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Applying the Theory of Multiple Intelligences in Teaching Vocabulary to Iranian Beginner EFL Learners

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Abstract

The concept of intelligence might be used to describe individual differences in the way people learn. Many researchers in the field of TEFL or TESOL have attempted to find a logical relationship between intelligence and second language teaching and learning. In 1983 Dr. Howard Gardner proposed a new theory named Multiple Intelligences (MI) Theory. Gardner (1983) defined eight different types of intelligences and suggested a general definition for intelligence as "the capacity to solve problems or to fashion products that are valued in one or more cultural setting" (Hatch & Gardner, 1989, p85, cited in Armstrong, 2000). This study was designed to investigate the reciprocal relationship between musical and pictorial intelligences and musical and pictorial vocabulary teaching strategies. This quasi-experimental study limited itself to only pictorial and musical intelligences in order to control the results and interpretations. The findings of the study also revealed the significance of considering EFL learner's capabilities in SLL and the necessity of using various teaching strategies to fulfill different learner as well as teacher needs and interests.

Keywords: intelligence, more dominant intelligence, musical type learners, pictorial type learners

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1.1 Intelligence

Intelligence is defined as "the capacity to solve problems or to fashion products that are valued in one or more cultural setting." (Hatch & Gardner, 1989, p85, cited in Armstrong, 2000)

1.2 MDI

More dominant intelligence of each learner, based on the MIDAS test result.

1.3 Musical type learners

The learners with more dominant intelligence in music, as determined by the MIDAS test results.

1.4 Pictorial type learners

The learners with more dominant intelligence in pictures, as determined by the MIDAS test results.

2. Introduction

Individual differences in TEFL environments have already prompted a considerable number of researches and, directly or indirectly, made a significant impact on language education. The significance of learner variables in language teaching has been studied extensively, including abilities, motivation, cognitive styles, and teaching strategies as would be described in part 3.5 of this article. Theories of intelligence (e.g., Gardner, 1989; Gilford, 1990; and Sternberg, 1985) clearly indicate that there are various types of competencies and distinct linguistic abilities that differ across individuals. But what kind of relationship, if any, does exist between different types of intelligence and language teaching strategy? Also applying MI theory has not taken into consideration so far even it has been past around twenty years of proposing the theory by Gardner in 1983.

3. Literature Review

3.1. The historical review of intelligence and intelligence tests

In 1904, the minister of Public Instruction in Paris asked the French psychologist Alfred Binet and a group of colleagues to develop a means of determining which primary grade learners were at risk for failure so these learners could receive remedial attention. Out of their efforts came the first intelligence test which was later imported to the United States, intelligence testing became widespread, as did the notion that there was something called *intelligence* that could be objectively measured and reduced to a single number or *IQ* score (Boring, 1950).

Almost eighty years after the first intelligence tests were developed; Gardner challenged this commonly held belief. He believed that our culture had defined intelligence too narrowly; in *Frames of Mind: The Theory of Multiple Intelligences*, he proposed that the existence of at least seven basic intelligences (Gardner, 1983). More recently, he has added an eighth, called naturalist intelligence, and discussed the possibility of a ninth (Gardner, 1999).

3.2. Multiple Intelligence Theory

The idea for investigating multiple intelligences came from Gardner's experience as a teacher. He noticed that while an individual may be highly proficient in one skill or ability, similar competence in another skill may be greatly lacking. A talented musician, for instance, might encounter difficulty in learning the lexicon or mastering even the rudiments of syntax in second language, though it had once been thought that the abilities to create music and to write emerged from the same hemisphere of the brain (Snider, 2001).

3.3. The Intelligences described in MI Theory

According to Armstrong, (2000), Gardner's theory of multiple intelligences posits that human being possess at least eight intelligences described briefly below.

3.3.1. Linguistic intelligence: The capacity to use words effectively, whether orally or in writing.

3.3.2. Logical-Mathematical intelligence: The capacity to use numbers effectively (e.g., as a mathematician, tax accountant, or statistician) and to reason well (e.g., as a scientist, computer programmer, or logician).

