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Topic

Strategies based on Multiple intelligences to improve the English language learning in 9th grade students at Escuela Politécnica de Comercio during the second academic semester in 2019.

Research submitted in partial fulfillment of the requirements for B.A Degree in Teaching
English as a second language

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Dedication

We dedicate this research mainly to God, for giving us strength to continue in this process of obtaining one of our desires. To our parents, for their love, support and sacrifice during all these years, thanks to them we have managed to get here and become what we are. To our siblings for always being present and accompanying us throughout this stage of our lives.

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1. Introduction

Everyone knows that as human beings, we are intelligent, but not everybody knows that our intelligence is divided into eight types, some of them more developed than other ones. These eight different types of intelligence guide the way we learn and process information in the classroom (Haynes, 2019). In the following investigation, there are strategies based in the multiple intelligence that improve the learning process for English language in 9th grade students at Escuela Politécnica de Comercio during the second academic semester 2019.

The Howard Gardner's theory proposed a variety of different types of intelligence, such as linguistic, logical-mathematical, bodily-kinesthetic, visual-spatial, musical, interpersonal, intrapersonal, naturalistic (Haynes, 2019). There can be more than one type of intelligence present in a classroom as soon as, it is necessary to analyze this theory of the multiple intelligences in the development of the English-language to adapt the classroom strategies.

Each student comes to a classroom as an individual who has developed a different type of intelligence. This means that each student has his or her own intelligence superiorities and weaknesses called a learning style; these intelligence domains determine how easily or difficultly a student can learn through a specific learning strategy (Frazier, 2006). To balance learning styles and subject matter, a teacher should show students how to understand a subject by applying their most developed intelligence domain.

Teaching is one of the most difficult things to do because it is all about dealing with human minds. Human minds receive information in different ways according to different backgrounds and experiences. From here comes the importance of studying the different types of intelligences through which a human being receives, decodes, understands, applies, and analyzes information in the classroom (Amacha, 2016). In order to be successful in teaching, a teacher has to improve their abilities to address all students' thinking as different as they may be.

2. Background

No research related to multiple intelligences has been carried out at school, this investigation being the first to be carried out. The theory of multiple intelligences was developed in 1983 by Dr. Howard Gardner, professor of education at Harvard University; this theory suggests that the traditional notion of intelligence based in I.Q. Testing is far too limited. Instead, Dr. Gardner proposes eight different intelligences to account for a broader range of human potential in children and adults and these intelligences are linguistic intelligence (Word smart), logical-mathematical intelligence (number/reasoning smart), visual-spatial intelligence (picture smart), bodily-kinesthetic intelligence (body smart), musical intelligence (music smart), interpersonal intelligence (people smart), intrapersonal intelligence (self-smart) and naturalist intelligence (nature smart).

The theory of multiple intelligences proposes a major transformation in the way our schools are working, it suggests that teachers should be trained to present their lessons in a wide variety of ways using music, cooperative learning, art activities, role play, multimedia, etc. “The theory of Gardner suggests to empower the learners and not to restrict them to one modality of learning. An intelligence is a bio psychological potential to process the information” (Armstrong, Multiple intelligences in the classroom, 2009).

One of the most remarkable features of the theory is how it provides eight different potential pathways to learning. “If the teacher is keeping a student in the more traditional linguistic or logical ways of instruction, the theory of multiple intelligences suggest several other ways in which the material might be presented to facilitate effective learning” (Armstrong, Multiple intelligences in the classroom, 2009). The theory of multiple intelligences allows the subject being learned to connect with words, numbers or logic, images, music, self-reflection, a physical experience, a social experience, an experience in the natural world in other words, establishes a relationship between what was taught and the intelligences.

Linguistic intelligence: “The linguistic intelligence is the extent to which an individual can use language, both written and verbal, to achieve goals” (Armstrong, Multiple intelligences in the classroom, 2009). This intelligence includes the ability to

manipulate the syntax or structure of a language, the semantic or meaning of a language, and the pragmatic or practical use of a language. Logical-mathematical intelligence: is the ability to use numbers and logical-mathematical thinking effectively. This intelligence includes sensitivity to logic patterns and relationship.

Bodily-kinesthetic intelligence: “Expertise in using one’s whole body to express ideas and feelings, as well as facility in using one’s hands to produce or transform things” (Armstrong, *Multiple intelligences in the classroom*, 2009). It means the ability to process information physically through hands, body movement control and expression.

Visual-Spatial intelligence: This type of intelligence is related to the ability of the individual to face aspects such as color, line, shape, figure, space, and the relationship that exist among them. “It is also the ability of a person to process the information in three dimensions” (Armstrong, *Multiple intelligences in the classroom*, 2009).

Musical intelligence: “This type of intelligence is related to the ability to perceive, discriminate, transform and express themselves through musical forms” (Armstrong, *Multiple intelligences in the classroom*, 2009). Likewise, this intelligence includes singing skills within any technically and musical genre, playing an instrument perfectly and achieves with it an appropriate presentation, directing a group or orchestra and has musical appreciation.

Interpersonal intelligence: It is what allows us to understand others because it determines the choice of a couple or friends and to a large extent our success at work or in class. “Interpersonal intelligence is based on the development of two major types of abilities, empathy and the ability to manage the relationships” (Armstrong, *Multiple intelligences in the classroom*, 2009).

Intrapersonal intelligence: “Self-knowledge and the ability to act adaptively based on that knowledge” (Armstrong, *Multiple intelligences in the classroom*, 2009). This intelligence includes having an accurate picture of oneself, awareness of inner mood, intentions, motivations, temperament, and desires.

Naturalist intelligence: “To recognize and classify the numerous species of an individual’s environment” (Armstrong, *Multiple intelligences in the classroom*, 2009). It is essentially described as the ability to perceive the relationship between species and groups of objects and people, recognizing the possible differences or similarities between them.

Beyond the description of the eight intelligences and their theoretical underpinnings, certain points of the MI model are important to bear in mind. Armstrong (2009) mentions the four key points that educators should pay attention to: 1) Each person possesses all eight intelligences: some people have high level of functioning in all or most of the eight intelligences. 2) Intelligences can be developed: Armstrong suggests that everyone has the capacity to develop all eight intelligences to a reasonably high level of performance. 3) Intelligences work together in a complex way: intelligences are always interacting with each other. 4) There are many different ways to be intelligent: There is no standard attributes that one must have in order to be considered intelligent. Someone who is awkward at sport does not mean that she/he cannot be a marvel in building construction (págs 15-16).

Language learning tasks can be developed around different types of intelligences.

For instance, an activity such as writing the lyrics of a song implies the use of linguistic and musical intelligences. In a role-play where learners may need to express their feelings while they considerate others' feeling, linguistic, intrapersonal and interpersonal talents are needed. In a task where learners need to mime the title of a film for others to guess, the bodily kinesthetic and interpersonal abilities are brought into play (Arnold & Fonseca, 2009).

MI theory is an excellent tool to enable teachers to plan attractive ways to provide learners with language learning practice.

“The MI theory instructional perspective proposes that language learning can be favored by using a variety of learning tasks which call upon diverse intelligences” (Arnold & Fonseca, 2009). The teacher offers a choice of tasks, not to teach some specific intelligence but to give learners the opportunity of apprehending information in their preferred way, as well as to promote the development of their other intelligences.

3. Justification

By identifying these eight multiple intelligences, teachers will be able to recognize the importance of developing classes according to the needs of the students based on their intelligences and then teachers can apply it in their classes by making the student the center of the class. Only then can teachers improve the learning process of English learners in their classrooms. Currently, multiple intelligences are an unknown subject for most of teachers. Owing to that, students are undergoing problems while acquiring knowledge about English classes. The use of the theory of multiple intelligences will aid teachers to choose the best set of strategies focused on students' needs, taking into consideration the available tools for teachers.

The advantages of implementing the methodology of this theory is its key points which are: everybody has all eight intelligences also, almost everyone is able to develop each and every intelligence to an adequate level beside that, each intelligence can work with each other and the last but not the least there are many ways to be intelligent within each category.

Applying the method described in the theory, teachers can succeed in their labor of sharing knowledge with the students. Moreover, the improvement in the students' learning process of English will be noticeable for everyone since the strategies used by the teachers will decrease the lack of knowledge and the confidence of their groups of classes. According to the theory of multiple intelligences there are eight different types of abilities that help teachers to identify their students' weaknesses.

To get started, it is very important to briefly explain them all. Firstly, linguistic ability refers to the capacity to use words effectively, whether orally or in writing. The logical-mathematical is the ability to use numbers as mathematician, tax accountant among others and to reason well. On the other hand, the spatial is the skill to perceive the visual-spatial world accurately and to perform transformations upon those perceptions.

Likewise, bodily-kinesthetic intelligence uses one's whole body to express ideas and feelings. The following intelligence is musical and it is the capacity to perceive, discriminate, transform and express musical forms. The last three of them are interpersonal, intrapersonal, and naturalist.

Interpersonal intelligence is the ability to perceive and make distinctions in the moods, intentions of people. However, the intrapersonal is the capacity to act adaptively on the basis of that knowledge, and the last one, naturalist, is the expertise in the recognition and classification of the numerous species of an individual's environment (Armstrong, Multiple intelligences in the classroom, 2009).

4. Problem Statement

It is not simple to develop a profile of a person's intelligences, however, "teacher must help students use all their intelligences to learn what they want in addition to learning what teachers and society believe they have to learn" (Karim, Shakarami, Anderson, Yasin Yazdi-Amirkhiz, Zou, 2013) Because of this, it arose the necessity to research how multiple intelligence are related to the learning process in order to propose strategies that improve this process in English class, in students of 9th grade at Escuela Politecnica de Comercio during the second academic semester.

On the other hand, a teacher in a multiple intelligences classroom contrasts traditional classrooms. In the traditional classroom the teacher does the same every day. In the multiple intelligences classroom, the teacher continually shifts her/his method, combining intelligences in creative ways (Armstrong, 2009). Multiple intelligences teachers are constantly learning through developing their creativity and students' creativity.

Often, intelligence is defined as our intellectual potential; something we are born with. In recent years, however, other views of intelligence have emerged. One of them is multiple intelligences proposed by Harvard psychologist Howard Gardner (Cherry, 2018). The theory of multiple intelligence suggests that "All people have different kinds of intelligences". Gardner proposed that there are eight intelligences, including musical, logical mathematical, bodily kinesthetic, intrapersonal, interpersonal, naturalist, spatial-visual and linguistic intelligence.

5. Objectives

5.1. General Objective

- To analyze the types multiple intelligences on which strategies can be based to facilitate the learning process for English language in ninth grade.

5.2. Specific Objective

- To describe the multiple intelligences that improve the learning process strategies for English class in ninth grade.
- To propose strategies that integrate multiple intelligences to facilitate the learning process for English language in ninth grade.
- To apply strategies based on multiple intelligences to facilitate the learning process for English language in ninth grade.

6. Hypothesis

The implementation of multiple intelligences theory during the English teaching-learning in ninth grade students at Escuela Politécnica de Comercio will help teachers apply strategies to develop students' English language more easily.

7. Theoretical Framework

7.1. Learning Process

Learning process is a process that people pass through to acquire new knowledge and skills. Also learning process is defined as a knowledge or skill acquired by instruction or study (Merriam-Webster, 2019). Teachers should develop activities based on the particular learning outcomes that they want to achieve.

