



Improving the quality of Farsi speech and the academic performance of Azeri-Farsi bilingual students through attending drama therapy sessions



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ABSTRACT

This paper investigates the effects of drama therapy on enhancing the linguistic performance and academic achievement of Azeri-Farsi bilinguals who speak Farsi as a second language. To that end, thirty-seven male bilingual students of Azeri and Farsi (age: 9.32 ± 1.12 years) were randomly assigned to an experimental group ($N = 18$) and a placebo group ($N = 19$). The experimental group participated in 90-min drama therapy sessions twice or thrice a week for three weeks. During this period, the members of the placebo group were engaged in effortless activities. The MANCOVA results revealed the positive effect of drama therapy on the Mean Length of Utterances and the Speed of Speech in bilingual students, but it showed no effect on the Number of Utterances, Type-Token Ratio, and the Academic Average. In conclusion, we will discuss the possible factors that mediate such effects and indicate a number of directions for future research.

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In this era primarily characterized as the communication age, people from different ethnicities, cultures and languages come into contact, mingle and live together, turning homes to a hub of multilingual and multicultural interactions. It has been estimated that approximately 60% of the world's population is either bilingual or multilingual, using routinely two or more languages in their daily communication (Baker, 2001; Padilla, 1990). Accordingly, multilingualism and multiculturalism have found their ways to most classrooms and playgrounds as the social facts of this new century (Luke, Comber, & O'Brien, 1996). Though intermingling of languages and cultures has proved beneficial for dialog between nations, it has turned out to be difficult for multilinguals who need to master a formal language-different from that spoken at home-for their academic achievement and successful interaction with the wider society (Riaux, 2008). Such a situation calls for thoughtful endeavors to lessen the problems faced by multilinguals and to help them enhance their language learning abilities and gain social success. The present research falls in this category by aiming at an investigation of the linguistic and academic performance of Azeri-Farsi bilingual students, and proposing a solution to improve their performance through the remedial function of art, namely drama therapy sessions.

The environment in which Azeri-Farsi bilingual students are studied is Iran, a country with a considerable ethnic and cultural diversity. The formal language of the country is Farsi. It is used in all the academic and official situations, leaving no space for the use of the local languages in these situations, and thus giving rise to bilingualism in some areas. One such area is the province of Azerbaijan where people are mostly Azeri-Farsi bilinguals who speak Azeri (Riaux, 2008) as their first language and Persian (Farsi) as their second language. They make up approximately sixteen percent of the total population of the country.

Bilingualism and academic performance

Different studies indicate that students from diverse nationalities and languages have not been successful in their education at schools using formal language other than theirs. This is because either they lack compatibility with the school environment or they have problems with other students because of speaking a different language (Darcy, 1953; Delpit, 1995). In line with the concerns of the present study, Riaux (2008) has shown that Iranian students from different ethnicities, with different vernaculars from that of the official language and a low level of proficiency in their official language are not fully prepared to understand class trainings, hence they have a lower academic performance and compatibility. Since there is an overwhelming grammatical difference between Farsi and Azeri languages, Azeri students experience serious problems in learning and using Farsi as their academic language

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and consequently suffer from poor academic performance in their school education.

Being bilingual does not necessarily put these students at a cognitive disadvantage. Up until 1962, a negative opinion about bilingualism prevailed among researchers. Mixing of the languages and low performance in one of the languages have led some early researchers to conclude that bilingualism hinders the complete development of the grammar, hence the decrease in their performance. [Petitto et al. \(2001\)](#) has shown that the kind of the language delay observed in bilinguals is only a “protracted language development” in which bilinguals take longer to process their L2. Otherwise, monolinguals and bilinguals show similar evolutionary patterns. Other recent researches have also shown that not only do bilinguals fare a lot better in having a metalinguistic awareness that monolinguals lack, but also they perform better in some cognitive tasks ([Fromkin, Rodman, & Hymas, 2011](#)).