3.3.3. Spatial intelligence: The ability to perceive the visual-spatial world accurately (e.g., as a hunter, scout, or guide) and to perform transformations on those perceptions (e.g., as an interior decorator, architect, artist, or inventor).

3.3.4. Bodily-Kinesthetic intelligence: Expertise in using one's whole body to express ideas and feelings (e.g., as an actor, a mime, an athlete, or a dancer) and facility in using one's hands to produce or transform things (e.g., as a craftsperson, a sculpture, mechanic, or urgent).

3.3.5. Musical intelligence: The capacity to perceive (e.g., as music aficionado), discriminate (e.g., as a music critic), transform (e.g., a composer), and express (e.g., as a performer) musical forms.

3.3.6. Interpersonal intelligence: The ability to perceive and make distinction in the moods, intentions, motivations and feelings of other people.

3.3.7. Intrapersonal intelligence: Self- knowledge and the ability to act adaptively on the basis of that knowledge.

3.3.8. Naturalistic intelligence: Expertise in the recognition and classification of the numerous species -- the flora and fauna -- of an individual's environment.

Although the intelligences are anatomically separated from each other, Gardner claimed that the eight intelligences very rarely operate independently. Rather, the intelligences are used concurrently and typically complement each other as individuals develop skills or solve problems. For example, a dancer can excel in his art only if he has 1) strong musical intelligence to understand the rhythm and

variations of the music, 2) interpersonal intelligence to understand how he can inspire or emotionally move his audience through his movements, as well as 3) bodily-kinesthetic intelligence to provide him with the agility and coordination to complete the movements successfully (Brualdi, 1996, p135)

3.4. MI Theory

Beyond the descriptions of the eight intelligences and their theoretical underpinning, certain points of the model are important to remember.

- Each person possesses all eight intelligences. MI theory is not a type theory for determining the one intelligence that fits. It is a theory of cognitive functioning and it proposes that each person had capacities in all eight intelligences. "Most of us fall somewhere in between these two poles- being highly developed in some intelligences, modestly developed in others, and relatively underdeveloped in the rest" (Armstrong, 2000, p8).
- 2. Most people can develop any intelligence to an adequate level of competency. Although an individual may bewail his deficiencies in a given area and consider his problems innate and intractable, Gardner suggested that virtually everyone has the capacity to develop all eight intelligences to a reasonably high level of performance, if given the appropriate encouragements, enrichment and instruction.
- 3. Intelligences usually work together in complex ways. Gardner pointed out that each intelligence described above is actually a fiction; that is no intelligence exists by itself in life. Intelligences are always interacting with each other.
- 4. There are many ways to be intelligent within each category. There is no standard set of attributes that one must have to be considered intelligent in a specific area. Consequently a person may not be able to read and yet be highly lingual, because he can tell a terrific story or has a large oral vocabulary. (Armstrong, 2000, p9)

3.5. Research Findings

Since 1993, the theory drew many educationists' attention in language teaching and learning. As a result, a gamut of investigations have been carried out in the field of language learning and teaching focusing on this theory.

Diaz and Heining-Boynton (1995) used students' MIs to teach them culture in second language classrooms. They found out that by appealing to students' MI in a multicultural setting, students will learn more about their own culture and the target culture. Using MI as a basis for discovering cultures, students were more immersed in the target culture and therefore achieve a holistic understanding.

Anderson (1998) examined the effect of using multiple intelligence approaches and memory enhancement tools on increasing retention of foreign language vocabulary. The results showed an increase in scores on biweekly vocabulary quizzes, increase in awareness of memory techniques for foreign language vocabulary mastery, and awareness of varied learning styles in both teacher and students.

Haley (2001) utilized MI theory to construct teaching practices and instructional strategies. The results of his study reveal that teachers who made use of MI strategies and approaches felt a drastic change in their career, approaching to a more student-centered setting. Such teachers were reported to be more energetic and enthusiastic about their teaching and interacting with students.