However, when talking about the learning process it is necessary to include multiple intelligences taking into account that each student learns according to his or her intelligence. Sometimes, the learning process is defined like the existence of different methods of learning or understanding new information (University, 2008).

7.2. Learning Style

For years the society has discussed how teachers should teach and how students should learn, but the fact is, as the saying goes, to each his own. Nowadays, pedagogy has evolved until the point that teachers are not the center of the class which is understood as a group of individuals with unique characteristics that differ from their fellows. Moreover, a lot of students and parents use to classify teachers and subjects, but they do not use to wonder why some teachers are better than others or why students prefer a certain subject over another. The reason is due to the different learning styles that every student has in the classroom. “Learning style is the way in which each learner begins to concentrate on, process, absorb, and retain new and difficult information” (Pashler, McDaniel, & Rohrer, 2009). In other words, learning style is how we learn better. Most of the time, the way in which a teacher conveys the information might cause that some students struggle with certain tasks in the classroom while others might understand the instructions perfectly. Fortunately, society has agreed with the learning style idea, especially when people want to be treated by educators as unique individuals.

It is important for teachers to make adjustments during the class, depending on the task, in order to treat every student as unique individuals. Instead of looking at learning

styles in isolation, educators need to understand styles as they are manifested in the classroom, interacting and influencing one another in an infinite number of ways (Cornet, 1983). To do so, teachers have to observe their students' behavior and preferences to adapt well the task and the speech delivered in the classroom to make it easy for both, students and teacher as well. Pedagogy takes into account the differences among the cognitive, affective and physiological aspects of the learning style; so that, educators have a guidance about how to interact with different students and help them out to learn better.

“The cognitive aspect includes the ways we decode, encode, process, store, and retrieve information. Much of a person's cognitive learning style can be related to hemispheric brain functioning with the processes falling to either the right or left hemisphere “ (Cornet, 1983). Some tasks are better accomplished with a sequential processing (right hemisphere) or randomly (left hemisphere). People use the hemispheres automatically depending on the task to be accomplished, however, problems come up when students unconsciously try to solve the task with the wrong process (hemispheres) and educators are not conscious of students' learning rhythms. When teachers do not identify learners' differences, it becomes harder to understand a topic. On the other hand, pedagogy suggests that educators have to mediate between knowledge and students and some good techniques are paraphrasing, asking more questions or giving more explicit directions. Sometimes to set up different time limits and give alternative materials to specific students will be needed (Cornet, 1983). It is important to have in mind that mediation is more effective when teachers have a lot of information about students' learning style, and it is not only about cognitive aspects, but affective aspects too.

“Affective aspects of learning style include emotional and personality characteristics related to such areas as motivation, attention, locus of control, interests, willingness to take risk, persistence, responsibility, and sociability” (Cornet, 1983). It is important to understand students' affective aspects in order to know how to motivate them because the same reward that is given to encourage a student might not have the same effect in another one. Besides, the way in which a task is introduced defines whether a learner get interested in it or not, that's a reason why teachers are recommended to plan the

class before delivering it and use techniques that involve all students in the classroom. Nevertheless, there is a third aspect that plays an important role in the classroom.

“The physiological aspects of learning style include sensory perception (visual, auditory, kinesthetic, taste, and smell), environmental characteristics (noise level, light, temperature, room arrangement), need for food during study, and times of day for optimum learning.” (Cornet, 1983) When teachers know their students’ differences, they understand how important is to use techniques that involves sensory perception in order to catch students’ attention. Besides, to think about the environmental characteristics in the classroom helps to implement the right techniques that will make students grab the knowledge easily. Teachers have to assign each aspect equal value while taking into account complex elements that have the potential of stimulating deeper learning and knowing that students’ preferences can be adjusted in the classroom.

“While the learning style blueprint is initially based on inheritance and prenatal influences, a person's learning predisposition is subject to qualitative changes resulting from maturation and environmental stimuli” (Cornet, 1983). Even though, people have a learning style that predominates over the others, it could change through the past of the years or by external influence. For example, as human beings get older the preferences in learning become more abstract, however, during childhood they prefer more tangible information. Besides, environmental stimuli refer to those techniques that teachers use during the class that little by little make subtle changes in learning preferences. Therefore, it is appropriate to say that teachers influence preferences in their students.

It is necessary to study in order to become an educator, what it means that educators are also students with their own learning style. Therefore, it is not a mistake to think that teachers’ teaching style is affected by their own learning style. Of course, teachers have more experience and knowledge that help them to apply a greater variation of techniques of the same style. As for example:

Two effective general methods for initiating discussion are the question, what did you learn? And the request, tell about what you read. Both allow students to use their preferred cognitive and affective style modes, which creates a feeling of success without focusing on right answers. (Cornet, 1983)

Experience is important in teaching; however, interest is the key to success because the more teachers learn about their own teaching style the better they can explain what happens in their classrooms and why.

In order to understand learning style psychology has categorized learners into 4 main types: Visual, auditory, reading and kinesthetic. “Because every student is different, it’s a good idea for teachers to develop classroom strategies that incorporate different learning styles for different types of learners” (Advancement, 2017). When considering the variety of learning styles people use, pedagogy has realized that there is no right or wrong way to learn, but there are styles that are more appropriate for given situations. Besides, it has provided educators with some techniques that they can use in the classroom in order to involve all students with different styles.

“Visual learners learn best when information is presented using patterns, shapes, and other visual aids in the place of written or spoken words” (Advancement, 2017). This kind of learners understand the information better when they are provided with images that explain concepts or ideas. In English teaching, it is very helpful to use pictures or flash-cards when teachers introduce new vocabulary because they do not need to say the meaning in students’ mother tongue and further explanations are not needed due to the concept that is provided through images. However, visual learning does not include photographs or videos because, most of the time, photographs provide information that is not meaningful for students and videos provide information either through listening or speaking. If learners receive the information through listening, it means that the teacher is using techniques to involve auditory learners.

“This learning style describes students who learn best when information is heard or spoken” (Advancement, 2017). Often, auditory learners prefer to break down information by listening and then speak. English teachers can help auditory learners by playing audio recordings of the lesson or incorporating group activities that allow students to explain concepts to their fellows. Besides, to listen to the classmates reading some lecture benefit students to enhance pronunciation, as well as articulation, and it is a good moment for the teacher to give feedback to students. Experienced teachers can use the same technique to

encompass different styles with the same strategy, as for example reading and auditory learners can be benefited in the same task.

“Students who have a reading/writing preference prefer information to be presented using words” (Advancement, 2017). Since they love reading, teachers can take advantage of them to make students read a lesson or lecture and help auditory learners to understand information better. Reading/Writing learners prefer written assignments such as reports or essays which emphasize text-based input. In English teaching, educators have to adapt the reading or writing task according to students’ level, otherwise, both teachers and student will end up frustrated and the objectives of the lessons will not be achieved. But, there is a learning style that most teachers barely include in their activities, and that style is the kinesthetic learning style.

Kinesthetic learners “are connected to reality, 'either through concrete personal experiences, examples, practice or simulation” (Advancement, 2017). Kinesthetic learners learn best when they are assigned tasks that include physical activities and tactile experiences. That is why, teachers can use T.P.R (Total Physical Response) activities in the classroom, especially when they are teaching a second language such as English. For example, kinesthetic activities can be used to teach commands, movements or body parts; of course, teachers have to adapt activities according to students’ level and age. Good teachers try to use activities that encourage learners’ participation and the best way to do it is by providing tasks that are interesting and meaningful for each of them, so that they can retain what they learn.

7.3. The Theory of Multiple Intelligence

Gardner's theory presents different intelligences that result in many different ways of knowing, understanding, and learning about the world. (Centros Comunitarios de Aprendizaje, 2001) The Multiple Intelligences are manifested in what people like, what they prefer and what they stand out by creating a relation with what they learn. Therefore, if it is easier for people to learn about what they like or care about, they can also stand out more in a certain subject than in another.

Gardner's multiple intelligences theory states an alternative definition of intelligence based on a radically different view of the mind. He proposes a pluralistic view of the mind, recognizing many different and discrete facets of cognition. Besides, he acknowledged that people have different cognitive strengths and contrasting cognitive styles. This view of intelligence states that some finite set of mental processes gives rise to a full range of intelligent human activities. (Christison, 1998)

He gave a new definition of intelligence that contrasted the traditional definition. Intelligence is “the capacity to solve problems or to fashion products that are valued in one or more cultural settings” (Brualdi, 1996). Gardner did not limit the definition of intelligence to only two areas, linguistic and computational. This theory differentiates eight intelligences that includes Linguistic intelligence logical-mathematical intelligence, spatial intelligence, bodily-kinesthetic intelligence, musical intelligence, interpersonal intelligence, intrapersonal intelligence, naturalist intelligence (Herndon, 2019). The holistic definition that he gave allows pedagogy to give a step forward because students have more opportunities to show their skills in different ways and depending on the social context where they live. Since, what it is consider as value in one culture it could be useless in another one, it is unfair not to take into account the factors that affect learners.

“Although, the intelligences are anatomically separated from each other, Gardner claims that the eight intelligences vary rarely operate independently” (Brualdi, 1996). Even though, there are different intelligences we cannot use only one of them to complete a task. As for example, a dancer needs musical, kinesthetic and interpersonal intelligence to excel in his or her performance. (Brualdi, 1996)

Besides, “Everyone is born possessing the eight intelligences. Nevertheless, all students will come into the classroom with different sets of developed intelligences.” (Brualdi, 1996) According to this theory, all human beings possess the eight intelligences to a greater or lesser extent. Gardner does not deny the genetic component, but intelligences are abilities or skills that as such, can be developed in one way or another depending on the environment, the experiences lived, the education received, etc. In addition, multiple intelligences are not regulations, much less limiting. A person can develop new skills through suitable tools. Because of that, according to the model proposed by Howard

Gardner, all human beings are trained for the broad development of their intelligences, based on their abilities and motivation (Christison , Kennedy, Deborah, & Ann, 1999).

7.3.1. Verbal-Linguistic intelligence.

The verbal-linguistic intelligence includes the abilities to manage the spoken and written language, to use words effectively in order to reach a certain purpose (Armstrong, 2009). Writers, lawyers, journalists, teachers, translators or linguists would be some of the social roles associated to it.

7.3.2. Logical-mathematical intelligence.

Logical-mathematical intelligence mainly consists in the capacity to analyze problems logically, carry out mathematical operations and investigate issues scientifically. In Gardner's words it entails the ability to detect patterns, reason deductively and think logically (1983). This intelligence is most often associated with scientific and mathematical thinking and scientists, engineers, computer experts, researchers and bankers but it is also associated with language since it is necessary to use logic when learning a new language.

7.3.3. Visual-Spatial intelligence.

Our visual-spatial intelligence is the ability we have to perceive all the elements (form, shape, line, space, color) necessary to create a mental image of something. Mental images are present in our thought and have a strong influence on reasoning (Arnold, 1999). It has to do with the explanation and comprehension through the use of pictures, graphs, maps, etc. This type of learning gives students visual clues to help them remember. Besides, they have excellent visual receptive skills and excellent fine motor skills. Students with this intelligence use their eyes and hands to make artistic or creatively designed projects.