The pathbreaking study that showed the positive effects of bilingualism was [Peal and Lambert \(1962\)](#). They found that Canadian French-English bilinguals were superior to their monolingual peers in verbal and non-verbal measures of intelligence. Other follow-up studies showed that the superiority of bilinguals lie in their divergent thinking, analytical approach toward language, communicative sensitivity and field independence ([Baker, 1988](#); [Grosjean, 1997](#)). [Cummins \(1979, 1991, 2000\)](#) took up [Lambert's \(1977\)](#) findings on the positive effect of high language proficiency on the educational performance of bilinguals and proposed the threshold and interdependence hypotheses to show the relation between the two languages. Based on threshold hypothesis, high proficiency in the language of instruction (as L2) has a facilitatory effect in bringing about a higher chance of academic achievement. Those students whose proficiency in L2 is relatively weak will tend to fall further and further behind unless the instruction they receive enables them to comprehend the input (both written and oral) and participate academically in class ([Cummins, 2000](#): 175). As a supplement to this hypothesis, the interdependence hypothesis suggests that proficiency in L1 has a positive effect on L2 development. Studies conducted globally on educational bilingualism show that balanced bilinguals, those who are equally proficient in both their languages, perform better than non-balanced ones both in their own vernacular and official languages ([August & Hakuta, 1997](#); [Hakuta & McLaughlin, 1996](#); [Reese et al., 2000](#)). Also in relation to the contributory role of L1 in bilingual education, [Parvanehnezhad and Clarkson \(2008\)](#) have shown that bilingual students switch between their two languages when they are solving mathematical problems and their L1 is an indispensable help in problem solving.

Undoubtedly, bilingualism is one of the main issues of educational system in multilingual countries. In order to confront this issue, two basic approaches are adopted ([Brice, 2002](#)). The first approach is using the mother tongue, especially at early years of education, which is not only the child's absolute right, but also necessary for education. UNESCO, especially in recent decades, promotes mother tongue-based approaches to bilingual education. The second approach is more remedial. Incorporation of remedial activities in special educational programs for bilingual students and providing extensive pre-school education are among the most widely practiced remedial programs.

Bilingualism and the remedial effect of drama therapy

To enhance the quality of Farsi speech and accelerate the educational progress of Azeri-Farsi bilingual students, we propose a remedial approach called drama therapy. Not only is this method favored by children due to the playful nature of it, but also it has favorable educational and therapeutic outcomes without any side effects. Mental health professionals such as psychologists, psychiatrists, and psychotherapists have recently accepted this method as

one of the most effective methods, which has plenty of applications in schools, kindergartens, orphanages, correction and rehabilitation centers, etc., both therapeutically and educationally ([Weber & Haen, 2005](#)). Dramatizing reality has been recognized as a central therapeutic tool by most drama therapists ([Blatner & Blatner, 1988](#); [Duggan & Grainger, 1997](#); [Jenkyns, 1996](#); [Jennings, 1998, 2004](#); [Johnson, 1981, 1991, 2000](#); [Jones, 1996](#); [Lahad, 2000](#); [Moreno, 1987](#); [Pendzik, 2006, 2008](#), among others). Drama therapy emphasizes creativity in order to provide an opportunity for the client to change. For example, a spectator observing a drama therapy intervention may only see what appears to be a child at play, while at same time the child is improvising and using theatrical techniques and is on the road to improving some abilities or gaining some knowledge from the role play ([Kedem-Tahar & Kellerman, 1996](#)). While this metaphor considers observations of the client to appear childlike, it does not mean that it is conducted exclusively with children. It does, however, assume that children or adults will appear childlike when expressing themselves through drama therapy. The childlike behavior is really a metaphor for how free clients appear when participating in drama therapy.

Drama therapy may be executed with either individuals or groups, but it is more frequently performed in groups. A variety of techniques, such as the use of props and masks, music, physical relaxation, imagery, and movement may be utilized in drama therapy ([Kedem-Tahar & Kellerman, 1996](#)). The British Association of Drama Therapists (1992) has adopted the following definition for drama therapy: it has as its main focus the intentional use of the healing aspects of drama and theater as a therapeutic process. It is a method of working and playing that uses action methods to facilitate creativity, imagination, learning, insight, and growth ([Blatner, 2003](#)).

Drama therapy is an improvisational method which takes advantage of dramatic conventions for a remedial reason. From a theoretical and practical point of view, it can well be acknowledged as a method with fundamentally remedial applications in view, while having a link with ancient and conventional themes ([Pendzik, 2008](#); [Weber & Haen, 2005](#)). In 1921, it became prevalent by Moreno and then by Libovisi and Dyaktin in Paris ([Leeder & Wimmer, 2007](#)). This method which emphasizes play, storytelling, legend and myth, motion, sound, and pantomime as suitable educational materials can be applied to children and teenagers as well adults ([Pitruzzella, 2004](#)).