Hoseini (2003) studied the relationship between MI theory and Kolb Learning Theory. She signified that there is a direct relationship between students MDI and their preferable learning style.

In his study, Palmberg (2002) showed how teachers can optimally satisfy learners with different intelligence profiles during a foreign-language lesson. He also suggested ways in which a secure and relaxed learning environment can be created. Saeidi (2003) examined the impact of MI-based focus on form (MI-F on F) on enabling EFL learners to develop both the grammatical knowledge of the target structure and the ability to use it in context. The results of Saeidi's study showed that:

- 1. MI-F on F instruction enabled the learners to successfully apply their gained grammatical knowledge of the target structure to meaningful context of language use.
- 2. MI-based instruction had a positive role on the development of abilities in a range of intelligence areas, especially, logical intelligence.
- 3. MI-F on F developed learners' positive attitudes towards language learning.

Iranmanesh (2005) investigated the relationship between MI and ESP reading comprehension of Iranian EFL learners. The results revealed very strong correlation between learner's MIs and their ESP reading comprehension and, suggested that teachers should attempt to cover the required material in a way that is flexible enough to give the students of different intelligences and interests the opportunities to be involved in the process of language learning and particularly ESP reading comprehension.

Green and Tanner (2005) investigated the application of MI theory to online teacher education. They reached to the conclusion that teaching and training using MIs take some creative thinking. Making MI theory work in practice in an online environment might seem challenging, yet it can be very satisfying for participants who find the learning more enjoyable, more personally relevant and more motivating.

Rahimian (2005) investigated the relationship between MI and learner types. As mentioned by the researcher, the study was conducted to monitor the frequency of each learning style and the dominant intelligence within gender and four different age groups. The results of Rahimian's study showed that (a) all of the scores in MIDAS correlated with the scores obtained from the learner type test, (b) subjects from opposite genders performed differently interesting results from the different tests, (c) participants' dominant intelligences and learner types have been proved to correlate statistically with their age, (d) subjects' language proficiency level is also statistically correlated with their dominant learning styles and intelligences. Hagadus-McHale (2005), in his paper, attempted to provide teachers with a set of specific practical strategies to engage middle school beginning foreign language learners via paying attention to individual strengths of students. He highlighted specific examples of activities and suggestions that engage every intelligence.

William and Anders (2005) investigated how Spanish teachers, through applying Gardner's MI, could adjust their learning preferences more effectively to design teaching method.

Al-Balhan (2006) conducted a research with middle-school Kuwaiti children to assess the effectiveness of student MI styles in predicting students' improved reading skills through academic performance. In his research, a group of middle school students, who had received first quarter grades and enrolled in an after-school tutoring program, were studied, with half of the students in a traditional tutoring program and the other half in a Gardner MI style-tutoring program. Results showed that the students in the experimental group performed better overall for the academic year than the students in the control group who studied using traditional teaching methodology.

Rabbani (2006) investigated the relationship between MIs and reading comprehension of Iranian intermediate EFL learners. The result revealed very strong associations between learners' MIs and their reading comprehension. The study suggested that teachers should attempt to cover the required material in a way that is flexible enough to give the students of different intelligences and interests the opportunities to be involved in the process of language learning and particularly reading comprehension.

Manzour-ol-Ajdad (2007) attempted to examine oral proficiency in a comparative study, using the MI theory regarding the existence of different intelligences -- particularly between the linguistically intelligent and the interpersonally intelligent learners. The researcher aimed to discover whether those who were defined as linguistically intelligent would get higher proficiency results in speaking administered thorough the ACTFL Oral Proficiency Interview or those who were identified as

interpersonally intelligent. The results revealed that there was no significant difference between the two intelligent groups' oral proficiency.

4. Research Questions

This study was an attempt to answer the following questions:

1. Is there any statistically significant difference between musical learners and pictorial learners on vocabulary knowledge improvement?

2. Is there any statistically significant difference between musical strategies and pictorial strategies for teaching vocabulary?