Gardner defined spatial intelligence as the ability to recognize both, large and small visual patterns. He suggested that navigators and pilots would possess high levels of spatial intelligence, as would sculptors, surgeons, chess players, and architects. Carroll (1993) noted that visualization tasks generally form a first-stratum factor, and one that tends to be highly g-loaded. Spatial scanning is the ability to scan a field quickly, to follow path visually, and to reject false leads.

7.3.4. Bodily-kinesthetic intelligence.

Bodily-kinesthetic intelligence is shown in the ability to perform coordinated corporal movements; the skill of using the body to express feelings or ideas (Armstrong, 2009). It is the ability shown by people who are able to use their hands to transform elements with precision: dancers, actors, athletes, osteopaths, crafts-people, chefs and surgeons. This type of learning combines physical actions with linguistic response and are very helpful for tying language to actions.

7.3.5. Musical intelligence.

It is the faculty of perceiving, distinguishing, transforming and expressing musical forms. The musical intelligence comprehends the ability to play, compose and appreciate musical language as well as the recognition of tonal and rhythmic patterns. Musical students think, feel and process information primarily through sound. They have a superior ability to perceive, compose, and/or perform music. They create sound/music about their subject or make connections between sound/music and the information you are teaching. Musicians, singers and composers present high rates of this type of intelligence (Armstrong, 2009).

7.3.6. Interpersonal intelligence.

According to Gardner (1983), an individual who is high in interpersonal intelligence understands the intentions, motivations, needs, and desires of others, and is capable of

working effectively with them. Gardner stated that teachers, clinicians, salespeople, politicians, and religious leaders all use interpersonal intelligence.

Gardner's interpersonal intelligence would seem to be related to the construct of emotional intelligence, which can be associated with intelligence or with personality depending on how it is measured. For example, O'Conner and Little (2003) reported that an ability-based measure of emotional intelligence was correlated more strongly with cognitive ability than with personality. A self-report inventory of emotional intelligence, on the other hand, was correlated more strongly with personality than with cognitive ability.

7.3.7. Intrapersonal intelligence.

Intrapersonal intelligence is directly related to the capacity of reflection and analysis about one's feelings, to the faculty of constructing an accurate image of oneself and organize and rule one's life based on it (Armstrong, 2009). It means to learn through self-knowledge leading to understand the motive, goals, strengths and weaknesses. People with a strong intrapersonal intelligence have a deep awareness of their feelings, ideas and goals. Students with this intelligence usually need time alone to process and create.

7.3.8. Naturalist intelligence.

It is the ability to recognize elements and learn from the natural world around. This intelligence refers to a person's natural interest in the environment. These people enjoy being in nature and want to protect it from pollution. People with a remarkable Naturalist intelligence will easily learn how to distinguish, classify and use the elements of the environment. They will observe, experiment, reflect and make questions (Armstrong, 2009). Doctors, veterinarians, and zoologists for example, will show this type of intelligence.

7.4. Profile of a Person's Intelligences

The profile of a person's intelligence is the set of characteristics that a person gathers and that determines the most developed intelligence to reach the least developed (Educaonline, 1998). That is why, we are all similar at the same time but very different in our capacity for reasoning and learning.

7.5. Strategies Based on Multiple Intelligences

7.5.1. Linguistic intelligence strategy.

Gap-fill exercises: The teacher provides students with a clear grammar explanation about a specific topic, all this combined with rules and simple examples. The teacher makes the class clear and easy to understand for students, clarifying some points or doubts that they may have. Then, students are provided with a worksheet with gap-fill exercises, based on the previous grammar explanation.

7.5.2. Logical-mathematical intelligence strategy.

Analogies: The teacher provides students with a short list of 8-10 solving problems in which the student compares words. The exercises will help the student to improve his/her writing skills and critical thinking at the same time, through deciding what kind of relation the words have. Since it is a reasoning exercise, the student has to take time to analyze it and complete it.

7.5.3. Visual-Spatial intelligence strategy.

Picture Match-Up: The teacher introduces new vocabulary using pictures. There are 7 to 9 different pictures with the new word written below to them. The teacher shows the pictures and says the words and students after her. After that, the teacher shows the pictures

one by one and students try to make an imaginary relation between the pictures and the words. Finally, students say the correct word according to the picture.

7.5.4. Bodily-kinesthetic intelligence strategy.

Simon says: Students stand up and form a circle. The teacher stands in the middle of the circle and students walk around. Students have to do what teacher says; for example, teacher says:” Simon says... make groups of three...!”, and students make groups of three. Teacher says: “Simon says... Rise your right hand...!”, and students rise their right hand. Teacher says again: “Simon says... sit down on the floor...! and students sit down on the floor...and so on.

7.5.5. Interpersonal intelligence strategy.

Role play: Students work in pairs and create a dialogue based on the topic of the lesson or the one they prefer. Teacher provides a dialogue example and some expressions to help students to organize their ideas. Then students take turns and perform the dialogue in front of the class.

7.5.6. Intrapersonal intelligence strategy.

Personal Experience: The student talks about his/her experience in learning English through writing a short paragraph with simple sentences. In the beginning of the activity, the teacher introduces himself and talks about his personal experience teaching English, so that the student understands how the task has to be carried out. After that, the student writes in his/her notebook the paragraph by following a structure provided, as a guidance, by the teacher. Once the paragraph is done, the student reads it to the rest of the class.

7.5.7. Naturalist intelligence strategy.

Exploring outdoors: Students go outside the classroom and explore natural surroundings. The teacher provides the appropriate vocabulary for natural objects in the environment and gives them some tips to take care of them. Students can make a chart, for example, plants classification, make a drawing for each plant and highlight important tips or recommendation on how taking care of them.

7.5.8. Musical intelligence strategy.

Missing words: The teacher presents a video with the letter of a song. The student listens and watches the video twice to be acquainted with the song. Then, the student practices pronunciation with some expressions from the song provided by the teacher. Later, the student only listens to the song and completes the missing words on a paper with the incomplete letter of that song.

8. Methodological Design

This research about strategies based on multiple intelligences to improve the English language learning in ninth grade students at Escuela Politécnica de Comercio during the second academic semester 2019 took as a universe 37 students of 9th grade of Escuela Politecnica de Comercio. The sample was established in 20 students divided into 10 girls and 10 boys of the same grade, and the teacher.

The analysis was descriptive because there was a sample case about multiple intelligences in a classroom that was analyzed, evaluated and interpreted in order to explain and validate the hypothesis posed in the research. The methods used were empirical, theoretical and inductive. It was empirical because the research obtained information from internet resources, tests, interviews, observation in class, self-evaluation of activities and monitoring of activities used in the classroom, with the teacher and with the students. Moreover, the theoretical method was used to analyze, synthesize and deduce the information obtained through the instruments. In addition, the inductive method was used when the data obtained from the instruments applied were processed and interpreted.

In order to collect data and information for the research, the following instruments were applied: An interview to know what kind of activities teacher uses to promote multiple intelligences in the classroom was applied to the teacher. The interview was completed in 30 minutes and the range of intelligences to analyze with this instrument are: linguistic, logical-mathematical, bodily-kinesthetic, visual-spatial, musical, interpersonal, intrapersonal and naturalist. The interviewer explained clearly how the questionnaire should be completed to the teacher who did not ask any questions, in addition, completing the questionnaire was easy for her. Furthermore, the interview was completed inside the teacher's room, so there was no interruption at the moment of completing the interview. An observation guide to gather information about how teacher carries out all the different activities in order to develop multiple intelligences on students was applied to the teacher's class on 2 different days. The 2 classes were recorded and later analyzed with a duration of 45 minutes each of them.

A multiple intelligences test with Spanish questions to students get a better understanding of them was applied in the ninth grade “A” to 20 students divided into 10 girls and 10 boys, the students took the exam in 30 minutes. The test allowed to identify the most developed and least developed intelligences in each student. From the results obtained in the test of multiple intelligences, class activities based on the 8 intelligences were created in order to be able to understand the influence of the less developed intelligences. However, since the intelligences can be enhanced, we decided to apply only activities based on the less developed intelligences that were visual-spatial, kinesthetic, interpersonal, naturalist and intrapersonal. These activities were completed in 2 class periods, in 2 days and recorded on video for later analysis. Once class activities based on the less developed intelligences were completed, the students carried out a self-evaluation of them in order to support previous information obtained from the multiple intelligences test and the multiple intelligences activities as well. This self-evaluation was a Spanish questionnaire through which we could get information about how students felt during the activities and what they could learn from them. Besides, the class was recorded in order to monitor the strategies applied. We used five monitoring guides with the purpose to get the impacts results of strategies implemented to develop multiple intelligence during English teaching. These guides describe how students behaved during multiple intelligences activities. To apply all these instruments, interview, observation guide, multiple intelligence test, multiple intelligence activities based on the test and monitoring guides to students, were necessary seven days on which ones the instruments were analyzed and finally they provided us quantitative data used to enrich the analysis of results for our investigation project.

| Specific Objectives | Variable | Sub Variable | Instrument |
|---|--|---------------------|------------------------------|
| To propose strategies to improve the learning process in English class. | Strategies to improve the learning process in English. | Gap-fill exercises | Multiple intelligences test. |
| | | Analogies | |
| | | Simon says | Class observation. |
| | | Missing words | Interview. |
| | | Role play | Proposed activities. |
| | | Personal Experience | Self-evaluation. |
| | | Exploring outdoors | Monitoring. |
| | | Picture Match-Up | |

9. Data Analysis

9.1. Observation Guide Analysis

In our investigation we used an observation guide in order to gather information about how the teacher implemented different strategies to develop multiple intelligences on students during the English learning process. In the first day of observation the teacher had a lesson about comparative and superlative adjectives designed for a group of 35 students, 19 female students and 16 male students. The teacher prepared a final task in which learners had to put into practice the grammar and vocabulary provided during the lesson. There were 32 students in the second day of observation, 17 females and 15 males. Besides, the teacher prepared a lesson in which scholars had to use vocabulary about directions during a conversation that they acted out in the classroom.

During the first lesson, we observed that the teacher used visual aids to explain students the use of comparative and superlative adjectives and, through the use of flashcards, the professor promoted the use of a visual-spatial intelligence. After that, she wrote on the board sentences in which students had to put into practice the grammar explained with the flashcards. Moreover, in the activity the teacher encouraged the use of two intelligences at the same time, the verbal-linguistic and intrapersonal, by making students complete sentences with the correct adjective. In the last exercise, the teacher implemented a task that required the bodily-kinesthetic and linguistic intelligence because the student had to burst a balloon and make a sentence orally with a superlative or comparative adjective. During the different stages of the lesson, the educator gave clues to complete the exercises and congratulated the students by doing well. Besides, the lesson was planned according to learners' levels.

In the case of students, they were attentive and interested in the class since the very beginning due to the flash-cards used in the warm-up activity. Besides, they followed instructions correctly and they respected each other. During the completion task students were motivated and completed all the sentences thank to the clues and feedback provided by the teacher. In the last activity, students cooperated in order to form sentences with the proper structure. Finally, most of students achieved the performance indicator of the lesson

because they were able to form sentences using a superlative or comparative adjective either with help of the teacher or classmates.

