

Investigating Iraqi EFL College Students' Multiple Intelligences

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Abstract

Various theories on learning have been developed with increasing frequency in the last few decades. In tandem with this, Multiple Intelligence theory appeared as a new approach to education as well as an important theory in the field of language learning. Gardner explains that all human beings have different intelligence fields and a potential to develop them. These intelligences are (verbal-linguistic, logical-mathematical, visual-spatial, musical, bodily-kinesthetic, interpersonal, intrapersonal, naturalistic, and Existential).

This study aims at investigating Multiple Intelligences of Iraqi college EFL students. To achieve the aims of the study, a questionnaire is adopted according to Birmingham model which includes 40 items with a five point scale (this is not like me at all, this is a bit like me, this is sometimes like me, I am like this more often than not, I am always like this), and covers all types of Multiple Intelligence theory. The sample of the present study consists of the first and second year female students from Department of English Language, College of Education for Women/ University of Baghdad.

After ensuring the validity and reliability of the questionnaire, the researchers have applied the questionnaire on 18th of May 2014. The results show that most of the Iraqi college students prefer music with learning, as well as, musical, intrapersonal and interpersonal intelligences as they most frequently used and accepted. Finally, conclusions, recommendations and suggestions for future work are put forward.

Key Terms: Multiple Intelligences Theory, Learning.

الذكاء المتعدد طلبة اللغة الانكليزية لغة اجنبية

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المستخلص

هناك عدة نظريات عن التعلم في العقود العشرة الاخيرة ونظرية الذكاء المتعدد واحدة منهم اوضح كارنر ان كل البشر لديهم ذكاء متعدد ومختلف. تهدف الدراسة الى بحث الذكاء المتعدد لطلبة الكلية الدارسين للغة الانكليزية لغة اجنبية لتحقيق الهدف استخدم استبيان وغطى كل انواع الذكاء واطهرت النتائج ان اغلب الطلبة يستخدمون الموسيقى في التعلم وفي ضوء النتائج قدمت الاقتراحات والتوصيات.

1. Introduction

1.1 The Problem and the study significance

Education, in general, and English as a foreign language in particular suffer from a different focus on learning or teaching. Growth of attention on learning in classrooms becomes the vogue now as it proves its striking effect on students' progress in learning foreign languages. Pritchard (2009:34) states that Gardener's intelligence theory "proposes the idea that we all have various levels of intelligence areas across arrange of intelligence areas." Hence, this intellectual make- up directs the learning process. Learning preferences of

the individuals varies as learners have different approaches to learning in accordance with their different receptive to stimuli they are exposed to.

Many English teachers search for suitable techniques, activities, methods and theories to facilitate the process of learning English language for learners as well as they face a big dilemma in learning English as a foreign language; therefore, many English teachers look for ways to teach such learners. At the same time, many voices appear to encourage using multiple intelligences theory in order to know which type of learners they teach and select a good way to teach them according the afore-mentioned theory.

Intelligence is a psychological notion connected with learning, and educators base a lot of their professional decisions on this kind of notion (Khamis, 2004, cited in Ibnian , 2013:1).

Since the early twentieth century, various theories about intelligence have been discussed. The traditional view of intelligence was challenged. Gardner (1983:4) suggested an alternative definition, noting that intelligence entails the ability to solve problems, and defined multiple intelligence theory as “an important contribution to cognitive science and constitutes a learner- based philosophy which is an “increasingly popular approach to characterizing the ways in which learners are unique and to develop instruction to respond to this uniqueness” (Richards& Rodgers, 2001:3).

Gardner challenged the idea that we have a single intelligence that is measured by a single IQ test and suggested that there are many different autonomous intelligence capacities that result in many different ways of knowing, understanding, and learning about our world. He pinpointed seven intelligences including verbal- linguistic, mathematical-logical, visual-spatial, bodily- kinesthetic, musical-rhythmic, interpersonal, and intrapersonal. In 1997, Gardner added an eighth intelligence, the naturalist intelligence, and few years later a ninth intelligence, existentialist intelligence (Gardner, 1999:10).

1.2 Aims of the study

This study aims at:

- 1- Discovering the types of learners according to the multiple intelligence theory.
- 2- Identifying the most frequent type of the multiple intelligence that most of Iraqi learners enjoy.

1.3 Limits

The present study is limited to the first and second year female students/ College of Education for Women/ University of Baghdad during the academic year 2013-2014.

1.4 Definitions of Basic Terms

Multiple Intelligence Theory

Gardner, in his official website, called *Frequently Asked Questions* defines multiple intelligence theory by claiming that human beings “have a number of relatively discrete intellectual capacities. IQ tests assess linguistic and logical-mathematical intelligence and sometimes spatial intelligence....”