[Fairclough \(1972\)](#) stated that drama can lead to mental, physical, and sentimental freedom in individuals. It can be used to expand human experiences in all the stages of life. It leads to enhanced self-confidence as well as the skillful expression of experiences, and as such it can be applied to class situations to improve the students' speech and educational performance. [Ajuriaguerra \(1980\)](#) demonstrated that using drama therapy proves effective in acquired and selective mutism therapy in the youth. In an investigation on the use of drama for people with learning disabilities, [Melanie \(2000\)](#) found that drama could improve communication and speaking skills of the students participating in drama sessions. [Couroucli-Robertson \(2001\)](#) investigated the effect of a short-run drama therapy on a 13-year-old male adolescent who suffered from speech impediment. Results from this study showed that drama therapy improves the speech skills of an individual through alleviating his psychological distress. Results from studies in the next 2 and 4 months indicated that this individual was recovering from speech disorders. [Hemati \(2008\)](#) in a study on the educational effects of drama on students demonstrated that drama therapy improves the expression capability of the individuals so that they tend to observe brevity in their statements. [Narimani, Biabangard, and Rajabi \(2009\)](#) investigated the effects of drama therapy on social skills and self-esteem of the children suffering from dyslexia (developmental reading disorder) and pointed out that drama

therapy has a positive impact on the speech and communicative skills of dyslexic students.

It must be noted that we have not found any study investigating the effects of drama therapy on augmenting the quality of speech, and relatedly the educational progress of bilingual students. To fill the gap, the purpose of the present study was to determine the effects of drama therapy on the quality of speech and the academic performance of bilingual students, specifically Azeri-Farsi bilingual students, in their second language. It was hypothesized that after drama therapy sessions, the quality of Farsi speech and the academic performance of these Azeri-Farsi bilinguals would undergo an enhancement. This prediction was based on [Courrouli-Robertson \(2001\)](#) that has shown drama therapy leads to the solution of the problems related to communicational/verbal skills and the academic performance of individual participants. Accordingly, it is expected that after drama therapy sessions, a substantial change will be observed in the five sub-scales of the objective indicators of speech quality evolution, i.e. the Number of Utterances, Mean Length of Utterances, Type-Token Ratio, the Speed of Speech, and the Academic Average of bilingual students.

Methodology

Participants

Thirty-seven bilingual male students aged 9–10, with the mean of 9.32, from the third grade in a primary school of Ardabil participated in this study running from January to July 2011. As many as 18 and 19 students were randomly selected for drama therapy group and placebo group, respectively.

Materials

Before and after the sessions, measures indicating the subjective assessment of the state of the participants were obtained via language sampling ([Rezapour Mirsaleh, Abdi, Rezai, & Aboutorabi Kashani, 2010](#)) and the Academic Average.

Method of language sampling: There are several common methods of language sample elicitation. Among these methods, storytelling is a prominent one ([Southwood & Russell, 2004](#)) as it has proved helpful in eliciting language samples containing different linguistic items ([Rezapour Mirsaleh et al., 2010](#)). This method is supplemented with spontaneous data elicitation which forms an important part of the language evaluation protocol ([Evans & Craig, 1992](#); [Evans & Miller, 1999](#)). To test the different aspects of the language produced by the children with little self-motivated speech, some means of standard measures (or indexes), like prompting the children to tell stories about picture series, have been implemented which also have a long successful history ([Klee, Stokes, Wong, Fletcher, & Gavin, 2004](#); [Rice, Redmond, & Hoffman, 2006](#)). Having the beneficial aspects of these methods in mind, we opted for a combination of these methods to obtain the samples, lasting 5 min, in Persian.

Story generation:

1. The researcher requested the child to tell a story about a particular topic.
2. The researcher requested the child to tell a folk story (for example, the familiar story of Bozboz-e-Ghandi (*The Sweet Goat*) for Iranian children).
3. The researcher gave a prompt to the child such as picture series and then requested him to tell a story about it.
4. The researcher told a story and then requested the child to retell it (adopted from [Southwood & Russell, 2004](#)).

