initial Eigenvalues		
		Total	% of Variance	Cumulative %
1	significance	5.791	48.257	48.257
2	transcendence	1.226	10.218	58.475
3	reciprocity	1.127	9.394	67.869

4	competence	.963	8.025	75.894
5	strategies	.886	7.380	83.274
6	goals	.506	4.214	87.488
7	challenge	.474	3.952	91.440
8	change	.314	2.615	94.055
9	+outcomes	.293	2.439	96.494
10	sharing	.203	1.690	98.184
11	individuality	.141	1.172	99.356
12	belonging	.077	.644	100.000

The percentage of the total variance extracted ranged from .644 % to 48.257 % for the items. The eigenvalues were ranged from 0.077 to 5.791.42.

This finding might have important practical implications for English-language teachers and professional developers, as it indicates that teachers' mediation performance needs to improve in order to make a learning setting where the learners themselves construct knowledge. Mediated learning is needed for the learners to construct knowledge on their own. Therefore, the items with less mean scores would be of more interest for their implications in teaching.

Effects of Level and Conception of Teaching on Teacher Mediation

Now comes up the question of whether the mediation performance of teachers is influenced by the level they are teaching. Regression analysis was done through IBM SPSS 22, and the correlation of mediation and level was 0.081. The sig. value was 0.598. This showed that there was no significant correlation between the ordinal variable of teachers' scores on the mediation questionnaire (teachers' mediation performance) and the level that they were teaching and therefore the second null hypothesis is retained.

Table 6. SPSS report of the Regression analysis between the teacher mediation and the level they are teaching

Correlations			
		Mediation score	level
Pearson Correlation	Mediation score	1.000	.081
	level	.081	1.000
Sig. (1-tailed)	Mediation score	.	.299
	level	.299	.
N	Scale score	45	45
	level	45	45

ANOVAa						
Model		Sum of Squares	df	Mean Square	F	Sig.
1	Regression	22.533	1	22.533	.282	.598b
	Residual	3439.778	43	79.995		
	Total	3462.311	44			
a. Dependent Variable: total score on mediation questionnaire						
b. Predictors: (Constant), level (in which they are teaching).						

To address the third research question, teachers' conceptions of teaching were included and asked of them in the last part of the questionnaires, which had four nominal responses. The frequencies of these responses are shown in the following table.

Table 7. SPSS report of the frequencies of the responses to the last item of the survey which is the question of the teacher conception

	Frequency	Percent	Valid Percent	Cumulative Percent
Cognitivist	3	6.7	6.7	6.7
Humanistic	3	6.7	6.7	13.3
Humanistic and Constructivist	4	8.9	8.9	22.2
Constructivist	35	77.8	77.8	100.0
Total	45	100.0	100.0	

This analysis showed that 0% of the teachers considered teaching as behaviorist. 6.7% of the teachers thought of teaching as a cognitive approach and 6.7 % of the teachers thought of teaching as a humanistic approach. 8.9 % of the teachers thought that teaching was a mixture of both humanistic and constructivist approaches and 77.8% considered teaching as a constructivist approach. Therefore, the majority of participating teachers had constructivist conception of teaching. But did they put into practice what they thought was true in their teaching? As table 8 and the scatterplot in figure 2 illustrate, Pearson's r is 0.51 which could be interpreted as a moderate uphill (positive) relationship. Therefore, their conceptions of teaching had a moderate positive influence on their total scores of mediation questionnaire, or to put it another way, on mediation practice. Therefore, the third null hypothesis is rejected, meaning that teachers' teaching conceptions is correlated with their teaching practice in terms of mediation.
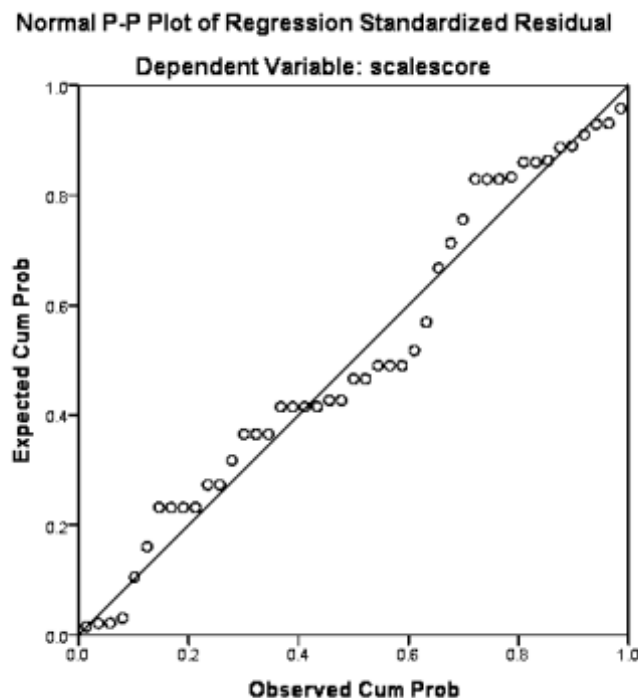