Learning Styles: refer to the variations in your ability to accumulate as well as assimilate information. Basically, learning styles is the method that best allows the learner to gather and use knowledge in a specific manner (Bogod, 1998:1).

2. Theoretical Background

2.1 Multiple Intelligence Theory

Gardner defines intelligence as “the capacity to solve problems or to fashion products that are valued in one or more cultural settings”. The nine intelligences are as follows:

- 1- Logical –mathematical intelligence: consists of the ability to detect patterns, reason deductively and think logically and it is associated with scientific and mathematical thinking.
 - Incorporated into subject matter: Exercises, drills and problem solving.

- Ways of demonstrating understanding: counting, calculating theorizing, demonstrating, programming computers.
- 2- Linguistic Intelligence: involves having a mastery of language. This intelligence includes the ability to effectively manipulate language to express oneself rhetorically or poetically. It also allows one to use language as a means to recall information.
 - Incorporated into subject matter: books, stories, poetry, speeches, author visits.
 - Way of demonstrating understanding: Writing stories, scripts, poems, and storytelling.
 1. Visual Spatial Intelligence: gives one the ability to manipulate and create mental images in order to solve problems. This intelligence is not limited to visual domains. Gardner notes that spatial intelligence is also formed in blind children.
 - Incorporated into subject matter: posters, artwork, slides, charts, graphs, video tapes, laser disks, CD-ROMs , DVD and museum visits.
 - Way of demonstrating understanding: Drawing, painting, illustrating, graphic design, collage making, poster making, photography.
 2. Musical Intelligence: encompasses the capability to recognize and compose musical pitches, tones and rhythms.
 - Incorporated into subject matter: Tapes, CD's concert going.
 - Way of demonstrating understanding: performing, singing, playing, and composing.
 3. Bodily –kinesthetic Intelligence: is the ability to use one's mental abilities to coordinate one's own bodily movements. This intelligence challenges the popular belief that mental and physical activities are unrelated.
 - Incorporated into subject matter: movies, animations, exercises, physical concepts, rhythm exercises.
 - Ways of demonstrating understanding: Dance recital, athletic performance or competition.
 4. Interpersonal intelligence: the ability to understand and discern the feelings and intentions of others.
 - Incorporated into subject matter: terms, group work, and special roles.
 - Ways of demonstrating understanding: plays, debates, panels, group work.
 5. Intrapersonal intelligence: the ability to understand one's own feelings and motivations.
 - Incorporated into subject matter: Reflection time, mediation exercises.
 - Ways of demonstrating understanding: Journals, memoires, diaries, changing behaviors, habits, personal growth.

Note: Though the last two intelligences are separated from each other because of their close association in most cultures, they are often linked together.
 6. Existential intelligence: sensitivity and capacity to tackle deep questions about human existence, such as the meaning of life, why do we die? And how did we get here?
 - Incorporated into subject matter: working on causes, charity work, astrology charts.
 - Ways of demonstrating understanding: community service.
 7. Naturalist intelligence: Designates the human ability to discriminate among living things (plants, animals) as well as sensitivity to other features of the natural world (clouds, rock, configurations).
 - Incorporated into subject matter: terrariums aquariums, class pets, farm, botanical garden, and zoo visits, nature walks, museum visits.
 - Ways of demonstrating understanding: collecting, classifying, and caring for animals at nature centers(How do I apply multiple intelligences theory in my classroom,2004:2)