For keeping the situations similar for all participants, we used the same tasks and materials in administering each method. For instance, we used the same picture series and requested all participants to retell the same folk story.

Language samples elicited by each method were recorded audiotape and were transcribed by the first author. Language samples were compared based on four language evaluation criteria: (a) Number of Utterances, (b) Mean Length of Utterances, (c) Type-Token Ratio, and (d) Speed of Speech.

- (a) Number of Utterances: The Number Of Utterances is the sum of single words, single phrases, and dependent and independent clauses.
- (b) Mean Length of Utterances: This criterion was acquired from dividing the number of morphemes used in each language sample by the total Number Of Utterances elicited.
- (c) Type-Token Ratio: Type-Token Ratio was calculated by dividing the number of different words (types) by the total number of words (tokens)
- (d) Speed of Speech: The Speed of Speech is the sum of words in a minute ([Rezapour Mirsaleh et al., 2010](#)).

To evaluate the reliability of the language sample analysis, we followed the procedure put forward in [Rezapour Mirsaleh et al. \(2010\)](#). They randomly analyzed 20 language samples again and found out that the percentage of the inter-judge reliability was 100% for the Number of Utterances and Mean Length of Utterances, 98% for Type-Token Ratio, and 96% for Speed of Speech.

Procedure

This study used the pretest–posttest experimental and control group design with random assignment. In the first stage, informative notices were displayed on all the bulletin boards around the campus and volunteering students and their parents were invited to apply for an initial interview. In these interviews, participants were given the drama therapy rationale and the aims of the study. Applicants were asked whether they would be able to participate in all sessions.

In the next stage, experimental and control groups were formed through random assignment from a subject pool of 40 individuals. The experimental group ended up with 20 subjects, and the placebo group with 20. Only 18 subjects of the experimental group were able to complete the process. During the study, one student dropped out after the second session with no excuse, and one student dropped out after the sixth session due to poor health. In the placebo group, 19 out of the initial 20 students completed the process.

All sessions were conducted by a psychological counselor who was at the same time a drama therapy session leader. Another expert psychological counselor also attended these sessions. This counselor sat at the table outside the group circle throughout the sessions and kept reporting the process. At times, the expert counselor also participated in role-playing in the sessions when all participants played a role. Where the expert counselor in psychology should sit and when he would participate were decided collectively by the group members.

Drama therapy follows a typical framework for sessions ([Meyer, 2010](#)):

1. Check-In
2. Warm-up
3. Scene Implementation/Major Activity
4. Debrief/Process the Scene
5. Closing Activity/Conclusion

One key principle of drama therapy is the focus on group readiness or the level of comfort in the group to move on to the next stage in the drama therapy session. For example, if during the *check-in* stage, the group members were having difficulty processing where they were in that moment, this would be worked through prior to moving on to the warm-up stage. The process of group readiness develops and creates stable relationships within the group (Johnson, 1982). The clients feel safe knowing they will not be asked to do anything unless they are ready.

Check-in is the point in the counseling session when the clients acknowledge what thoughts and feelings they are bringing into the current drama therapy session. During the check-in, the counselor may simply ask where each individual is or may turn this into an activity. For example, the counselor may ask the group members to create a spectrogram. A spectrogram is a live continuum. Here the clients are directed to rate their current stress on a continuum. The counselor may consider one side of the room to represent a certain state like relaxation and the opposite side to be overwhelmingly stressful for speaking Farsi language in group. Then the clients are asked to physically place themselves on this continuum by assessing their current stress. Multiple spectrograms may be utilized as parts of the check-in process.

The next stage, *warm-up*, prepares the clients to act or preparing them for the scene that will take place later in the drama therapy session. This is often viewed as a creative play. Any exercise preparing the group members, their minds and bodies for the scene would be appropriate. For example, for a warm-up, the counselor may ask group members to mirror one another. Group members may be directed to walk around the room expressing themselves in a manner that is congruent with their inner selves. One group member may then be selected to approach another group member and mirror the behavior and expression portrayed by the other group member. The process may repeat itself until all group members have had the opportunity for their expressions and the Persian speech has been copied by all the members of both groups. Warm-ups may incorporate a variety of elements including music, movement, props, or masks.