3. Are teaching strategies (in agreement with EFL lerners' MDI) more effective than the strategies which are not in accordance with EFL learners' MDI?

5. Methodology

5.1. Materials

Forty items were selected from student's educational materials (school books, second grade junior high school). The vocabulary items taught to both experimental groups were the same. The researchers decided to select the vocabulary that was supposed to be taught for second graders, junior high school.

5.2. Participants

To homogenize the participants, ninety-four junior high school first graders, Key English Test (KET) was administered. Eighty-five learners with scores between one standard deviation above and below the mean were selected for the purpose of this study. The Multiple Intelligences Developmental Assessment Scale (MIDAS) test for Musical and Pictorial intelligences was administered to the sample and the learners were devided into two groups of thirty-eight musical learners and forty-seven pictorial learners ones. Finally, thirty learners from each group were selected simple random

sampling to make the two experimental groups. All learners then took a validated vocabulary test constructed based on the vocabulary they were supposed to learn during the course. The statistics of the procedure for validating the pretest are presented in Tables 5.2.1 and 5.2.2.

 Table 3.3. Reliability Statistics

| Cronbach's Alpha | N of Items |
|------------------|------------|
| 0.86 | 40 |

Table 3.4 Statistics of the piloting of the vocabulary pretest SCORES

| Ν | 30 |
|----------------|----------|
| Mean | 20.9000 |
| Median | 21.0000 |
| Mode | 13.00(a) |
| Std. Deviation | 7.97128 |
| Variance | 63.541 |
| Range | 22.00 |
| Minimum | 10.00 |
| Maximum | 32.00 |
| Sum | 627.00 |

The participants attended a two-hour-a-week English class for two months. All participants were 11 through 13 year-old male first grader junior high school students.

5.3. Procedure

In order to collect relevant data for the purpose of this study, the following steps were taken:

At the beginning of the study, KET was administered to all participants. The purpose was to ensure the homogeneity of the participants with respect to their English language proficiency. Second, through the MIDAS test two experimental groups were determined as well as pictorial learners and musical learners. The purpose was to determine more dominant intelligence (MDI) of each student. A forty-item vocabulary test was administered as the pre-test in order to evaluate the vocabulary knowledge of the learners before the treatment. The new vocabulary were then taught to both groups through two different strategies: pictorial strategy in which some pictorial representation of new vocabulary presented to the class or the learners were asked to draw pictures and pictorial mnemonics of the new vocabulary that have been taught and the musical strategy through which the learners were asked to repeat aloud what they have been taught and to sing some songs relevant to each session as to the syllabus. At the end of the study, the same vocabulary test was given to the learners as posttest. For each student the known vocabularies which were answered correctly in the pre-test were omitted from the students score report in the posttest. Since the number of known words for all of the learners was not the same, the scores were changed to a scale of twenty relevant to the number of the eliminated words in the pre-test.

6. Results

To check for the homogeneity of the two groups, the subjects were pre-tested through KET. The descriptive statistics for the two groups are displayed in Table 6.1.

| Group Statistics | | | | | | | | |
|------------------|-----------------|----|-------|---------|--------|--|--|--|
| | Std. Error Mean | | | | | | | |
| PRETEST | Musical | 30 | 11.96 | 2.47028 | .45101 | | | |
| КЕТ | Spatial | 30 | 10.80 | 2.63138 | .48042 | | | |

Table 6.1: Descriptive statistics of the pre-test (KET)

It might be claimed that the groups are homogeneous in terms of their language proficiency prior to the administration of the treatment to the groups. The mean scores for both groups were 11.96 and 10.80, respectively. An independent t-test was run to compare the mean scores of the groups on the pre-test. As displayed in Table 6.2, the t-observed value is 1.77, lower than the critical value of t at 58 degrees of freedom.