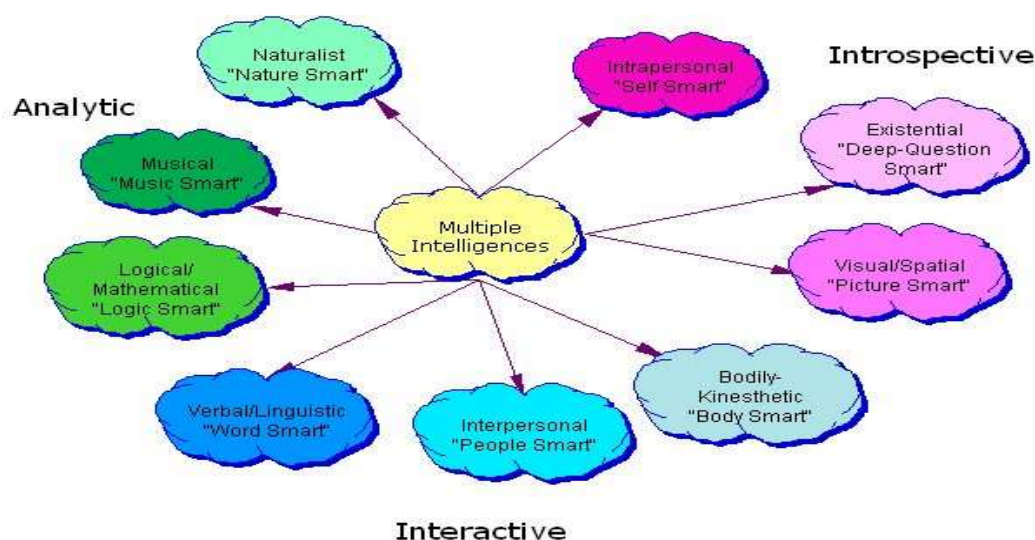


Diagram (1) Taken from The types of Multiple Intelligence theory.

2.3 Characteristics of Multiple Intelligence Theory in the Classroom

Multiple intelligence (henceforth: MIT) provides a way of understanding intelligence which teachers can use as a guide for developing classroom activities that address multiple ways of learning and knowing. Christison(1999:2) identifies four ways of using MI theory in the classroom which are developed by teachers:

- 1- Teachers may adopt the language and accompany activities to suit the needs of the language learners in their classes. It is used as a tool to help students develop a better understanding and appreciation of their own strengths and learning preferences. Word finds, pair dictations, dictionary and spelling work, focused listening, grammar activities, dialog Journals, and small group conversations offer EFL learners opportunities to reflect on their own strength and ideas. Information that comes from these activities can satisfy students' needs assessment and goal-setting processes.
- 2- As a tool to develop a better understanding of students' intelligences, teachers become aware of the different ways in which students may demonstrate their understanding of material. On a given topic or skill, teachers can brainstorm with students a list of activities to practice. In this way, each student can acquire language skills by employing individual strengths or preferences.
- 3- As a guide to provide a greater variety of ways for students to learn and to demonstrate their learning, identification of personal strength makes students more receptive to nontraditional learning activities and can give students a successful experience that builds their confidence as students.
- 4- As a guide to develop lesson plans that address the full range of student needs, an MI informed reading lesson may begin with typical pre- reading activities. (Reviewing earlier material, predicting what will happen next; followed by silent reading or reading a loud with discussion of vocabulary and text meaning). Students can then complete a project, individually or in groups, to demonstrate their understanding of the text.

This is further highlighted by Giles et.al (2003:11) by showing many benefits of MIT:

- 1- Teachers and students realize that there are many ways to be "smart".
- 2- All forms of intelligence are equally celebrated.
- 3- Students create work that is displayed to parents and community, and this state creates involvement of parents and community.
- 4- A sense increased self-worth may be seen as students build on their strengths and work towards becoming expert in a certain area.
- 5- Students may develop strong problem solving skills that can be used in real life situations.

3. Procedure of the study

3.1 Sample and Population of the present study

The population of the present study is the first and second year students of the English department in the College of Education for Women/ University of Baghdad during academic year 2013-2014. The sample is chosen randomly from the population mentioned above. The total number of the sample is (44) females students selected from first and second years.

3.2 Main Instrument and Description of the Questionnaire

To achieve the aims of the study, the researchers used a questionnaire to cover the areas of the study. The questionnaire is adopted from Birmingham model about multiple intelligence theory. The questionnaire is applied to 44 students on 18/5/2014.

The questionnaire comprises 40 items which cover the ninth multiple intelligences theory suggested by Gardner such as (verbal- linguistic, mathematical-logical, visual-spatial, bodily-kinesthetic, musical-rhythmic, interpersonal, intrapersonal, naturalist, and existentialist).

Five scales are used to obtain the students' answer. 1 point is given to the first scale (this is not like me at all), 2 points are given to the second scale (this is a bit like me), 3 points are given to third scale (this is sometimes like me), 4 points are given to the fourth scale (I am like this more often than not), and 5 points are given to the fifth scale (I am always like this). (See Appendix 1)

3.3 The pilot Study

A pilot study is a small scale or a preliminary study conducted in order to evaluate feasibility, time, cost, adverse events, and effect size, in an attempt to predict an appropriate sample size and improve the study design prior to the performance of a full-scale research project (Pilot experiment, 2014:1).

Lado (1962:342) states that "the effectiveness of a questionnaire is determined by its items and their arrangement".

In order to estimate time needed, twenty students were chosen randomly as the subjects of the pilot study. Each student was given a copy of the questionnaire after informing them of the purpose of the questionnaire and the way to answer the items. The pilot study revealed that time needed to the final administration of the questionnaire is 25 minutes.