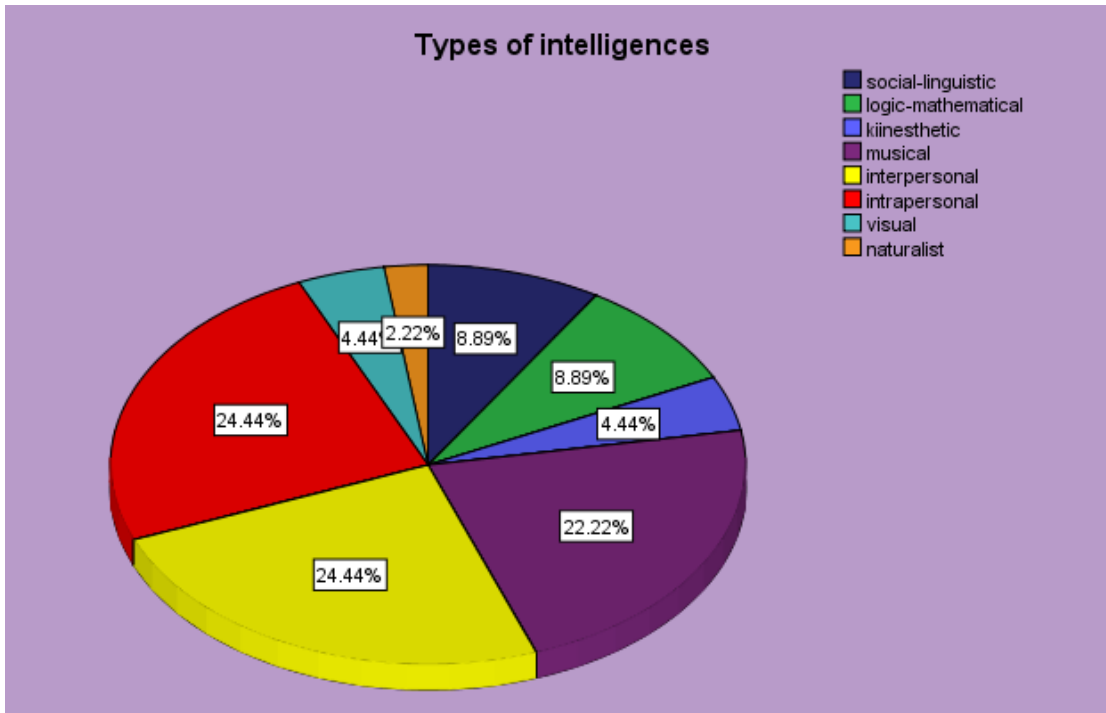
The second day of observation, the teacher used visual aids to review vocabulary about directions and through the use of photos and pictures the professor promoted the use of a visual-spatial intelligence. After that, she also reviewed with the students the meaning and use of words about directions on the board. During the clarification of meaning and use of vocabulary, the educator encouraged the use of the verbal-linguistic intelligence. However, it was carried out with a teacher centered method because there was a book-based explanation in which the students did not have opportunity to participate and there were some gap-filling exercises taken from the book that were inconsequential for the class. In the last exercise, the teacher implemented a task that required the bodily-kinesthetic and interpersonal intelligence because the students had to make and perform a conversation at an airport, in which they used the vocabulary provided by the teacher, who also helped the learners by giving a model of the dialogue in a previous lesson. Even though, part of the lesson was a teacher-centered class, the lesson was planned according to learners' levels.

During the last observation, the students were cooperative and responsive. However, they were not totally engaged in the lesson. Besides, a few students completed the grammar exercises in their books. In the last activity, students cooperated in order to make and perform a conversation with help of a model provided by the teacher. Nevertheless, some of them were reluctant or shy to carry out the conversation in front of the class. Finally, not all of the students achieved the performance indicator of the lesson because they were unable to use vocabulary about directions in a short conversation.

9.2. Graphical Analysis

9.2.1. Graphic about multiples intelligences test.

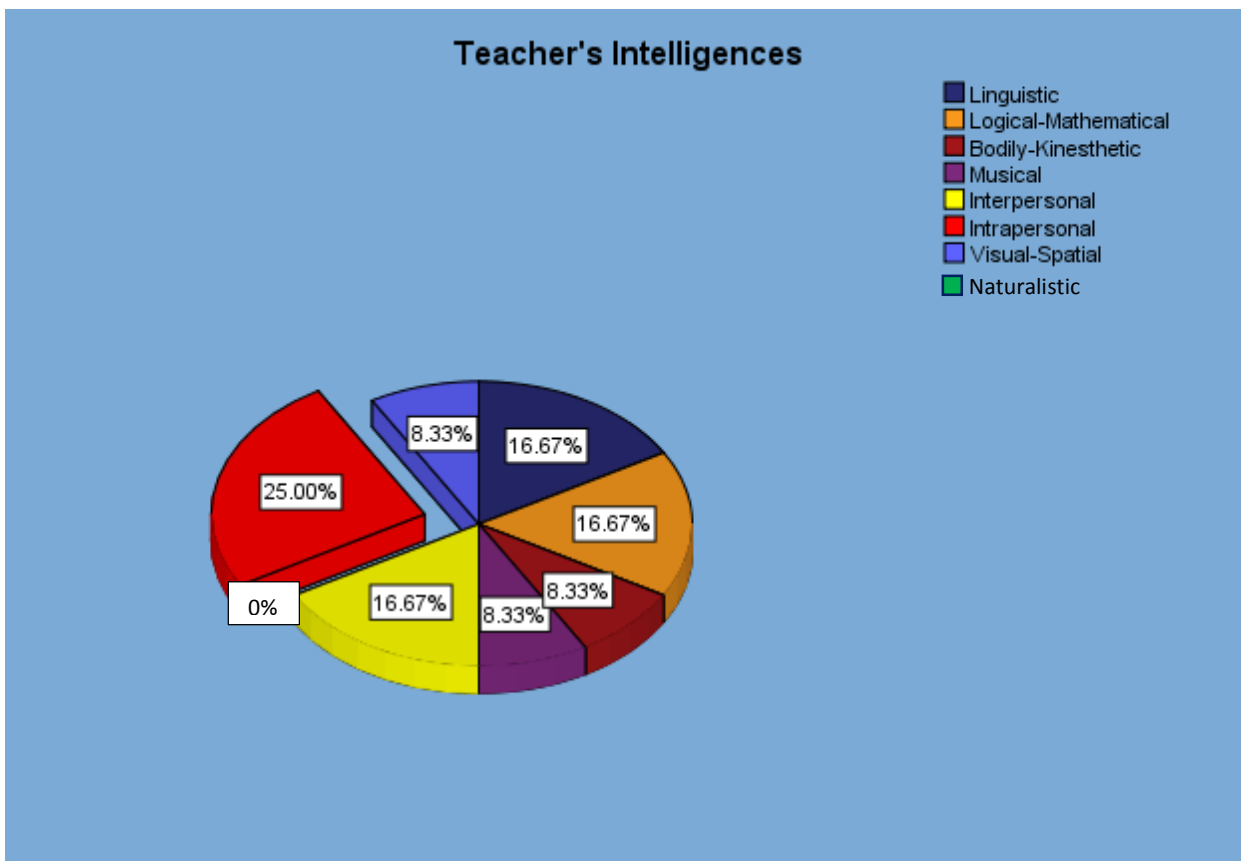
Graphic N^o 1



The results of the multiple intelligences test applied to students in order to identify their intelligences reflects that 11 students have very marked interpersonal intelligence, 11 students have very marked intrapersonal intelligence, 10 students have very marked musical intelligence, 4 students have very marked logical-mathematical intelligence, 3 students have very marked verbal linguistic intelligence, 2 students have very marked visual-spatial intelligence and 2 students have very marked bodily-kinesthetic intelligence and 1 student has very marked naturalist intelligence. The multiple intelligence test shows that the outstanding intelligences in 9th grade students are interpersonal, intrapersonal and musical intelligence, and the less developed intelligences are verbal linguistic, logical mathematical, visual-spatial, bodily-kinesthetic and naturalist. Due to these results, class activities will be developed with 9th grade students based on the less developed intelligences.

9.2.2. Graphic about teacher interview.

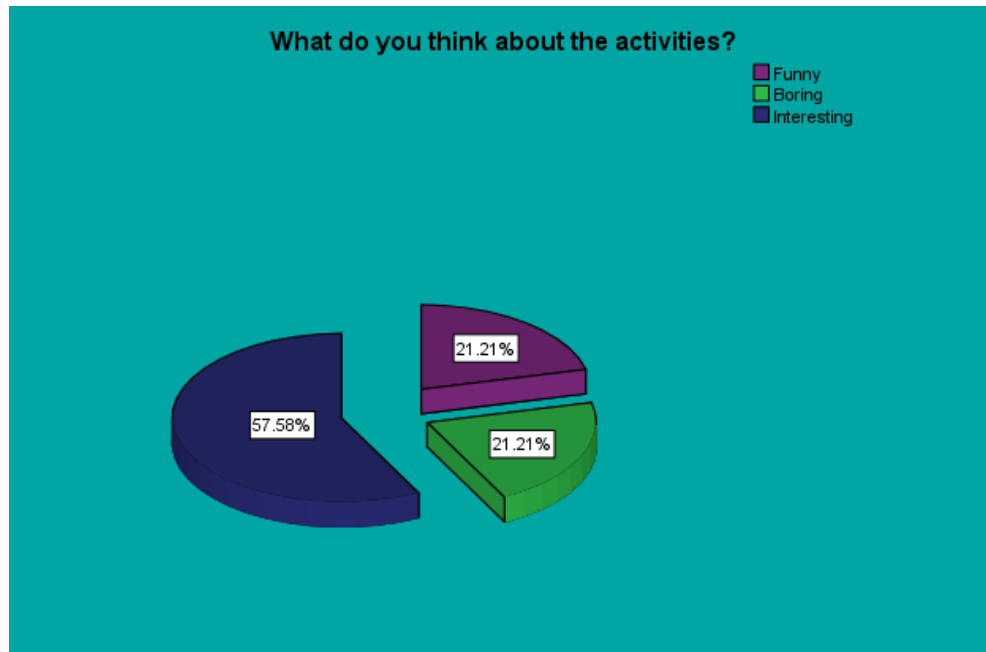
Graphic N^o 2



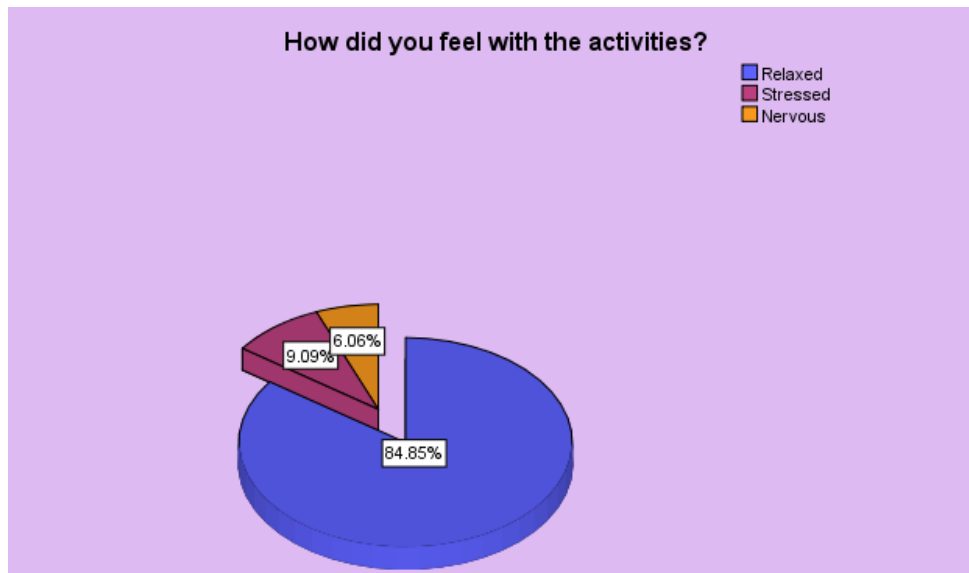
Through the interview designed and applied to know teacher's strategies that promoted multiple intelligence in the classroom, we obtained the following results. The intelligence most worked by the teacher is intrapersonal followed by interpersonal, verbal linguistic and logical-mathematical intelligence. Two of these coincide with the most developed intelligences in the students, intrapersonal and interpersonal. All this emphasizes that the teacher took advantage of these two intelligences in the activities that she carried out in class. Besides, the naturalist intelligences less worked in class, coincide with the intelligences less developed in the students. From this, we can conclude that the intelligences used in the activities by the teachers influence the development of the students' intelligences.