Table 6.2: Independent t-test of the pre-test (KET)

| | Critical t | Observed t | df | Sig. (2-tailed) |
|----------|------------|------------|----|-----------------|
| KET Test | 2 | 1.77 | 58 | .082 |

The second set of analysis was utilized to check for the homogeneity of the two groups based on their vocabulary ability; they were pre-tested through a validated vocabulary test. An independent t-test was run to compare the mean scores of the groups on the pre-test. As displayed in Table 6.3, the t-observed value was 125. This amount of t-value at 58 degrees of freedom was lower than the critical value of *t*. The descriptive statistics for the two groups are displayed in Table 6.3.

| Table 6. | 3: Desci | riptive § | Statistics | of the | Pre-test | (Vocab.) |
|------------|----------|-----------|------------|--------|----------|---|
| I UNIC OIL | | | | | LIC CODE | (' ' ' ' ' ' ' ' ' ' ' ' ' ' ' ' ' ' ' |

| Group Statistics | | | | | | | |
|--|---------|----|------|------|-----|--|--|
| GROUP N Mean Std. Deviation Std. Error | | | | | | | |
| PRETEST | Musical | 30 | 6.43 | 2.20 | .40 | | |
| Vocab. | Spatial | 30 | 6.36 | 1.90 | .34 | | |

Thus, it could be claimed that the groups were homogeneous in terms of their vocabulary ability prior to the administration of the treatment to the groups. The mean scores for both groups were 6.43 and 6.36, respectively.

Table 6.4: Independent t-test of the pre-test

| | Critical t | Observed t | df | Sig. (2-tailed) |
|-----------------|------------|------------|----|-----------------|
| Vocabulary test | 2 | .125 | 58 | .901 |

Since there were two independent experimental groups with relevant posttest scores, the two-way ANOVA repeated measure was applied to analyze the results. The descriptive statistics for the two groups are displayed in Table 6.5 and 6.6.

Table 6.5: Descriptive statistics of groups

| | Descriptive Statistics (FinalData.sta) | | | | | | | | | |
|--------|--|----|----------------|----------------|----------------|------------------|------------------|------------------|--|--|
| | Level of | Ν | Musical Scores | Musical Scores | Musical Scores | Pictorial Scores | Pictorial Scores | Pictorial Scores | | |
| Effect | Factor | | Mean | Std.Dev. | Std.Err | Mean | Std.Dev. | Std.Err | | |
| Total | | 60 | 10.64 | 3.01 | 0.39 | 10.11 | 3.57 | 0.46 | | |
| Groups | Pictorial | 30 | 9.25 | 3.03 | 0.55 | 12.26 | 2.83 | 0.52 | | |
| Groups | Musical | 30 | 12.02 | 2.30 | 0.42 | 7.96 | 2.89 | 0.53 | | |

Table 6.6: Two way ANOVA repeated measure

| | Repeated Sigma-res Effective h | Repeated Measures Analysis of Variance (FinalData.sta) Sigma-restricted parameterization Effective hypothesis decomposition | | | | | | | |
|-----------------|--------------------------------------|---|----------|---------|------|--|--|--|--|
| | SS | Degr. of | MS | F | р | | | | |
| Effect | Freedom | | | | | | | | |
| Intercept | 12908.58 | 1 | 12908.58 | 1224.02 | 0.00 | | | | |
| Groups | 17.71 | 1 | 17.71 | 1.68 | 0.20 | | | | |
| Error | 611.67 | 58 | 10.55 | | | | | | |
| STRATEGY | 8.37 | 1 | 8.37 | 1.72 | 0.19 | | | | |
| STRATEGY*Groups | 374.53 1 374.53 77.06 0.00 | | | | | | | | |
| Error | 281.91 | 58 | 4.86 | | | | | | |

The reciprocal comparisons among posttest scores were done through Post Hoc analysis. The results are reported in Table 6.7.