3.4 Validity

A valid instrument is that one which measures accurately what it is supposed to measure (Ingram, 1977:18).

As for face validity, the questionnaire is sent to a jury of experts (See Table1) in English language teaching and linguistics. They agreed that the questionnaire is valid and suitable.

3.5 Reliability

Varma and Beard (1981:86) define reliability as "the degree of accuracy with which a given test or a set of scores measures whatever it is measuring".

Thus, to ensure the reliability of the questionnaire, Cronbach's Alpha is used and found out the reliability coefficient is (0.85) which can be seen as a desirable correlation.

3.6 Statistical Methods

The following statistical tools have been adopted:

1. Fisher's Formula is used to obtain the results of the questionnaire and fulfill the aims of the study.
2. Percentages are used to obtain the results of the questionnaire and fulfill the aims of the study.
3. Cronbach's Alpha reliability coefficient to obtain the reliability of the questionnaire (Diem 2002:5)

Table (1) The jury members are arranged according to their scientific rank

	Name & Scientific rank	Place
1-	Prof. Najet Al-jubory	College of Education for Women, University of Baghdad
2-	Asst. Prof. Maysaa Rasheed	College of Education for Women, University of Baghdad
3-	Instructor Dr. Shaima Mahdi	College of Education for Women, University of Baghdad
4-	Instructor Fatima Khudair	College of Education for Women, University of Baghdad
5-	Instructor Narmeen Mahmood`	College of Education for Women, University of Baghdad

94. Data analysis**4.1 Results**

To fitful the aim of the present study, the questionnaire is used to obtain the students' opinion, and analyze the results of each item by using Fisher's formula and percentage. The item which has gained 3 and more is considered strong and acceptable, whereas the item which has gained less than 3 is considered a weak one. The results show that most of students prefer and frequently use musical, intrapersonal, and interpersonal intelligences. Table (2) below shows the weighed mean scores for each item and weighed percentage. The items are arranged from a higher score to a lower score. The results reveal that the first 35 items are considered acceptable, whereas the last 5 items are considered weak.

Table (2) The weighed mean scores for each item and weighed percentage with14 item type.

Item rank	Item No	Item Type	Items	Weighted mean Score	Weighted Percentage
1.	34	Musical	My mood changes when I listen to music.	4.54	90.90%
2.	19	Intrapersonal	I know myself well.	4.27	85.45%
3.	2, 9	-Intrapersonal -Interpersonal	<ul style="list-style-type: none"> • I like working and thinking on my own and quietly. • I learn well from listening to others. 	4.	80%
4.	33	Musical	I can remember pieces of music easily.	3,97	79.54%
5.	25	Intrapersonal	I am sensitive to the moods and feelings of others.	3.95	79.09%
6.	24	Interpersonal	I can picture scenes in my head when I remember things.	3.90	78.18%
7.	8,29, 31	-Bodily -Intrapersonal -Bodily	<ul style="list-style-type: none"> • I have a good sense of balance and like to move around a lot. • I am an independent thinker. I know my own mind. • I like to work with my hands. 	3.81	76.36%
8.	7	Intrapersonal	I learn best when I have to get up''and do it for myself.	3.77	75.4%
9.	23	Existential	Pollution makes me angry	3.75	75%
10.	3	Linguistic	I enjoy writing things down.	3.65	73%

11.	18, 21	-Visual -Interpersonal	<ul style="list-style-type: none"> • I can link things together and pick out patterns easily. • I enjoy social events like parties. 	3.61	72.27%
12.	5,35, 40	-Intrapersonal - Musical -Interpersonal	<ul style="list-style-type: none"> • I enjoy working on my own. • I enjoy making music. • I find it easy to explain to others. 	3.59	71.81%
13.	15, 17, 38	-Visual -Visual -Intrapersonal	<ul style="list-style-type: none"> • I have a good sense of direction. • I need to see something in it for me before I want to learn something. • I always do things one-step at a time. 	3.45	69.09%
14.	11	Naturalistic	I can recognize and name different types of birds, trees and plants.	3.36	67.27%
15.	16, 37	-Existential -Interpersonal	<ul style="list-style-type: none"> • I am interested in why people do the things they do. • I like to work with a team. 	3.34	66.81%
16.	22	Bodily	I like to think through problems while I walk or run.	3.27	65.45%
17.	1, 10, 12, 26, 32	-Linguistic -Bodily -Visual -Naturalistic -Visual	<ul style="list-style-type: none"> • I can use lots of different words to express myself. • I enjoy games involving other people. • I like to use charts and diagrams in my learning. • I enjoy being outdoors when I learn. • I am observant. I often see things that others miss. 	3.25	65%
18.	30, 39	-Logical -Musical	<ul style="list-style-type: none"> • I am good at mathematical problems and using numbers. • I can pick out different instruments when I listen to a piece of music. 	3.22	64.54%
19.	36	Intrapersonal	I like to think out loud.	3.11	62.27%
20.	13	Musical	I remember things like telephone numbers by repeating them to a rhythm.	3.045	60.9%
21.	4	Interpersonal	I can sort out arguments between friends.	3.022	60.4%
22.	20	Intrapersonal	I get restless easily.	2.90	58.18%
23.	6	Logical	I like to make lists	2.84	56.8%
24.	28	Naturalistic	I keep or like pets.	2.77	55.45%
25.	14, 27	-Logical -Logical	<ul style="list-style-type: none"> • I enjoy logic problems and puzzles. • I can take things apart and put them back together easily. 	2.72	54.54%