9.2.3. Graphics about questionnaire applied to students (Self-evaluation).

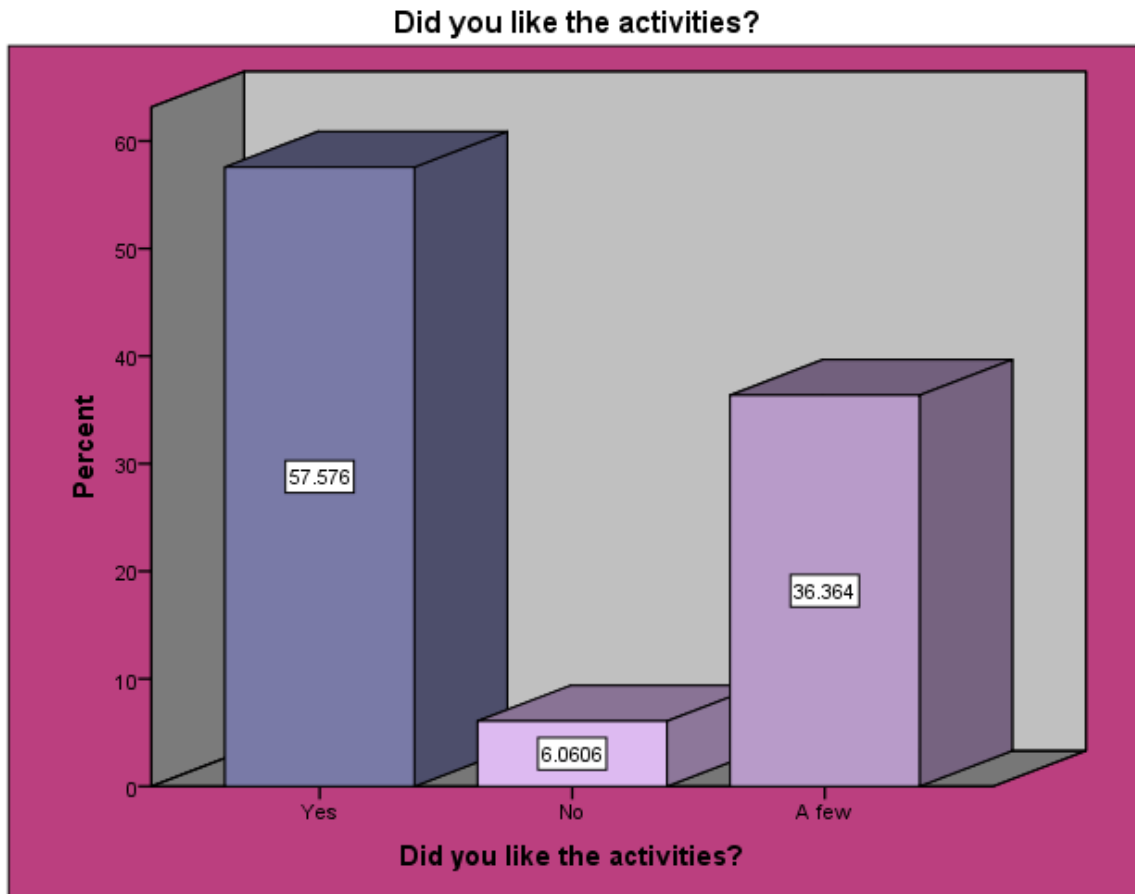
Graphic N^o 3



Graphic N^o 4

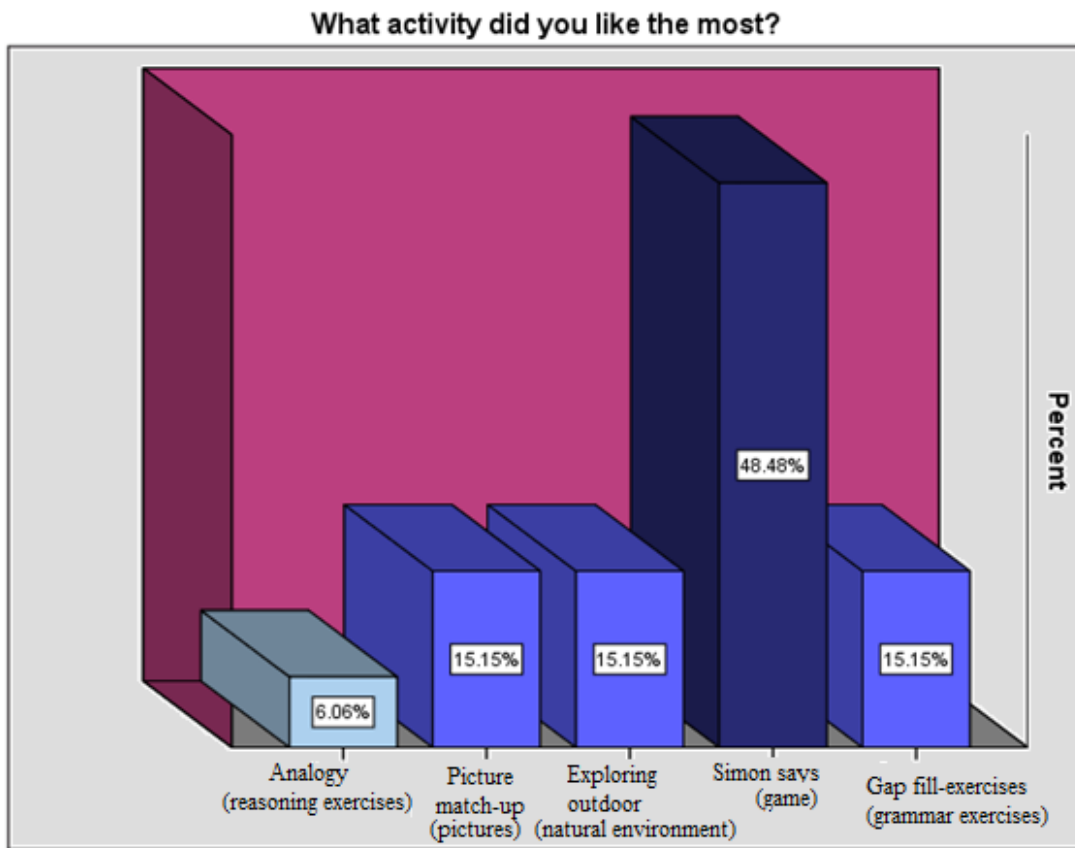


Graphic N^o 5

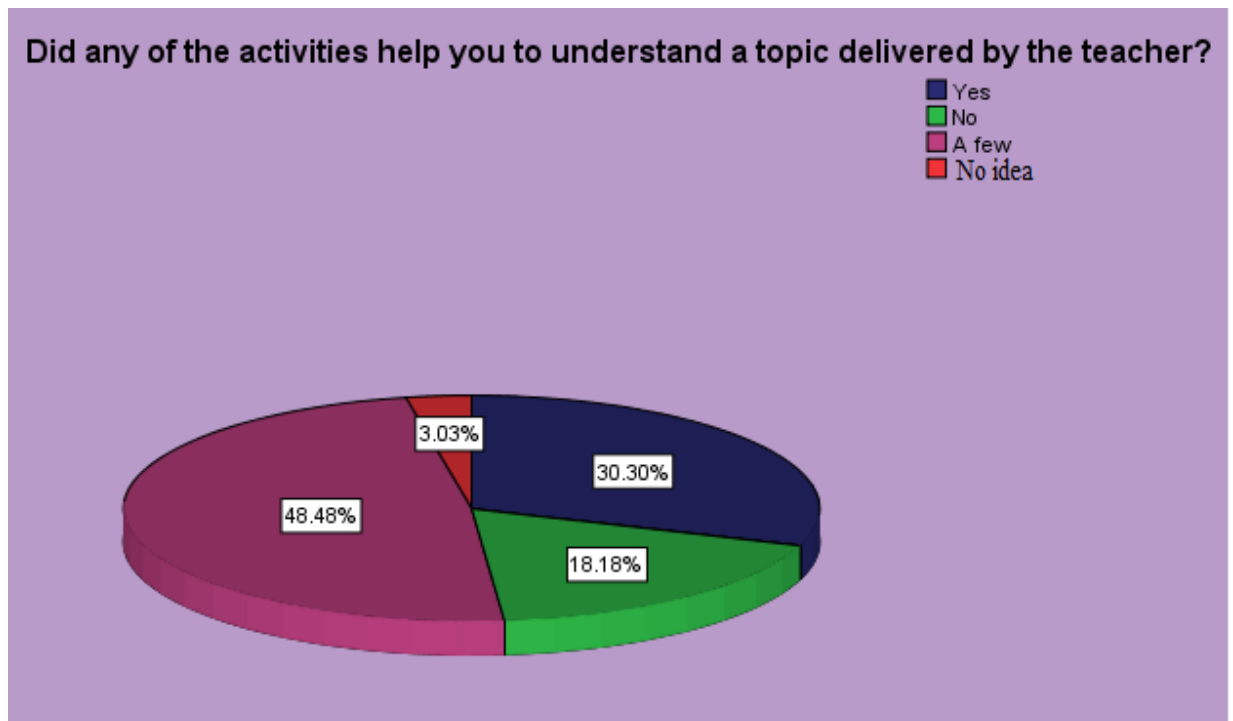


According to the graphic N^o 3, N^o 4, N^o 5 and based on questions of self-evaluation applied to students in order to know how they felt during the multiple intelligence activities, over 55 percent of the students liked the multiple intelligence activities, analogy, gap fill-exercise, Simon says, picture match-up and exploring outdoor; they were interested in them and felt relaxed. Less than 10 percent of the students felt stressed, nervous or disliked these activities. By establishing a relationship between what students like and their intelligences, the responses showed that the activities carried out, analogy, gap fill-exercise, Simon says, picture match-up and exploring outdoor, based on their less developed intelligences, verbal linguistic, logical-mathematical, visual-spatial, bodily-kinesthetic and naturalist interested them and encouraged the development of those intelligences.