Figure 2. Correlation between teachers' conceptions and their mediation/ scatterplot

Table 8. Correlation between teachers' conceptions and their mediation/ SPSS Report

		Total scores	conception
Pearson Correlation	Total scores	1.000	.510
	conception	.510	1.000
Sig. (1-tailed)	Total scores	.	.000
	conception	.000	.
N	Total scores	45	45
	conception	45	45

DISCUSSION

In this part, the research questions are posed and answered. Then, the findings are discussed and compared to findings from some other related studies.

Research Question 1: Is Learning Mediated by the Teachers in Iranian EFL Classes?

The present study revealed that the majority of teachers (46.7%) declared to have 51 to 75 percent meditation performance in their classes. Seventeen teachers (37.8%) had mediation performance more than 75 percent of the time. So about 62 percent of the teachers had mediation performance of less than 75 percent of the time. Based on this, the answer to this question is positive and learning is mediated by the teachers in the target EFL classes.

Cheng and Cheng (2012) also studied factors of mediation questionnaire answered by a sample of EFL teachers in China in which they claimed to have practiced some factors like "control of own behavior", "challenge", "a belief in positive outcomes", "sharing", and "individuality" more in their teaching, but they had a deficient knowledge of "a sense of competence", "awareness of change", "goal-setting", and "a sense of belonging".

In line with these findings, the results in the present study have shown that "goal setting" and "awareness of change" had the smallest mean scores. But, in contrast to Xiongyong (2012), the two factors "sense of competence" and "sense of belonging" had mean scores of 4.07 and 4.07 (out of 5) and the factor "challenge" had one of the smallest mean scores.

Research Question 2: Is There a Significant Correlation between Their Mediation Performance and the Level They are Teaching?

As there was inadequate research on the effect of level being taught on mediation performance, this researcher decided to check such impact, and based on the results of the analyses of the data, it was revealed that the second null hypothesis is retained and learning level had no impact on mediation of learning by the teacher. Hence, no matter what level of learners is, competent teachers are expected to mediate the process of learning.

Research Question 3: Is their Mediation Performance Correlated with their Conception of Teaching?

Teachers' conceptions or beliefs of teaching was asked of them in the first questionnaire and it was revealed that what the teachers held as their conceptions of teaching or theory of learning had a moderate positive correlation ($r = 0.5$) with their mediation. In fact, 77.8% of teachers considered teaching as a constructivist approach but only 37.8% of teachers *often* practiced mediation in their classrooms regardless of other factors of constructivist characteristics. Therefore, their practice is at odds with their conception.

As the literature suggests, to be aware of the ways in which our practice contradicts the ideal that we hold, we should be willing to probe into the concepts basic to our behavior (Kellough, 1974).

Kohler (2015) emphasizes language teacher's conceptual agenda as the crucial basis in advancing learning and teaching, suggesting educators promote the devotion to the language teacher education about the concept of mediation and the mediatory role of the language teacher.

About the origins of such pedagogical beliefs, Davis & Andrzejewski (2009) point out that the views teachers hold about teaching derive from their personal experiences as learners. Some beliefs may also derive from other personal experiences such as "family traditions and values, social encounters, community participation, popular culture, teacher preparation, observing teachers, professional development, and scholarly literature" (Para. 3).