| | Tukey HSD test; variable DV_1 (FinalData.sta) Approximate Probabilities for Post Hoc Tests Error: Between; Within; Pooled MS = 7.7033, df = 102.10 | | | | | | | | |
|----------|--|---------------------------------|--------|--------|--------|--------|--|--|--|
| | Groups | Groups STRATEGY {1} {2} {3} {4} | | | | | | | |
| Cell No. | | | 9.2533 | 12.258 | 12.018 | 7.9567 | | | |
| 1 | Pictorial | Musical Scores | | 0.00 | 0.01 | 0.27 | | | |
| 2 | Pictorial | Pictorial Scores | 0.00 | | 0.99 | 0.00 | | | |
| 3 | Musical | Musical Scores | 0.01 | 0.99 | | 0.00 | | | |
| 4 | Musical | Pictorial Scores | 0.27 | 0.00 | 0.00 | | | | |

Table 6.7: Post Hoc tests results

Post Hoc comparison reveals that:

1- There is no statistically significant difference on vocabulary knowledge improvement between pictorial learners that received musical strategies and musical learners that received pictorial strategies. Vocabulary knowledge improvement of both groups of learners have been shown on Graph 6.8.

2- There is no statistically significant difference on vocabulary knowledge improvement between pictorial learners that received pictorial strategies and musical learners that received musical

strategies. Vocabulary knowledge improvement for both applied strategies have been shown on Graph 6.8.

3- There is statistically significant difference at the level 0.01 of significance on vocabulary knowledge improvement between pictorial learners that received pictorial strategies or musical learners that received musical strategies and other conditions.

4- Vocabulary knowledge improvment level of pictorial learners that received pictorial strategies or musical learners that received Musical strategies is the same. In other words, there is no statistically significant difference on vocabulary knowledge improvment of pictorial learners that received pictorial strategies and musical learners that received musical strategies.





7. Discussion

Regarding the first null hypothesis, the results of between group comparison (F= 1.68) reveals that at 0.05, the difference is not statistically significant. In other words, the means of vocabulary knowledge improvement for both pictorial learners and musical learners (regardless of the applied strategies) have no statistically significant difference and both groups' vocabulary knowledge have been improved at the same level. This might be due to the nature of instruction both groups have recieved. So the first hypothesis (H1) is supported.

Regarding the second null hypothesis, The results of comparing strategies (F= 1.72) reveal that at 0.05 level of significance, there is no statistically significant difference between pictorial strategies and musical strategies for teaching vocabulary. In other words, applying pictorial strategies and musical strategies leads to improvement in vocabulary knowledge of learners and both effectivenesses are at the same level. So the second null hypothesis is also supported.

As far as the third and last hypothesis is concerened, the comparison of reciprocal effects among the applied strategies and student groups concerning their MDI (F=77.06) reveals that at 0.01 level of significance, there is a significant difference when the interactional effect of teaching strategies and student groups are analyzed. So the third null hypothesis is rejected.

The obtained results and Post Hoc results reveal that:

- There is no statistically significant difference on vocabulary knowledge improvement between pictorial learners that had been taught through musical strategies and musical learners that received pictorial strategies. In other words, there is no statistically significant difference between musical learners and pictorial learners if they have been taught by a teaching strategy which is not in accordance with learner's MDI.
- 2. There is no statistically significant difference on vocabulary knowledge improvement of learner's between applying pictorial strategies and musical strategies. In other words vocabulary knowledge improvement for both groups that received teaching strategies in accordance with their MDI is the same.
- 3. There is statistically significant difference between using teaching strategies in accordance with learners MDI and teaching strategies not in accordance with learners MDI. In other words pictorial learners that pictorial strategies were apllied for them

and musical learners that received musical strategies were more successful on taught vocabulary retention and recall.

8. Conclusion

A number of conclusions may be drawn from the results of this study. First of all, the results of this study did not support the findings of earlier research on the relationship between intelligence and language teaching. So far, most researchers have come up with the conclusions which denied the existence of any relationship between second language learners' intelligence and their second language learning processes. The very important point to be mentioned here is that most research works in this case have maintained the traditional view of intelligence and employed the traditional IQ tests as the instrument to measure their subjects' intelligence. However, the traditional definition of intelligence, on which such tests were based, is now regarded as disputable and too narrow. Therefore, it is this researchers' contention that Gardner's MI theory provides a way of understanding intelligence which is more sensible and practical in the field of applied linguistics. MI theory maintains this idea that effective communication in general and effective teaching in particular could not happen unless individual differences are taken into consideration and different styles of communication or various teaching strategies are applied.