Graphic N^o 6



Graphic N^o 7

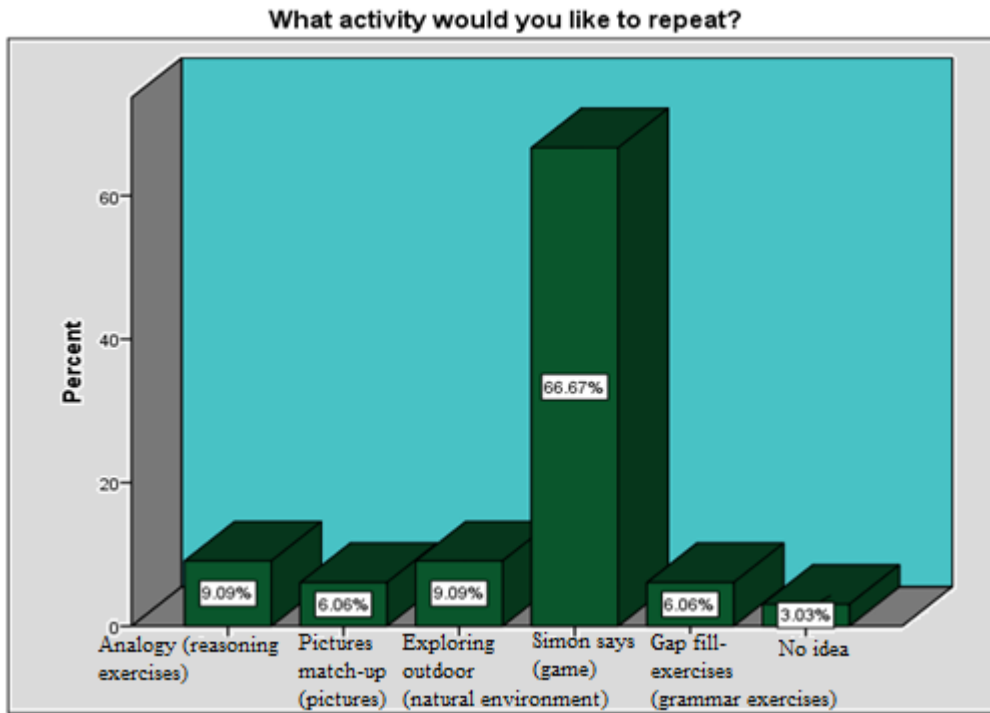


Graphic N^o 8

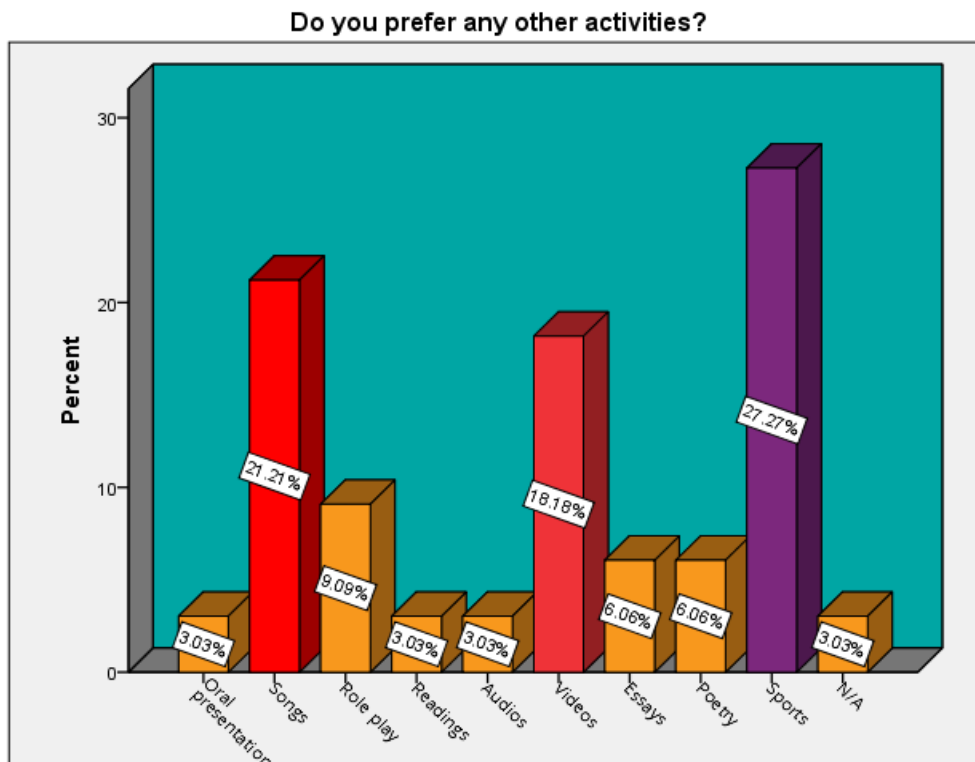


According to the graphic N^o 6, N^o 7, N^o 8 and based on the questions of the self-evaluation applied to students to know what they learned from the multiple intelligences activities carried out, it shows that all these activities, gap fill-exercise, picture match-up, Simon says, analogy and exploring outdoor, helped the students develop their English skills a little or totally. The students liked all these activities being the most preferred games that are related to bodily-kinesthetic intelligence, intelligence that is less marked in them and less worked by the teacher. So it can be expressed that if the teacher worked this intelligence the students would have a high probability of developing it.

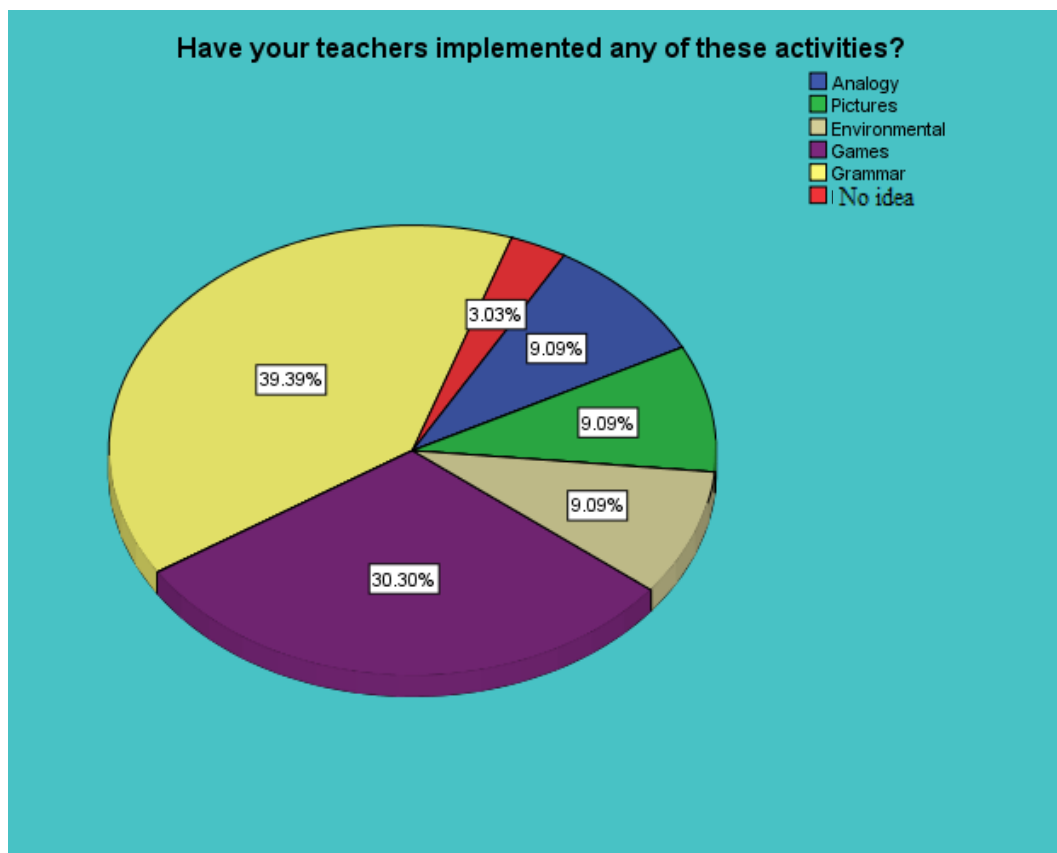
Graphic N^o 9



Graphic N^o 10



Graphic N^o 11



According to the graphic N^o 9, N^o 10, N^o 11 and based on the questions of self-evaluation to know about their preferences at the moment of developing multiple intelligences activities, students preferred activities related to bodily-kinesthetic and visual-spatial intelligence, these intelligences are the least developed and the other preference is with musical intelligence one of the most developed intelligences. This shows that these intelligences can be part of the most developed intelligences if the teacher uses them.

9.3. Analysis of the Monitoring of the Activities Carried out

We used five monitoring guides in order to gather information about the impact of the strategies implemented to develop multiple intelligences during the English teaching process. The observation guides have eleven items that are divided into 5 open questions and 6 close questions. The criteria were students' behavior towards the strategies applied by the teacher.

The first activity about analogy (reasoning exercise) was designed to encourage the use of logical operations through the analysis and comparison of words that encouraged the logical-mathematical intelligence. The activity consisted on 10 solving problems to be completed in 15 minutes. During this activity the students showed interest in the topic introduced by the teacher and they completed it 5 minutes before the time given. Besides, the 10 students that participated barely asked for help. Although, only ten students out of 20 had an active participation, all of them worked in groups and solved the problems. The class reacted positively to the activity and there was only one wrong answer.

During the second activity, we focused on the naturalist intelligence and the activity implemented was "exploring outdoor" (natural environment). This intelligence refers to a person who easily learns from the environment, so students went outside the classroom and explored natural surroundings. During the activity students showed interest and an active participation, as in the first activity. However, most of the 18 students that participated needed help to complete the activity. Besides, the activity was a little confusing, giving 12 correct answers out of 18. Since the activity was carried out outside the classroom, students were distracted and the majority completed the exercises by asking their classmates. The time given in this activity was 25 minutes; nevertheless the activity was completed on 30.

Another activity was a gap fill-exercise (grammar exercises) in order to work on the verbal linguistic intelligence. This intelligence refers to the ability of explaining and understanding written and spoken language. So that, it was carried out a grammar explanation by the teacher and, based on this students completed 10 gap fill-exercises. The time for the activity was 25 minutes. Most of students paid attention to teacher's instructions and participated actively. Apparently, they understood the topic but they asked each other for help when they had to complete the exercises. However, they had a positive

attitude and there was only one mistake found in the results of the activity. The activity was developed in 30 minutes.

In order to encourage the visual-spatial intelligence on which students have a better comprehension through the use of pictures, we carried out the activity “pictures match-up”. In this activity students were introduced with a new vocabulary through the use of pictures. Unlike the previous activities, here students were enthusiastic and did not ask for help at all. The activity was planned to last 10 min, nevertheless, students completed the activity in 4 min and the 8 students that solved the exercises on the board did not make any mistake. In short, this activity was the easiest to carry out for the teacher and students and it showed the best results.

Finally, the last activity was the game “Simon says” on which students had to respond to teacher’s commands using only their body, and it was implemented to develop the bodily-kinesthetic intelligence. In this intelligence students use the body to express feelings or accomplish tasks. As in the “pictures match-up” activity, the students were enthusiastic and they did not need help for activity completion. Since there were 20 students in the classroom, they all participated with a positive attitude because they received instructions properly from the teacher. Students took from 4 to 6 seconds to perform a command said by the teacher and there were 37 good answers out of 39. The whole activity was completed in 10 minutes.