Therefore, faced with such contradiction of theory and practice, educators may want to improve their education or their knowledge of such important pedagogical principles and educational leaders may need to train their educators.

Mediation is one of the such crucial principles because the mediator's act of making a stimulus meaningfully available to the mediatee changes the stimulus from a "fleeting, randomized, almost imperceptible occurrence a powerful inescapable encounter that will be registered, integrated, and mastered by the learner" (Feuerstein, 1990, p.79).

Conclusion and implications

The findings of the study have a number of pedagogical implications for those interested in furthering their constructivist approach in theory and also their mediation in practice. The focus is on the language teachers who are the primary sources of mediation in the classroom.

The first part of the study put the mediation performance of EFL teachers in the study in perspective, the items were ordered according to the obtained mean scores in the chart below (figure 3) with the item of "challenge"- having the minimum mean score and the item of significance having the maximum mean score among the others.
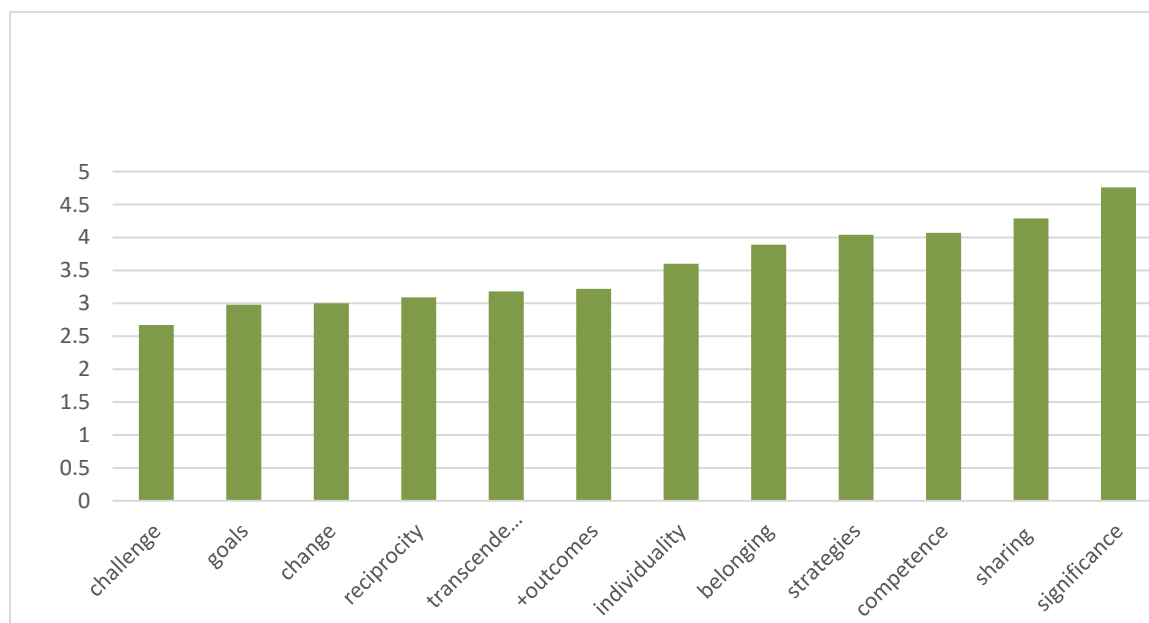
Figure 3. The mediation performance of EFL teachers in perspective

Therefore, to enhance mediation and eventually learning and internalization in the learning setting, they ought to put more effort in setting challenges for their learners to overcome, making their learners set their own goals in learning, making them aware of their changes in such a setting, and explaining the reciprocity and transcendence of any task at hand. The significance of these features is further replicated in the following paragraphs. Nevertheless, the other factors are of importance as well, but having more mean scores, they are believed to be practiced more by the teachers.

Mediation for challenge or what Presseisen (1990) calls "the search for novelty and complexity" is necessary in "developing cognitive ability; heterogeneity helps to extend a learner's mental purview. At the same time, …too unfamiliar a domain actually can preclude mental growth and thus turn off learning" (p.137).