The next stage, which focuses on the *scene implementation*, is considered the main intervention in any drama therapy session. The scene typically is an ensemble work where all group members will usually be expected to participate. In drama therapy, the scene is a fictional one. This scene could range from the use of a metaphor to a scene from a well-known book, play, television show, or movie. If a metaphor is used, the group members will most likely decide on a concrete subject matter, but they still act it out in a fictional scene (Jacobse, 1994). For example, the group may act out a scene exploring the metaphor “a bird in the hand is worth two in the bush.” The characters in this role-play may include all three birds, the bush, an individual with the bird in the hand, and an individual trying to get the two birds out of the bush. While using drama therapy, it is appropriate if you counsel someone individually. It is also important to remember that not all works in drama therapy is fictional. For example, in Emunah’s (1997) Integrated Five-Phase model, non-fictional works are also encouraged. Using this model, the group members may be asked to act out a scene that happened to one of the group members. Here the group member, who would be the protagonist, selects the other group members to portray members of his/her family. Regardless of the fictionality or non-fictionality of the scene, the counselor may include a variety of techniques in the scene such as pausing the scene to process what is happening or creating alternate endings for the scene.

Jacobse (1994) suggests that the counselor should be prepared prior to the beginning of the *scene implementation* stage. The counselor should have a scene in mind prior to the session, yet he should be flexible in meeting the needs of the group by either adjusting the scene accordingly or using a different scene. Though the scenes are

typically improvised, he argues that the scene should have a clear beginning, middle, and end with specific character roles that the clients choose. This encourages the clients to accept the responsibility of the role or the character they are supposed to play and develop, especially as the group members need to remain in their adapted character throughout the scene. Moreover, the scenery for the role-play should have a tangible description, so that the scenery and the props are not confused during the scene. To make sure that the scene is proceeding, the counselor must also attend to the mechanical aspects of the scene. For example, if one of the clients is not projecting, it may interfere with the communication between other members of the group.

After the group members perform the scene, the counselor gives them an opportunity to *debrief*. This allows the clients to process the scene, share their thoughts and feelings about the role-play, and to relate the scene to their real lives. The counselor may also help each client assess the patterns of behaviors in the roles, so that the patterns do not perpetuate the undesirable behaviors in the client’s life – in this case, more specifically the Farsi speech under study. As Jacobse (1994) proposes, the clients should be encouraged to say what they did in the scene and not what their characters did. This encourages the clients to speak and to accept the responsibility for their actions. Throughout this process, the atmosphere is open, flexible, and supportive of the needs of the clients.

The session will end with a *closing activity*, in which the clients are no longer playing the characters from the scene, but they are back to themselves. The closing activity revolves around the clients proceeding forward with what they have learned in the session or during the time of relaxation. For example, each person may be asked to share something he or she has learned from the session to apply to his life. The client could also share something he or she has learned about himself. The *closing activity* makes the client ready to depart the counseling session and allows the counselor to wrap up counseling. If the closing of the session focuses on relaxation, the session may conclude with a guide imagery. The *closing activity* may also follow a more traditional counseling format where the counselor summarizes the session and asks the client if he has something to share before the end of the session. Whatever activities are selected for the drama therapy sessions, the goal is to discover and fulfill the needs of the group members as the clients. In our study, the need we want to fulfill is improving the Farsi speech of the clients; therefore, we encouraged all participants to speak in Farsi- their second language- during all sessions.

Eight sessions were administered 2–3 times a week at an approximately identical time of the day (90 min). The control group received placebo sessions (such as painting game, watching cartoon programs, etc.) equivalent in time to the drama therapy sessions. Three weeks after the end of the data collection process, the participants’ parents were presented with the preliminary results of the study.

Statistical evaluation

All strategy data were normally distributed. The Bartlett Test showed homogenous variances. Also, Box’s test was not significant ($F = 1.006$; $\text{Box} = 18.74$, $P = 0.44$). The parametric procedure applied in this study was multivariate analysis of covariance (MANCOVA). The data were assessed separately for the first and the last sessions. The significant level was set at <0.05 .

Results

Descriptive statistics of all language sampling measures and Academic Average are presented in Table 1.

As can be seen in Table 1, the task succeeded in provoking a substantial change in Mean Length of Utterances and the Speed

Table 1
Means and standard deviations on language sampling measures and academic average in each group before and after training.