10. Conclusions

Based on the results obtained in the analysis of the instruments and taking into account the objectives of this research, it can be concluded the following:

The analysis of the teacher's intelligences indicates that most of her activities encouraged the use of 3 different intelligences. However, she did not have information about Gardner's theory. Indirectly, the teacher preferred to use intrapersonal activities during her lessons. Besides, she used interpersonal, linguistic and logical-mathematical activities. Based on the theory, we should use different activities that help develop the 8 intelligences. Nevertheless, the type of tasks assigned to the students did not promote a communicative environment in which they had to use all the skills and sub skills needed to speak the English language.

Besides, the lack of development of musical intelligence in the teacher affects the implementation of innovative or new strategies that can take advantage of students' preferences in order to enhance their English language skills. The Multiple Intelligences Test showed that interpersonal, intrapersonal and musical intelligence are the main intelligences developed in students. Therefore, there is a coincidence between the teacher's activities carried out in the classroom and the first two intelligences marked on the class. However, activities that involved music or songs are barely taken into account by the professor.

Based on the observation guide used during the activities, we conclude that students were able to develop their English language skills and intelligences (kinesthetic, visual, logical-mathematical, naturalist, and linguistic) while enjoying new activities that were carried out in the classroom during different lessons. According to the test applied to students and the questionnaire applied to the teacher, we decided to use 5 activities focused on the intelligences with minor development in the students. Those intelligences were logical-mathematical, naturalist, verbal-linguistic, visual-spatial and bodily-kinesthetic.

The observation guide also proves that students showed interest during most of the activities and they were very enthusiastic with two specific activities that worked on their visual and kinesthetic intelligence. The teachers in charge of the lessons gave a brief

explanation of the topic and clear instructions that helped students to participate actively and react positively to the activities proposed in the classroom. However, students were anxious and distracted when they had to go outside the classroom to carry out a naturalist activity, probably because they had never gone outside the classroom during class hours. Nevertheless, the poll applied after the activities showed that they retained more information from that naturalist activity than the others.

Besides, we were able to confirm that students had a positive opinion about the activities proposed by the teachers, thanks to the self-assessment applied to students after the activities. Most of students liked and felt relaxed with the activities. The theory presented in this research says that if teachers present their lessons in a variety of ways, they will be able to empower students and make them the center of the class. As a result, the learning process will be easier and students will be more willing to learn the English language.

Finally, we can say that our hypothesis is truth because the activities we chose based on students' intelligences were able to develop their English language skills. First of all, students prefer activities related to kinesthetic and visual intelligences which are the least developed for them and the teacher, as well. Besides, they had minor problems to carry out the activities, even though it was the first time they were assigned to carry out that kind of activities. Moreover, they were able to retain more information from those activities that they enjoy the most and, they were able to work on the language skills needed to speak English without fear and stress.

11. Recommendations

To help teachers implement the MI Theory in the classroom and facilitate students' understanding, the following recommendations are proposed:

1. To take into account the variety of intelligences in the classroom in order to satisfy student's needs.

To improve the English learning process, the teacher should take into account the Multiple Intelligences theory at the moment of planning or developing a lesson because each student has his or her own abilities, personality and learning style. By doing so, teachers will be able to choose the best set of strategies, as for example a vocabulary game or a task of listening for key words, in order to apply lesson plans that satisfy students' needs.

2. To inquire into Multiple Intelligences Theory due to the fact that most of teachers in high school barely know about it.

The Multiple Intelligences methodology is barely used by teachers in their classrooms because they do not have knowledge about the theory. Therefore, teachers should look into more methods or approaches that help them to enhance the quality of education in English learning.

3. Teaching material

To deliver an inclusive lesson that promotes participation and cooperation, schools should provide teachers with enough resources that help them deliver a lesson in which students have an opportunity to show their English language skills in a variety of ways. The teacher should also look for his own teaching material in case of lack of resources by the school. This could encourage students to participate and feel motivated during the learning process.

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13. ANNEXES

UNIVERSIDAD AUTÓNOMA DE NICARAGUA

UNAN – MANAGUA



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MANAGUA
UNAN - MANAGUA

ENGLISH DEPARTMENT

OBSERVATION GUIDE N° _____

Teacher's name: _____

Subject: _____ Number of students: _____

Grade: _____ Time: _____

Objective: To gather information about how teacher uses different teaching activities in the classroom in order to develop multiple intelligences on students during the English learning process.

Instructions: According what you observe, mark with a ✓ to answer all the subsections in the order given.

1. The strategies teacher uses to teach in the classroom:

- Cooperative Learning
- Vocabulary Building
- Student-chosen Text
- Language Assessments
- Visuals and manipulatives
- Others

2. Kind of activities teacher uses to teach students:

➤ Verbal-Linguistic

- Crossword puzzles
- Writing short stories/a letter
- Digital resources
- Creating poems
- Telling a story
- Debates
- Teacher-centered explanations
- Essays and written reports
- Book based grammar and language function explanations
- Gap-fill exercises

➤ Visual-spatial

- Taking photographs
- Mind maps
- Photos, paintings
- Videos
- Games
 - Musical
- Writing songs
- Putting original poems to music
- Rhythm and clapping to memorize information
 - Body-kinesthetic
- Typing
- Role plays/drama
- Movements games
 - interpersonal
- Small group work
- Team competitions
- Interviews
 - Logical-Mathematical
- Conducting experiments
- Science tools
- Making up analogies
 - Intrapersonal
- Speaking about personal experience
- Writing in diaries
- Writing essays
 - Naturalistic
- Exploring outdoors
- Caring for classroom plants/pets
 - Others

3. Kind of material teacher uses for develop his teaching activities in the classroom:

- Books
- Pictures
- Maps
- Drawing
- Crossword puzzles
- Games
- Videos
- Songs
- Laptops
- Tablets
- Others

4. Activities are elaborated by the teacher according students' level:
 - All the activities
 - Some of the activities
 - Any of the activities

5. Do these activities call the students' attention?
 - Yes
 - No
 - Some of them

6. Teacher uses different strategies to develop student's social skills:
 - Cooperative learning
 - Role –plays
 - Pen-pals
 - Others

7. Teacher uses different activities to engage students' motivation:
 - Motivational phrases
 - Games
 - Role-plays
 - Feedback
 - Others

8. Did the teacher reach the objectives class?
 - Yes
 - No
 - Some of them

9. Students respond to the teacher by:
 - Following directions
 - Display understanding
 - Keeping attention
 - Showing active participation
 - Getting involved in the lesson
 - Accomplishing tasks by themselves
 - Being motivated to learn
 - Being attentive and interested
 - Being cooperative and responsive
 - Being enthusiastic about the lesson.

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ENGLISH DEPARTMENT

TEACHER INTERVIEW

Teacher's name:

Subject: _____ Gender: _____

Objective: To know what kind of teaching activities teacher uses to promote multiple intelligences in the classroom.

Instructions: This questionnaire has 16 subsections. There is no time limit. Please, answer all the subsections in the order given. It is important to give sincere answers.

1. I like implementing ludic activities in the classroom, such as: hand-craft, theatre (role-play), miming, etc.

YES _____ NO _____

2. I assign tasks periodically that allow my students to think rationally. (E.g. puzzles, open questions)

YES _____ NO _____

3. I believe that the inclusion of music or songs in classroom activities promotes bad behavior.

YES _____ NO _____

4. Typically, the type of tasks that I assign involves reading and analyzing texts.

YES _____ NO _____

5. I usually recognize my students' attitude through their nonverbal language.

YES _____ NO _____

6. Most of the exercises I implement are characterized by relating, analyzing and generalizing.

YES _____ NO _____

7. In the classroom, the tasks are usually carried out in teams and involve the understanding of different points of view.

YES _____ NO _____

8. I like asking questions that allow my students to analyze their values, goals and emotions.

YES _____ NO _____

9. The activities that I proposed in my lesson plan encourage the memorization of textual content.

YES _____ NO _____

10. I prevent my students from working on tasks that include music, songs or dances in the classroom.

YES _____ NO _____

11. The activities I use to develop English skills used to be more or less embarrassing.

YES _____ NO _____

12. In the tests or examinations, grammar exercises predominate over speakers.

YES _____ NO _____

13. I encourage my students to use body language to communicate new words in English.

YES _____ NO _____

14. I carry out English lessons outside the classroom frequently.

YES _____ NO _____

15. I introduce vocabulary through the use of visual aids.

YES _____ NO _____

16. I like my students to create graphs, maps, charts and diagrams.

YES _____ NO _____

17. I often assign tasks that involved observation or drawing.

YES _____ NO _____

18. I organize Field trips that frequently relate theory to practice.

YES _____ NO _____

19. I meditate with my students on the importance of natural resource conservation.

YES _____ NO _____

20. I assign tasks that make my students take responsibility for plants or animals.

YES _____ NO _____

21. Sometimes, I ask my students questions to self-assess their academic performance.

YES _____ NO _____

22. The activities that involved planning short- and long-term objectives are part of my assessments.

YES _____ NO _____

23. I do relaxation exercises with my students when I feel it is necessary.

YES _____ NO _____



MULTIPLE INTELLIGENCES TEST

Grade: _____ Date: _____

Gender: _____ School: _____

Objective: To identify the most developed and least developed intelligences in 9th grade students at Escuela Politécnica de Comercio during the second academic semester in 2019.

INSTRUCTIONS: Read each of the statements. If they express strong characteristics in your person and if you think the statement is true, place a T (on the line next to the question number) and if it is not, place an F.

- 1.... I prefer to make a map to explain to someone how to get there.
- 2 If I am angry or happy, I usually know exactly why.
- 3 ... I can play (or before I knew how to play) a musical instrument.
- 4 I associate music with my moods.
- 5 I can add or multiply mentally very quickly
- 6 I can help a friend manage his feelings because I could do it before in relation to similar feelings.
- 7 ... I like to work with calculators and computers.
- 8 I learn fast to dance a new rhythm.
- 9 It is not difficult for me to say what I think in the course of a discussion or debate.
- 10 I enjoy a good talk, speech or sermon.

- 11 I always distinguish the north from the south, wherever I am.
- 12 I like to gather groups of people at a party or a special event.
- 13 ... Life seems empty to me without music.
- 14 I always understand the graphics that come in the instructions of equipment or instruments.
- 15 I like to make puzzles and entertain myself with electronic games
- 16 It was easy for me to learn to ride a bike. (or skates)
- 17 I get angry when I hear a discussion or a statement that seems illogical.
- 18 I am able to convince others to follow my plans.
- 19 I have a good sense of balance and coordination.
- 20 I often see configurations and relationships between numbers more quickly and easily than others.
- 21 I like to build models (or make sculptures)
- 22 I am keen to find the meaning of the words.
- 23 I can look at an object in a way and with the same ease see it.
- 24 I often make the connection between a piece of music and some event of my life.
- 25 I like working with numbers and figures
- 26 I like to sit quietly and reflect on my intimate feelings.
- 27 Just looking at the shape of constructions and structures I feel at ease.
- 28 I like to hum, whistle and sing in the shower or when I am alone.
- 29 I am good for athletics.
- 30 I like to write detailed letters to my friends.
- 31 I usually realize the expression on my face
- 32 I realize the expressions on other people's faces.
- 33 I keep "in touch" with my moods. I can identify them.
- 34 I realize the moods of others.