The learning setting proposed by Feuerstein (1990) should be designed in a way to assist children through the zone of proximal development toward the goal of developing higher-order thinking about the content at hand. Such settings should encourage the mediation of goal-seeking, goal-setting, goal-planning and goal-achieving behavior by the teacher who is the co-participant in the act of learning. As Brophy (1986) explains, through this kind of mediation, the learner ideally moves from other-regulation to self-regulation and, ultimately, to internalization of the intelligence.

As a result of the mediation for awareness of change, a sense of achievement cultivates in the learner. Feuerstein (1990) believes that whatever a person's style of behavior, the possibilities of changing their proximal development are great, and in changing their behavior, a definite potential exists for their cognitive development. Therefore, an appropriate kind of mediation enhances learner's modifiability and the chance to teach intelligence.

Parameters of reciprocity (intentionality) and transcendence ensure modifiability. An interaction that is not shaped by these two parameters cannot claim the quality of the interaction that MLE suggests. Reciprocity or intentionality concerns the mediator's intention which modifies the stimulus in order to ensure registration and internalization by the mediatee and transcendence is " not only responsible for the widening of cognitive factors, but also for the constant enlargement of the need systems that acts as the energetic determinant of continuous change and development via intrinsic motivation" (Feuerstein, 1990, p.98).

Furthermore, as found in the second part of this research, mediation should be practiced by competent teachers in all learning settings, no matter what their learners' levels of English competency are. And the third part concluded that teachers develop their conceptual framework and that the language institutes insist on teacher training courses or workshops for more effective internalization of intelligence.

REFERENCES

Ahmadi Safa, M., & Rozati, F. (2017). The impact of scaffolding and nonscaffolding strategies on the EFL learners' listening comprehension development. *The Journal of Educational Research*, *110*(5), 447-456.

Blagg, N. (1991). *Can we teach intelligence? A comprehensive evaluation of Feuerstein's Instrumental Enrichment Program*. Psychology Press.

Brophy, J. (1986). Teacher influences on student achievement. *American psychologist*, *41*(10), 1069.

Cheng, X. (2011). Knowledge of Mediation and Its Implementation among Secondary School EFL Teachers in China. *Theory & Practice in Language Studies*, *1*(9).

Xiongyong, C. (2012). Cognition of mediation among secondary school EFL teachers in China. *International Journal of Business and Social Science*, *3*(14), 233-245.

Cheng, X., & Cheng, H. (2012). Review of mediation from the social constructivist perspective and its implications for secondary school EFL classrooms in China. *Theory and Practice in Language Studies*, *2*(4), 808.

Daftarifard, P., & Birjandi, P. (2017). Impact of mediation types on Iranian EFL learners' reading comprehension strategies. *Journal of Research in Applied Linguistics*, *8*(1), 22-45.

Davis, H., & Andrzejewski, C. (2009, December 23). Teacher Beliefs. Retrieved April 2016, from http://www.education.com/reference/article/teacher-beliefs/

Dewey, J. (1966). Democracy and education (1916). *Jo Ann Boydston (Ed.). The Middle Works of John Dewey*, *9*, 1899-1924.

Duckworth, E. (2006). *The having of wonderful ideas and other essays on teaching and learning*. Teachers College Press.

Engeström, Y. (1999). *Activity theory and individual and social transformation.* In Y. Engeström, R. Miettinen, & R.-L. Punamäki (Eds.), *Learning in doing: Social, cognitive, and computational perspectives. Perspectives on activity theory* (p. 19–38). Cambridge University Press.

Feuerstein, T. (1990). The theory of structural cognitive modifiability. In Presseisen, BZ, Sternberg, RJ, Fisher, KW, Knight, CC & Feuerstein, R.(Eds.) Learning and thinking styles: classroom interaction. Washington, DC: National Education Association. pp 68-134.

Gallus Jr., W. A., Yarger, D. N., & Herzmann, D. E. (2000, September 9). An Interactive Severe Weather activity to motivate student learning. *Bulletin of the American Meteorological Society, 81*, pp. 2205-2212.

Glasersfeld, E. Von (1995). Sensory experience, abstraction, and teaching. In J. &. Gale, *Constructivism in education* (pp. 369-384). New Jersey: Lawrence Erlbaum Associates, Inc.