4.1.1 Item no.3 “My mood changes when I listen to music.”

This item has gained the first rank (4.54) with a percentage of 90.90%. This shows that most of the students have different strengths, and they prefer musical intelligence style during learning and they become relaxed when they listen to music. Shabani(2004:1) states that music is an indispensable part of human beings' life and culture. It is one of the oldest and most basic socio-cognitive domains of the human being. Music serves various purposes in our life. It provides enjoyment, pleasure, motivation, relaxation, and a tool for learning. All in all, music can improve coordination and the ability to listen and respond. Hence, learners of this type are good at learning through listening in general, and they like to learn best by listening to music.

4.1.2 Item no. 19 “I know myself well.”

This type of intelligence has ranked the second stage and it has gained 4.27 with percentage 85.45% .The students seemed to have intrapersonal intelligence. They depended on their own to learn better during the lectures. According to Bogod (1998:5) intrapersonal students understand their inner feelings, desires and dreams, strengths and weaknesses. Besides, they evaluate their thinking patterns, reasoning with themselves, and understanding their role in relationship to others. Hence, this type of learners learn best when they work alone having their own space.

4.1.3 Item no. 2 “I like working and thinking on my own and quietly.”

This item has ranked the third stage and gained 4.00 with a percentage of 80%. This means that most of the learners like to work, think, and learn independently.

In the learning environment, the learning style must be student- centered. Therefore, students must do the activities by themselves or adopt the responsibility of their own learning (Abbott& Terence, 1999:66). Giles et.al (2003:10) add that the types of activities that support student-centered classroom can be designed in connection with many inquiry –based models. Allowing students to make choices is one feature of student- centered classroom. Teachers should encourage students to exercise their weak intelligence, but allow them to explore their strength as well as.

4.1.4 Item no. 9 “I learn well from listening to others.”

This intelligence has ranked the third stage also and has gained 4.00 with a percentage 80%. This type of intelligence is interpersonal which is concerned with the ability to understand the intentions, motivations and desires of other students and allows them to work effectively with others.

Bogod (1998:5) states that:

These students try to see things from other students' point of view in order to understand how they think and feel. They try to maintain peace in group settings and encourage co-operation by using both verbal (speaking) and non-verbal language (eye contact, body language) to communicate with each other.

4.1.5 Item no. 33 “I can remember pieces of music easily.”

This item has ranked the fourth stage and has gained 3.97 with a percentage of 79.54%. Again music intelligence is a preferable style of learning for most of the students. Shabani(2014:3) explains that there are common features in music and language. Many different styles of music have a series of strict rules which in away resemble grammar. Music like language has rhythm; stress; pitch and distinct elements of little intrinsic meaning which are combined to makes structures with a great difference meaning. Both of them convey meaning, feeling, and emotion.

4.1.6 Item no. 25 “I am sensitive to the moods and feelings of others.”

This item has ranked the fifth stage and has gained 3.95 with a percentage of 79.09%. Gardner (2009:6) describes the students of intrapersonal intelligence as self-awareness and has the capability to understand oneself and one’s relationship to others and the world.

4.1.7 Item No. 24” I can picture scenes in my head when I remember things. ”

This item has ranked the sixth stage and has gained 3.90 with percentage 78.18%. This item represents the interpersonal intelligence. Gardner (2009:6) describes the capability of interpersonal intelligence students as interpretation of behavior and communications, understanding the relationships between people and their situations including other people.

4.1.8 Items no. 8 “I have a good sense of balance and like to move around a lot.” Item no.31 “I like to work with my hands.”

These items have ranked the seventh stage and have gained 3.81 and 76, 36% respectively. These items stand for bodily kinesthetic intelligence. This type of intelligence consists of using one’s whole body or parts of the body to solve problems. The students’ ability shows the use of mental abilities to coordinate bodily movements and it is accompanied with related mental and physical activities (Gardner, 2014:4).