Variables		Time1		Time2	
		SD	M	M	SD
Drama therapy	Number of Utterances	0.38	0.49	0.73	0.26
	Mean Length of Utterances	1.76	12.15	14.00	1.85
	Type-Token Ratio	1.50	5.60	6.26	1.43
	Speed of Speech	2.97	217.40	219.73	2.73
	Academic Average	0.90	17.10	17.40	0.98
Placebo	Number of Utterances	0.36	0.60	0.64	0.34
	Mean Length of Utterances	1.67	12.58	12.85	1.63
	Type-Token Ratio	1.36	5.00	5.26	1.57
	Speed of Speech	1.63	216.66	217.27	1.57
	Academic Average	1.03	16.73	16.77	1.04

Number of Utterances, Mean Length of Utterances, Type-Token Ratio, the Speed of Speech, Academic Average.

of Speech in experimental group. The pre-session Mean Length of Utterances scores were 12.15 (1.76) for the experimental group and 12.58 (1.67) for the placebo group. The post-session Mean Length of Utterances scores were 14.00 (1.85) for the experimental group and 12.85 (1.63) for the placebo group. There was an approximately 2-point increase for the experimental group and less than 50% of increase for the placebo group. Also, the mean of pre-session Speed of Speech scores were 217.40 (2.97) for the experimental group and 216.66 (1.63) for the placebo group. The mean of post-session Speed of Speech scores were 219.73 (2.73) for the experimental group and 217.27 (1.57) for the placebo group. There was an approximately 2-point increase for the experimental group and a less than 1-point increase for the placebo group. However, there was no substantial change obtained for Type-Token Ratio, Number of Utterances, and Academic Average. Also, in placebo group, no substantial changes in all language sampling measures and Academic Average variable were acquired.

Regarding the effects of drama therapy on the quality of Farsi speech and the average academic grade of bilingual students, the results from MANCOVA indicated a significant difference between the two experimental and placebo groups, in terms of at least one dependent variable ($F_{(5,19)} = 4.33$, Wilks' Lambda = 0.46; partial eta squared = 0.53, $P = 0.01$).

As can be read from Table 2, the MANCOVA analysis of the initial scores of all language sampling variables and the disclosed Academic Average showed that the pretest had influenced post-test scores (Number of Utterances: $F_{(5,19)} = 12.031$, $P = 0.002$; Mean Length of Utterances: $F_{(5,19)} = 73.054$, $P = 0.0001$; Type-Token Ratio: $F_{(5,19)} = 57.487$, $P = 0.0001$; Speed of Speech: $F_{(5,19)} = 19.568$, $P = 0.0001$; and Academic Average: $F_{(5,19)} = 72.351$, $P = 0.0001$). The MANCOVA on the post-session scores of the Mean Length of Utterances variable indicated significant difference between the two groups after training ($F_{(5,19)} = 23.463$, $P = 0.0001$). In addition, the results of MANCOVA on post-test grades for Speed of Speech variable showed a significant difference between the two groups ($F_{(5,19)} = 7.178$, $P = 0.01$). However, no significant difference was found for variables such as Number of Utterances, Type-Token Ratio, and Academic Average.

Discussion

The quality of Farsi speech

One of the main aims of this study was to establish the effects of drama therapy on the quality of Farsi speech. Sessions of drama therapy produced, on average, greater improvements in Mean Length of Utterances and the Speed of Speech in the experimental group compared with the placebo group. These changes were

most notable in the subscale Mean Length of Utterances with participants having drama therapy. Furthermore, participants in the drama therapy group improved in the Speed of Speech. This was in line with the findings of Melanie (2000), Couroucli-Robertson (2001), Hemati (2008), as well as Narimani et al. (2009).

The intervention method of the present research proves to be effective due to the recreative and remedial characteristics of drama: drama as a verbal and communicational tool not only recreates human's experiences and lets spectators get involved emotionally to perceive and learn deeper and to have more delicate and elevated manner, but also has a vital function in recreating the facts and the situations of the daily life. Relatedly, Lindkvist (1977) has found drama as an opportunity for repeating and experiencing the facts and conditions of life. In the present case, Azeri-Farsi bilingual students lack self-confidence due to the problems they have in using the formal language (Persian) in real situations. The theatrical atmosphere of this study helps the students to get fully involved and overcome their lack of self-confidence, and hence the improvement in the quality of their speech.