Hassaskhah, J. (2011). Feuerstein's theory of mediation and its impact of EFL teachers' sense of efficacy. *Journal of English Language Teaching and Learning,* 7.

Karaduman, H., & Gultekin, M. (2007). The Effect of Constructivist Learning Principles Based Learning Materials to Students' Attitudes, Success and Retention in Social Studies. *Online Submission*, *6*(3).

Kellough, R. D. (Ed.). (1974). *Developing Priorities and a Style: Selected Readings in Education for Teachers and Parents.* Ardent Media.

Kohler, M. (2015). *Teachers as mediators in the foreign language classroom* (Vol. 27). Multilingual Matters.

Lantolf, J. P., & Poehner, M. E. (2014). *Sociocultural theory and the pedagogical imperative in L2 education: Vygotskian praxis and the research/practice divide.* Routledge.

Pass, S. (2007). When constructivists Jean Piaget and Lev Vygotsky were pedagogical collaborators: A viewpoint from a study of their communications. *Journal of Constructivist Psychology*, *20*(3), 277-282.

Piaget, J. (1964). Development and learning. In R. E. Rockcastle, & R. E. Rockcastle (Ed.), *Piaget Rediscovered* (pp. 7-20)

Presseisen, B. Z. (1990). Some possible answers: implications for schooling and practice. In Presseisen, BZ, Sternberg, RJ, Fisher, KW, Knight, CC & Feuerstein, R. (Eds.) Learning and thinking styles: classroom interaction. Washington, DC: National Education Association.

Mellati, M., Khademi, M., & Etela, P. (2015). Challenges of mediation theory and gender differences in Iranian EFL contexts. *Theory and Practice in Language Studies*, *5*(8), 1664.

Mitchell, R., Myles, F., & Marsden, E. (1998). *Second language learning theories.* Routledge.

Miller, D. (2011). Miller (1983) revisited: A reflection on EO research and some suggestions for the future. *Entrepreneurship theory and practice*, *35*(5), 873-894. https://doi.org/10.1111/j.1540-6520.2011.00457.x

Naeini, J. (2014). On the Study of DA and SLA: Feuerstein's MLE and EFL Learners' Reading Comprehension. *Procedia - Social and Behavioral Sciences, 98*, 1297-1306.

Rivera, H. & Barboza, S. (2016). The co-construction of participation through oral mediation in the EFL classroom. *Profile Issues in Teachers Professional Development, 18*(1), 149-163.

Seng, A. S. H., Pou, L. K. H., & Tan, O. S. (Eds.). (2003). *Mediated learning experience with children: Applications across contexts*. McGraw-Hill.

Skuy, M. (1996). *Mediated Learning in and Out of the Classroom*. IRI/Skylight Training and Publishing, Inc., 2626 South Clearbrook Drive, Arlington Heights, IL 60005.

Turuk, M. C. (2008). The relevance and implications of Vygotsky's sociocultural theory in the second language classroom. *Arecls*, *5*(1), 244-262.

Tynjälä, P. (1999). Towards expert knowledge? A comparison between a constructivist and a traditional learning environment in the university. *International journal of educational research*, *31*(5), 357-442.

Tahriri, A., & Rezaee-Manesh, N. (2015). The relationship between EFL instructors' knowledge of mediation and their classroom practice. *International Journal of Research Studies in Language Learning, 4*(2), 89-104.

Wertsch, J. V., del Río, P. E., & Alvarez, A. E. (1995). *Sociocultural studies of mind*. Cambridge University Press.

Williams, M., & Burden, R. L. (1997). *Psychology for language teachers: a social constructivist approach.* Cambridge: Cambridge university press.

Yarger, D., Thomas, R., Boysen, P., & Marlino, M. (1999). Developing and implementing a constructivist learning environment: Translating theory into practice. Iowa City: Iowa State University. Retrieved December 12, 1999.

Zhao, G. L. (2015, January). Study on the Mediation of English Teachers in the Students' Autonomous Learning. *International Journal of Humanities and Social Science, 5*(1), 184-200.