Bogod (1998:4) describes the kinesthetic students as they learn best through moving, doing, acting out and touching. They tend to become frustrated when they must sit for long periods of time, and they enjoy conducting experiments, exploring and performing tasks.

4.1.9 Item no. 29 “I am an independent thinker. I know my own mind.”

This kind of intelligence has ranked the seventh stage and has gained 4.81 with percentage of 76.36%. Students who have this kind of ability have intrapersonal intelligence because they think independently and know themselves well and what is in their mind. Gardner (2014:4) describes those kinds of students as having an effective working model of them, and they regulate their lives by using this kind of information.

4.1.10 Item no. 7 “I learn best when I have to get up and do it for myself.”

This intelligence has again appeared and occupied the eighth stage with 3.77 with percentage 75.4%. From the above discussion, it has been found that intrapersonal intelligence occupied the higher scores and percentages to describe which type of students and their motivation to learn. In fact, most of students prefer intrapersonal intelligence in learning English language and they depend on their own to solve the problems.

4.1.11 Item no. 23 “Pollution makes me angry”

This item has occupied the ninth stage 3.75 with percentage 75%.

4.1.12 Item no. 3” I enjoy writing things down.”

In this item, verbal/ linguistic intelligence has ranked the tenth stage and has gained 3.65 with percentage 73%. Giles et.al (2003:6) state that “linguistic intelligence refers to students’ ability to understand and manipulate words and languages. This includes reading, writing, speaking, and other forms of verbal and written communication.

4.1.13 Item No. 18 “I can link things together and pick out patterns easily.”

This item has ranked the eleventh stage and has gained 3.61 with a percentage of 72.27%. This item belongs to visual / spatial intelligence. This intelligence encourages the students to understand the relationship between images and meanings and between space and effect. The students prefer this type of intelligence to learn because they interpret and create visual images, room layout, design a building and pack a suitcase or the boot of a car.(Gardner,2009:5)

4.1.14 Item No. 21” I enjoy social events like parties. ”

This item has ranked the eleventh stage also and has gained 3.61 with a percentage of 72.27%. This item related to social activities among students to learn better through interpersonal intelligence. The students work effectively with others in specific situations.

4.1.15 Item No. 5” I enjoy working on my own. ”

Again this item related to intrapersonal intelligence which most of students prefer this type of learning because it is self reflection and self-discovery. In fact, this item has ranked the twelfth stage and has gained 3.59 with a percentage of 71.81%.

4.1.16 Item No. 35 “I enjoy making music.”

This item has ranked the twelfth stage also and has gained 3.59 with a percentage of 71.81%. This item describes learning by musical intelligence. Arnold (1999:260) identifies that the role of music in language learning can be specified in terms of enhancement of social harmony and motivation working in group. He adds (ibid) “we learn better that which attracts our attention, and emotion automatically makes us pay attention”.

4.1.17 Item No. 40” I find it easy to explain to others. ”

This item related to interpersonal intelligence and has gained 3.59 with a percentage of 71.81% and has occupied the twelfth stage also. In this item, most of students prefer to learn in groups and share their ideas together to cover the material. Besides, the multiple intelligence theory is built on cooperation rather than competition; therefore, most of students prefer to study as teamwork.

4.1.18 Items No.15 “I have a good sense of direction.” No. 17 “I need to see something in it for me before I want to learn something.”

These items belong to visual intelligence and have ranked the thirteenth stage 3, 45 with a percentage of 69.90%. “Those students tend to think in pictures and need to create vivid mental images to retain information. They enjoy looking at maps, charts, pictures, videos, and movies” (Bogod, 1998:3).

4.1.19 Item No. 38 “I always do things one-step at a time.”

This item also has ranked the thirteenth stage and has got 3.45 with a percentage of 69.90%. Intrapersonal intelligence appeared again to cover most of students’ point of view in learning and recognize their strengths and weaknesses so as to identify the problem. They need to spend a lot of time alone in private places and reflect self-spaced projects.

4.1.20 Item No. 11 “I can recognize and name different types of birds, trees and plants.”

This item has ranked the fourteenth stage and has gained 3.36 with a percentage of 67.27%. This item expresses the students’ abilities in learning through naturalistic intelligence by mentioning the names of birds, trees, and plants. Giles et.al (2003:9) describes the naturalistic intelligence students as working in nature, exploring living things, learning about plants and natural events.