The present study can, also, be considered as an analysis of Gardner's MI theory in the field of applied linguistics which supports his view towards intelligence. While using pictorial strategy it was observed that some of the subjects with pictorial MDI cannot paint very well or draw pictorial mnemonics for taught vocabulary although their MDI is spatial intelligence. The reason was that they had not been trained for doing so. Also it was observed that these subjects draw nouns and name of subjects more easily than verbs and even in drawing the picture of nouns they desired to imitate the drawings, so a drawing sample of some items was shown to them in each step of vocabulary teaching. According to the above mentioned results, the following points might be argued:

- As soon as the teacher becomes aware of this fact that the learners are different individually and various strategies should be applied for effective teaching, he/she might start to learn new strategy's techniques.
- 2. MI theory gives an appropriate framework for looking to individual differences and without a sophisticated and reliable framework, individual differences among learners could not be understood or explained as it is. A real appreciation and understanding of MI theory can change our mental attitude toward people in all communications in general and our teaching strategies in particular to be more effective and influential.
- 3. It would be seen and understood, more easily, that why the learner performs differently within a unique class with the same applied strategy? So the teacher will understand the necessity of using various strategies of teaching and consider them as a need for various learners rather than a fantasy or chic method for representation of teaching materials.
- 4. After the first step which is understanding the individual differences from MI theory point of view, the next step is designing the appropriate curriculum and come up with an effective syllabus design based on various intelligences exist among learners. Although the commonality among them will help to narrow down the broad strategies.
- 5. MI theory gives awareness of each person competency in general and each learner competency in particular which helps to understand and focus on competencies and positive potentials consciously. As Gardner (1989) claimed, if the positive competencies or MDI neglected or ignored or received not enough attention, the student will believe himself/herself as not so smart although he/she may be smart in another way. The teacher should find out "How are they smart?" not "How much are they smart?"

- 6. This awareness helps to know potential and MDI of each one and focus on them. Special consideration of these intelligences will lead to growth of them and will let them to be nurtured.
- 7. A real appreciation and understanding of MI theory leads to effective communication in general and effective teaching as some sort of communication in particular. As described completely, interpersonal intelligence could be considered as a high demand for effective teaching. The person who takes benefit of any intelligence can become a genuine in that area. Without having an appropriate level of interpersonal intelligence although the person can perform well in his/her MDI area but he/she can not communicate effectively to convey what he/she knows or does and cannot be a good teacher as well. In other words, a good mathematics teacher should have adequate level of mathematical-logical intelligence in order to understand mathematical-logical concepts individually and simultaneously should take benefit of an appropriate level of interpersonal intelligence which enables the teacher to convey what he knows or does effectively. By the same token, a good painting teacher should have adequate level of spatial intelligence in order to figure out and realize pictorial concepts individually and simultaneously should take benefit of an appropriate level of interpersonal intelligence which enables the teacher to teach what he can perform well effectively and finally what is our concern in TEFL environments a good English language teacher should have adequate level of Linguistic intelligence in order to understand Linguistic concepts individually and simultaneously should take benefit of an appropriate level of interpersonal intelligence which enables the teacher to convey what he has in his mind to EFL learners effectively. Those teachers with higher interpersonal intelligence are more extrovert and maintaining Freeman & Long (1991) stating, "Natural language use tasks tended to favor extroversion", the present research finding that interpersonal intelligence can improve language teaching strategy. However, the whole issue demands further researches.

8. Regarding to activators and deactivators of intelligences, teachers, parents and learners themselves can facilitate the special intelligences of the learners. It will allow the learners to grow and improve in accordance with their MDI and prevent to push them on an undesired traditional system of education.

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