Drama therapy provides a safe and supportive space for individuals to discover their own matters and concepts. Getting through one's own subjects and personal concepts leads to insight, self-recognition, breaking resistance, and finally learning new behaviors (Pendzik, 2006). In the present study, drama therapy affects the participants' quality of speech by moving the focus away from language use to the play and thus changing the individuals' way of thinking about their second language so as to create new relationships in the group through the medium of their second language. The playful nature of drama therapy has a great effect on forgetting about the stressful conditions of the formal language use, breaking the internal resistance due to lack of self-confidence and improving the quality of the participants' speech while they are busy playing and communicating with others and concerning less about the formal language use.

Stress often prevents bilingual students from using their second language. This problem might be an indication that bilinguals suffer from some impeding emotions like shyness. Since they could not share the feeling with their family members or peers, the result shows up in the form of a hindrance to the second language use. According to Couroucli-Robertson (2001):

Any emotion, which cannot be released, is a stress for the muscles. This is true because an emotion is a charge, which presses outward for release. A few examples will illustrate these ideas. Sadness or hurt feelings are released through crying. If crying is inhibited because of parental objections or for other reasons, the muscles, which normally react in crying, become tense. These are the muscles of the mouth, throat, chest, and abdomen (p. 8).

It seems that the drama therapy intervention enhances the Mean Length of Utterances and the Speed of Speech as a result of alleviating the boys' psychological distress.

Drama therapy encourages creative symbolic solutions for internal tensions and problems (Couroucli-Robertson, 2001). Through projection, the client is kept a step away from himself and, therefore, a feeling of security may be established.

Role playing improves the quality of speech by providing an opportunity to learn the official Farsi language in a safe and supporting environment. Also, since the most important aspect of drama therapy that distinguishes it from other therapeutic methods is its practicality and functionality (Blatner, 2003), and as the most part of information is memorized through speaking and interacting (Wood, 2008), the instructions given throughout the drama therapy sessions persist for a longer period, and this mechanism maintains and reinforces the learned behavior in public environments. In addition, it is a type of co-operative learning. Investigations by Christian and Genessee (2001) have shown that

Table 2
Multivariate Analysis of Covariance (MANCOVA) on all language sampling measures and academic average in experimental and placebo groups.

Source	Variable	SS	MS	$F_{(5,19)}$	Sig.	ES
Number of Utterances (NU)	NU ^a	1.173	1.173	12.031	.002	.343
Mean length of Utterances (MLU)	MLU ^b	38.981	38.981	73.054	.000	.761
Type-Token Ratio (TTR)	TTR ^c	31.478	31.478	57.487	.000	.714
Speed of Speech(SS)	SS ^d	56.969	56.969	19.568	.000	.460
Academic Average	Average ^e	15.559	15.559	72.351	.000	.759
Group	NU ^a	0.159	0.159	1.634	.214	.066
	MLU ^b	12.520	12.520	23.463	.000	.505
	TTR ^c	0.556	0.556	1.015	.324	.042
	SS ^d	20.898	20.898	7.178	.010	.238
	Average ^e	0.273	0.273	1.268	.272	.052
Error	NU ^a	2.242	0.097			
	MLU ^b	12.273	0.534			
	TTR ^c	12.594	0.548			
	SS ^d	66.963	2.911			
	Average ^e	4.946	0.215			

^a R squared = .441 (adjusted R squared = .295).

^b R squared = .871 (adjusted R squared = .838).

^c R Squared = .824 (adjusted R squared = .777).

^d R squared = .639 (adjusted R squared = .545).

^e R squared = .843 (adjusted R squared = .802).

co-operative learning programs, especially successful programs for all, which are a combination of co-operative learning and educational learning accompanied by supportive services, have had the highest effect on students' learning the official language.

Although speech is widely said to be an unconscious behavior, there are conscious aspects to it as a purposeful behavior. Speech is constantly supervised and controlled by mental processes governing the linguistic behaviors from structural, functional, and semantic point of view (Rescolar & Achenbach, 2006). Whenever an error or a mistake occurs in the hierarchical structural procedure or its aim-content during the mind's planning process and the transferring of concepts to sounds, a conscious speaker corrects the word, phrase or even the sentence which contains errors in his speech. Therefore, consciousness and the constant supervision of the quality of speech and the placebo of purposeful sound chain is the crucial and main characteristic in the speech of each authentic speaker. Drama therapy- as a planned and purposeful activity- can enhance social and group transactions by using techniques such as pantomime, role playing, singing, and projection in future. It also develops interpersonal experiences. Consequently, these interactions and indirect trainings of Farsi speech produce changes in cognition both at conscious and unconscious levels, leading to the identification and recognition of personal abilities and disabilities as well as personal potentials; the end result of such an insight for these bilingual students is an increase in the quality of their Farsi speech.