4.1.21 Item No. 16 “ I am interested in why people do the things they do. ”

This item has occupied the fifteenth stage and has gained 3.34 with a percentage of 66.81%. Existential intelligence represents the above item. The students prefer such a type of learning using existential intelligence because they are concerned with ultimate issues.

4.1.22 Item No. 37 “ I like to work with a team. ”

Interpersonal intelligence appears again to express the effectiveness in relations among students to work together. This item has ranked the fifteenth stage and has gained 3.34 with a percentage of 66.81%. Harmer (2001:47) notices that “the students who have a strong interpersonal intelligence may require a more interactive climate if their learning is to be effective”.

4.1.23 Item No. 22 “I like to think through problems while I walk or run.”

This item has ranked the sixteenth stage and has gained 3.27 with a percentage of 65.45%. The students who have selected above item represent bodily intelligence student. They use physical ability and balance with eye and body coordination to learn better (Gardners, 2009:5).

4.1.24 Item No. 1 “I can use lots of words to express myself.”

The verbal intelligence appeared again to occupy the seventeenth stage and gain 3.25 with a percentage of 65% .Such a type of students prefer to use words and language.

4.1.25 Item No. 10 “I enjoy games involving other people.”

This item also has occupied the seventeenth stage and has get 3.25 with a percentage of 65%. Bodily /kinesthetic represents above item which encourage sports and physical games.

4.1.26 Items No. 12 “I like to use charts and diagrams in my learning. ” No. 32 “I am observant. I often see things that others miss.”

These items have ranked the seventeenth stage also and have gained 3.25 with a percentage of 65%. These items represent visual /spatial intelligence which helps students to use charts, maps to understand the material; they depend on visualization by using the mind's eye drawing(Giles etal ,2003:8).

4.1.27 Item No. 26” I enjoy being outdoors when I learn.”

This item has ranked the seventeenth stage also and has gained 3.25 with a percentage of 65%. in this item, the students prefer to use naturalistic intelligence to reach their goals in learning.

4.1.28 Item No. 30 “ I am good at mathematical problems and using numbers.”

This item has occupied the eighteenth stage and has gained 3.22 with a percentage of 64.54%. It covers the logical /mathematical intelligence. Logical intelligence enables the students to use reason, logic, and numbers. Those students think conceptually in logical and numerical patterns making connections between pieces of information (Bogod, 1998:4).

4.1.29 Item No. 39 “ I can pick out different instruments when I listen to a piece of music.”

This item expresses the musical intelligence which has ranked the eighteenth stage and has gained 3.22 with a percentage of 64.54%. Shabani(2014:1) summarizes musical intelligence as it significantly correlates with learning foreign language and it may facilitate learning of foreign language and it may facilitate learning of English language.

4.1.30 Item No. 36 “I like to think out loud.”

This item has ranked the nineteenth stage and has gained 3.11 with a percentage of 62.27%. Intrapersonal intelligence has appeared again to fulfill the students' attitude towards learning a foreign language by working alone.

4.1.31 Item No. 13 “I remember things like telephone numbers by repeating them to a rhythm.”

This item has ranked the twentieth stage and has gained 3.045 with a percentage of 60.9%. The musical intelligence returns again to cover the process of learning and teaching. Most of students prefer to learn with singing the patterns to facilitate the learning of English language.

4.1.32 Item No. 4 “I can sort out arguments between friends.”

This item has occupied the twenty -first stage and has gained 3.022 with a percentage of 60.4%. This item signifies that most of students like interpersonal intelligence to learn English language collaboratively.

4.2.1 Item No. 20 “I get restless easily.”

This item has gained 2.90 with a percentage of 58.18%. This item related to intrapersonal intelligence. For each theory, there will be strengths and weaknesses. The students suffer from above intelligence theory because there is no rest during the working alone or with group.

4.2.2 Item No. 6 “I like to make lists”

This item related to logical intelligence and has gained 2.84 with a percentage of 56.8%. The students dislike learning by lists and singing logical intelligence to cover the material. The researchers think that the students may learn by team groups with details and discussions among them.

4.2.3 Item No. 28 “I keep or like pets.”

This item has gained 2.77 with a percentage of 55.45%. The above item represents the naturalistic intelligence theory in learning. This regressive in learning naturalistic intelligence returns to the way of traditional teaching in Iraq. Most of students learn through verbal and interpersonal intelligences with traditional class; therefore, many students hesitate to use a new way in learning like naturalistic intelligence.

4.2.4 Items No. 14 “I enjoy logic problems and puzzles.” No. 27 “ I can take things apart and put them back together easily.”