35 I realize quite well what others think of me.

36 I distinguish the climatic changes.

37 I like to play with animals.

38 I like to take care of the plants.

39 I do not like going to the forests or rivers.

40 I like to understand how things work.

NOW, CHECK THE FOLLOWING PROMPTS IN THE ORDER GIVEN.

IF YOU PLACED "TRUE", ADD ONE POINT TO EACH ONE AND SUM UP THE POINTS.

A) 9 -10-17-22-30 = Verbal intelligence.

B) 5-7-15-20-25 = Logical-mathematical Intelligence.

c) 1-11-14-23-27 = Visual space intelligence.

d) 8-16-19-21-29 Bodily-Kinesthetic intelligence.

E) 3-4-13-24-28 = Musical-rhythmic Intelligence.

F) 2-6-26-31-33 = Intrapersonal Intelligence.

G) 12-18-32-34-35 = Interpersonal intelligence.

H) 36-37-38-39-40= Naturalistic intelligence.

IF YOU HAVE 4, IT MEANS THAT YOU HAVE DEVELOPED THAT INTELLIGENCE. IF YOU HAVE 5 YOU ARE OUTSTANDING. AND, IF YOU HAVE LESS THAN 4, IT MEANS THAT YOU HAVE A LOW DEVELOPMENT OF THAT INTELLIGENCE.



Self-evaluation

School: _____ Date: _____ Grade: _____

Objective: To get information about how students felt with and what they learn from the multiple intelligences activities in order to support previous information.

The student answers the questions according to the five activities you did.

How do you think the activities were?

- a) Funny
- b) Boring
- c) Interesting

How did you feel with the activities?

- a) Relaxed
- b) Stressed
- c) Nervous

Did you like the activities?

- a) yes
- b) No
- c) Little

Which activity did you like the most?

- a) Analogy (reasoning exercises)
- b) Pictures match-up (pictures)
- c) Exploring outdoor (natural environment)
- d) Simon says (game)
- e) Gap fill-exercises (grammar exercises)

Why did you like this activity more?

Could you learn something with the activities?

- a) Yes
- b) No
- c) Little

What did you learn from the activities?

- a) _____
- b) _____
- c) _____

Can any of the activities help you better understand the subject taught by the teacher?

- a) Yes
- b) No
- c) Little

How did the activities help you?

- a) _____
- b) _____
- c) _____

What activity would you like to do again?

- a) Analogy (reasoning exercises)
- b) Picture match-up (pictures)
- c) Exploring outdoor (natural environment)
- d) Simon says (game)
- e) Gap fill-exercises (grammar exercises)

Why would you like to do this activity again?

Do you prefer another type of activity? Which one?

- | | | | |
|----|--------------------|----|----------------|
| a. | Oral Presentations | f. | Listen audios |
| b. | Songs | g. | Analyze videos |
| c. | Dialogues | h. | Essays |
| d. | Dramas | i. | Poems |
| e. | Reading | j. | Play sports |

Why do you prefer this activity?

Have your teachers ever applied any of these activities in the classroom? Which one?

- a) Gap fill-exercises (grammar exercises)
- b) Pictures match-up (pictures)
- c) Exploring outdoor (natural environment)
- d) Simon says (game)
- e) Analogy (reasoning exercises)

UNAN - MANAGUA



UNIVERSIDAD
NACIONAL
AUTÓNOMA DE
NICARAGUA,
MANAGUA
UNAN - MANAGUA

English Department

MONITORING OF ACTIVITIES CARRIED OUT

Objective: To get impacts results of strategies implemented to develop multiple intelligence during English teaching.

The researchers analyze the recorded videos of the five activities carried out in the classroom with the students.

Activity: _____

Students: _____

Time: _____

1. How do the students feel about the activities?

- enthusiastic
- interested
- nervous
- boring

2. Does the student have an active participation?

- Yes
- No

3. How much time does the student take to complete the activity?

4. Does the student need help for activity completion?

- Yes
- No

5. How many students participate in the activity?

6. How many times does the teacher repeats the orientations of the activities?

- Once
- Twice
- Thrice

7. How many students' answers are correct?

8. How does the student react according to the activity?

- Positively
- Negatively

9. How was the activity for students?

- Clear
- Confused

10. How many times does each student take to complete the activity?

Multiple Intelligence Activity

➤ LOGICAL-MATHEMATICAL INTELLIGENCE

Analogy

Grade: _____ Date: _____

The student encloses a, b, c, or d according to the relation of the words.

Circle a, b, c or d

1. Ruler : line ::

Compass: _____

- a. line
- b. circle
- c. triangle
- d. rombo

6. red: apple

_____ : spinach

- a. blue
- b. gren
- c. purple
- d. yellow

2. 4 : _____ ::

8 : 10

- a. 5
- b. 2
- c. 6
- d. 8

7. ying : yang::

black:_____

- a. twin
- b. black
- c. uniform
- d. white

3. chapter : novel::

sentence : _____

- a. adverb
- b. book
- c. history
- d. paragraph

8. aristoteles:philosophy

mendel : _____

- a. science
- b. phisics
- c. genetics
- d. syllabus

4. _____ :won::

see : sea

- a. One
- b. water
- c. win
- d. Fruit

9. Justin Bieber : _____::

Ruben Dario : azul

- a. diamond
- b. magic
- c. sonatina
- d. Baby

5. ____ : Tuesday ::
Thursday: Friday
- Wednesday
 - Sunday
 - Saturday
 - Monday

10. ____ : 2 ::
3 : 4
- 5
 - 6
 - 1
 - 2

Answers

- Ruler makes line, compass makes circle.
- Two for ten, two for six.
- Chapter is part of a novel, a sentence is part of a paragraph.
- One is the homophone of won; sea is homophone of see.
- Tuesday follows Monday, Friday follows Thursday
- The apple is red; the spinach is green.
- Ying is black, Yang is white.
- Aristoteles is the father of philosophy; Mendel is the father of genetics.
- Baby is Justin Bieber's song; Azul is a Ruben Dario's book.
- 2 follow 1, 4 follow 3.

➤ VISUAL-SPATIAL INTELLIGENCE

Picture Match-Up

Instructions: The student is going to match the words to the correct picture through reading the vocabulary and recognizing the fruits stuck by the teacher on the board.

FRUITS



**Tangerine /
mandarin orange**



Banana



Melon



Apple



Pineapple



Strawberry



Orange



Pear



Watermelon

➤ BODY-KINESTHETIC INTELLIGENCE

Simon says: Students stand up and form a circle. Teacher stands in the middle of the circle and students walk around. Students have to do what teacher says; for example, teacher says: “Simon says... make group of three...!”, and students make group of three. Teacher says: “Simon says... Rise your right hand...!”, and students rise their right hand. Teacher says again: “Simon says... sit down on the floor...! and students sit down on the floor...and so on.

➤ VERBAL-LINGUISTIC INTELLIGENCE

Gap-fill exercises: Simple Past Tense (Regular Verbs)

Grade: _____ Date: _____

1) Form the simple past of these verbs:

- | | |
|------------------|----------------|
| 1. Believe _____ | 4. Love _____ |
| 2. Want _____ | 5. Work _____ |
| 3. Study _____ | 6. Carry _____ |

2) Complete the sentences with the simple past of the verb in brackets.

1. The baby _____ (cry) all last night.
2. Maria _____ (close) the door.
3. I _____ (clean) my room yesterday.
4. They _____ (dance) at school.

➤ NATURALIST INTELLIGENCE

Exploring outdoors

Grade: _____ Date: _____

Environment

❖ Circle the word you can feel or see in the environment.

wind plant dust cloud
tree water bird sunlight
stone leaf sky sun

❖ Choose two plants from the environment and make:

| PLANT'S DRAWING | PLANT'S NAME | TIP'S CARING |
|-----------------|--------------|--------------|
| | | |
| | | |

➤ MUSICAL INTELLIGENCE

Missing words:

Grade: _____ Date: _____

Song: Apologize
One Republic

Expressions:

| | |
|--------------------------------------|-----------------------------|
| I'm hearing what you say | I loved you with a fire red |
| I just can't make a sound | But I'm afraid |
| I take another chance | it's too late to apologize |
| I need you like a heart needs a beat | |

Listen again to the first part of the song and fill in the blanks with the words in the box.

I'm holdin' on your rope
Got me ten feet off the ground
I'm hearing what you _____
But I just can't make a sound (Oh yea..)
They tell me that _____ mean it
Then you _____ and cut me down
But _____
You tell me that you're sorry
Didn't think I'd turn around
And say

| | |
|-----|-----------|
| Say | wait |
| You | late |
| Go | Apologize |

That it's too _____ to apologize
It's too late
Said it's too late to _____
It's too late

Listen to the second part of the song and fill in the blanks with the words in the box.

I take another chance, take a fall, _____ a shot for you
I need you _____ a heart needs a beat
It's not from you (Yeaaaa)
I _____ you with a fire red and I was turnin' blue
And to say
Sorry like the _____
Heaven let me think _____ you
But I'm afraid

| | |
|-------|-----------|
| Take | Apologize |
| Loved | Angel |
| Was | Like |

➤ INTERPERSONAL INTELLIGENCE

Role Play

Grade: _____ Date: _____

In pairs create a dialogue. You can complete the sentences by choosing the words from the box.

Example:

Teacher

At the bus station

A: Hello... How are you?

B: Fine, and you?

A: I am feel terrible. I have a headache.

B: Take a pill and rest all day.

A: OK... Look the bus! I have to go. See you...

B: See you.

| | | | |
|------------------|-------------|--------------------|------------------|
| feel terrible | am sick | pill | some of hot tea |
| do not feel well | Toothache | couple of aspirins | rest all day |
| am wrong | Headache | a shower | go to the doctor |
| feel bad | stomachache | a taxi | rest |

STUDENT A: Hello...How are you?

B: Fine, and you?

A: I _____. I have a _____.

B: Take _____ and _____.

A: Ok... Look the bus! I have to go. See you...

B: See you.

➤ INTRAPERSONAL INTELLIGENCE

Personal Experience

Grade: _____ Date: _____

Make a paragraph based on your personal experience in learning English. You can complete the sentences by choosing an option to organize your ideas.

Example

Teacher: Good morning, my name is _____ and I like English because I like English music. My personal experience learning this language has been difficult because I have some troubles communicating with other people but this experience has been wonderful too; I have learned a lot of things and now I can sing in English. Thank you!!

Student:

Good morning my name is _____.

1. I _____
 - like English.
 - Do not like English

2. Because _____
 - I like English music
 - I would like speaking in English
 - It is important
 - It is interesting
 - It is difficult
 - It is boring

3. My personal experience learning this language has been _____
 - Difficult
 - Wonderful
 - Easy
 - Funny
 - Terrible

4. Because _____

- Its grammar is complicated
- Memorization of a lot vocabulary
- I can communicate in English with other people
- I have learned a lot of things
- I am shy
- I do not understand nothing

5. Now I can _____

- Sing in English
- Give the correct pronunciation of some words
- Understand to my teacher
- Communicate with my classmates.

Thank you!!

Observation day



Activities carried out.



Logical-mathematical intelligence
Analogies



Spatial intelligence.
Picture Match-Up



Linguistic intelligence.

Gap-fill exercises



Bodily-kinesthetic intelligence strategies.

Simon says



Naturalist intelligence strategies.
Exploring outdoors