In the present study, no significant differences were observed in the Number of Utterances and the Type-Token Ratio. These variables evolve through a transitional process. Speech and language development are useful initial indicators of a child's overall development and cognitive ability (Rescolar & Achenbach, 2006), and there has been an increasing emphasis on studying the link between infant speech perception and later language acquisition (Werker & Curtin, 2005). During the first year of life, these perceptual processes become language-specific, with infants paying particular attention to those values that are important in their native language (Werker & Tees, 1984). At the same time that they are showing attention to category and word-level properties, infants also detect within-category-phonetic differences (Eimas & Miller, 1992; Kuhl, 1983; McMurray & Aslin, 2005), show attention to contextual effects such as speaking rate (Eimas & Miller, 1992), utilize sub-categorical information such as co-articulatory cues (Curtin, Mintz, & Byrd, 2001), and utilize stress (Johnson & Jusczyk, 2001; Thiessen & Saffran, 2003). This process takes years

to lead to proficiency in the language. Thus, lack of improvement in the Number of Utterances and Type-Token Ratio demonstrates that these factors evolve through a transitional process, making it very hard, even impossible, to achieve noticeable changes in these variables after holding a couple of drama therapy sessions.

Academic performance

Another aim of this study was to establish the effects of drama therapy on the academic performance. Final semester grades showed that scores in the drama therapy group were better than those of the placebo group after attending the sessions. But this difference was not significant.

There are two possible reasons for this result, one methodological and the other theoretical. Methodologically speaking, the number of sessions held in the present study was only eight, while approximately 12–15 sessions have been used in previous studies to effect a change in the behavior of the subjects. Since the academic performance or achievement is the result of a cognitive activity over time, it is too robust to change it in only eight drama therapy sessions. From a theoretical perspective, it must be noted that academic progress is a result of better learning and learning is the result of various factors that fall in two categories: the internal and the external classroom factors (Bossaert, Doumen, Buyse, & Verschuere, 2011). Thus, a multiphase intervention is needed to improve the academic performance of bilingual students. Lack of improvement in variables such as Number of Utterances and Type-Token Ratio can also be account for based on the same reasons.

This study had several limitations. First of all, the number of sessions was limited and therefore not enough to bring about a change that only occurs over time. It will be beneficial to increase the number of the drama therapy sessions to effect remarkable changes. Another limitation of the study was the lack of a follow-up study which would have helped the participants with the establishment of the long-term effects of drama therapy participation. Moreover, the present study was done merely on boys. An investigation into the effects of drama therapy on bilingual female students is recommendable. The future drama therapy research can as well expand the emphasis beyond the evaluation of linguistic measures of language acquisition and include an examination of the socio-cultural and psycho-emotional issues that affect second language fluency.

The design of the study would have been better served if the placebo group had been engaged in some form of verbal communication. In this way, the results would have potentially been

indicative of the distinctions between the effects of the drama therapy intervention and the extended opportunity for ordinary conversation alone. As described in the “Procedure” section of this manuscript, the placebo group was only engaged in “effortless activities” such as “painting game, watching cartoon programs, etc.”.

Conducted with the aim of establishing the effects of drama therapy training on the quality of Farsi speech, the findings of the study suggested that drama therapy was an effective method in developing the Mean Length of Utterances and the Speed of Speech in Azeri-Farsi bilingual students. The results also point out that certain arrangements need to be changed in the treatment procedure to get at the desired effect. For instance, the drama therapy program should last for more than eight sessions and span over a minimum of 6 months so that clearer and more effective results are obtained. In spite of the limitations of the study which was conducted with a small number of subjects, in a unique cultural setting, over a relatively brief amount of time, the results can be trusted. The experimental procedure was carefully undertaken, and as can be read from Table 2, the effect size of one of the variables was 0.24 and another variable 0.50; therefore the results can be applied more broadly with other subject groups in varied bilingual settings.

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