These items have gained 2.72 with a percentage of 54.54%. The logical mathematical intelligence has occupied the lower level among other types of multiple intelligence theory because learning English language with four skills may need verbal, interpersonal, intrapersonal intelligence to fulfill the aims of learning. However, learning by logical /mathematics may not be suitable for four skills in English (Listening, speaking, reading, and writing). Beyhan(2010:3) claims that “ if we accept that different intelligences predominate in different students, the same learning task may not be appropriate for all students. While students with strong logical intelligence might respond well to a complex grammar explanation, and different students may be strong in visual area, so that they need diagrams and physical demonstration.

4.2 Conclusion

1. By using the questionnaire of MIT, it is found out that not only can students learn better during applying the afore-mentioned intelligence theory inside classroom, but it has been proven that musical, intrapersonal, and interpersonal intelligences occupied the top levels among other intelligences. Furthermore, the researchers agree with Armstrong’s idea (200:51) that it can open up the “door to a variety of teaching strategies which can easily be applied in the language classroom.” These strategies can be enhanced by following some of the techniques that can be implemented in English language teaching classrooms. Telling stories or narrating the novel that they study by asking each student to complete the narration of the novel till they finish it, drawing the characters of the novel can help them understand the theme and the characters of the novel.

In sum, from the experience of the researchers in teaching college students, they think that students marveled at even the drawing of the stick figures at the board. Besides, to enrich students ‘vocabulary, the students may make scrap books or note books to jot down the new vocabulary in them. Furthermore, acting a scene of the play they have studied during the four years of their study may help them comprehend the characters as well as the events of the plays so as to enhance their motivation

2. It has been found that the bottom intelligences which most of students hate to use them in learning are logical and naturalistic because using numbers, lists, nature etc. is unfamiliar for many Iraqi students. Therefore, they go toward the multiple intelligence theory that meets their attitude and motivation in learning. Due to the fact that learning English Language is a hard hurdle for a learner where many factors are involved in his reaching an optimal result of learning, one of these factors among many is that speaking is limited within the boundary of the classroom.

3. It has been found that musical intelligence has occupied the first level for many reasons mentioned by some scholars whom the researchers agreed with like the following:

- “Music in the class is applied to calm the mind, to relax muscles and to enable the students to be free from pressure and stress”(Mashayeki& Hashemi,2011)
- Sleva and Miyake(2006)state that using music in classroom can strengthen the relationship between teacher and his/her students. In addition, learning a new language requires structural and motivational properties of music because these musical

activities can develop auditory perception and meet cognitive knowledge and aid phonological memory.

4. According to the research findings, there are considerable gains of Multiple Intelligence Theory of the students- centered and direction over teachers- centered. This was identical to the previous research of Beyhan(2010:15) in which he mentions that Multiple Intelligence Theory helps organize learning environment in a learning centered atmosphere. They study the learning material deeply and have a chance to practice their subject face to face with each other. It is also consistent with Cin (2005:12) who related the similarities between the types of Multiple Intelligence Theory with many different language teaching methods. For instance, **the silent way** emphasizes the development of students' inner thinking (intrapersonal intelligence), whereas the **total physical response** emphasizes language learning through physical action (Bodily intelligence). Suggestopedia emphasizes the use of music (musical intelligence) to deepen understanding of learning. Finally, the communicative approach as well as cooperative learning stress the importance of interpersonal relationships (interpersonal intelligence). Hence, teachers may use any kind of language teaching method that concentrates on a specific kind of intelligence.
5. Learning English language based on Multiple Intelligence Theory is believed to create a suitable learning environment that enables students to learn better.
6. It has been found that a group of students are active in specific type of MIT; whereas other students are active in other ones. Therefore, teachers should build up their lectures depending on all or most types of intelligences that focus on the students' needs, motivation and attitudes. Nolan (2003:119) notices that "teachers have to use different methods and activities to meet the needs of all students." The theory offers opportunities for students to use and develop all different intelligences, not just the ones that they excel in. It also offers different learning styles, methods, and various activities. Each of the intelligence abilities is prospective in every learner and it is part of the teachers' job to delve and help students develop their own intelligences.

4.3 Recommendations

1. The teachers of English should use this method in their class because MIT shows the students' willing and attitudes to learn English language.
2. Seminars and training courses should be given to teachers to use MIT because it creates a positive classroom atmosphere. Solmundardottir(2014:7) suggests that teachers should be trained to present their lectures in a wide variety of ways using music, cooperative learning, role play, multimedia, field trips, inner reflection.

4.4 Suggestions for further studies

1. A similar study can be applied to elementary and secondary schools.
2. An Experimental study can be applied to see which type(s) of Multiple Intelligence Theory is suitable for the students.
3. An experimental study can be applied at the same level of the students to check the impact of MIT on their learning.

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