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RESEARCH ARTICLE

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# GAMIFICATION FOR UNDERSTANDING ENGLISH TEXTS FOR STUDENTS IN A PUBLIC SCHOOL IN PERU

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## **ABSTRACT**

The present article is referred to determine the results of the JClic Software application as a tool of gamification in comprehension of texts in English, in the students of the secondary level of a school in Peru, in this case at a public school, in 2019. It was developed by a pre-experimental design pretest and posttest with only one group after the pretest, JClic software was used through computers in laboratories, until taking the exit test at the end of the semester of studies. Of a total of 16 students after JCLIC software application, 87.50% of the students have reached an outstanding achievement level, 12.50% of the students are at the expected achievement level, 0% of the students are at process level, and 0% of them at the beginning level. From the results obtained it can be affirmed: with the JClic software application as a tool of gamification, the third-year students of a public school, in 2019; have managed to improve their level in the comprehension of texts in simple past in English.

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# **INTRODUCTION**

One of the challenges of education in Peru is to achieve that students reach good levels of learning and this will only be achieved with the teacher's help who is in charge of providing good teaching and guidance to students in a different way and innovative in this case with the help of educational software: JClic. Learning is a process by which a person will acquire various skills, knowledge and behaviors, all of this forms part of our daily life and every day we learn various things, for example: new learning strategies. In schools, learning can be evidenced through different subjects, in which every student has to develop. In educational institutions, learning can be evidenced through the different subjects, in which every student has to develop skills and this proposal is enhanced in the use of gamification, in this time of non-contact classes. Gamification refers to the use of game design elements and principles to be used in non-gaming contexts. That is, game theory and mechanics are used to involve, motivate and engage people, with this, it seeks to transform a routine and

unattractive activity into a dynamic and motivating activity (Zepeda-Hernández & Abascal-Mena, 2016, p.317). Above all the learning English Language has become an indispensable resource for every student or professional who aspires to greater personal development. In this case the learning of verbs in the past simple, since it is the fundamental basis of it, through irregular and regular verbs, and it is a process in which the student has to memorize and learn certain rules, through the JClic software is given in a dynamic and interactive way, so that the student is interested in it, and it takes the learning in a fun and practical way. JClic software. It's free software that allows students to create activities according to the programming, in this case linked to learning the English language, in the grammatical structure of the simple past in the affirmative form.

**Research on teachers'work:** Gamification may be defined as the application of digital game elements in non-gaming contexts to motivate user behavior (Educause, 2011). Although

game elements are the basic building components of gamification (Deterding et al., 2011; Sailer, Hense, Mayr, & Mandl, 2017; Werbach, 2012), there is no commonly agreed on classification of game elements. In this context, it is really necessary to reinforce skills in English as a second language to engage students, and find it interesting. Some of the common game elements are badges, challenges, leaderboard/rank, levels/unlock, storyline, points, progress bar, and teams (Giannetto, Chao, & Fontana, 2013; Huang & Hew, 2018; Richter, Raban, & Rafaeli, 2015; Sailer et al., 2017). Software JClic complies with all requirements mentioned before, and helps to make easier to understand words, and can understand texts. Educational gamification proposes the use of game-like rule systems, player experiences and cultural roles to shape behavior. To understand the potential of learners' gamification, however, it should be considered how these techniques can best be deployed in practice. In this section, it is showed three major areas in which gamification can serve as an intervention.

Cognitive: Games provide complex systems of rules for players to explore through active experimentation and discovery. For example, Software JClic asks players to develop activities in a challenging way to get points. Players must experiment with the game to figure out what the correct answer is, the student identifies the right answer and can understand the exercise without explaining. This, too, supports motivation and engagement (Locke & Latham, 1990). These techniques, applied to schools, can transform student perspectives on learning. Students in schools are often told what to do without understanding the larger benefits of the work. It gives students clear, actionable tasks and promises them immediate rewards instead of vague long-term benefits. In the best-designed games, the reward for solving a problem is a harder problem (Gee, 2008). Gamification hopes to make the same true for schools, in this a new way of teaching in public schools in this country, and others in South America.

Emotional: Games invoke a range of powerful emotions, from curiosity to frustration to joy (Lazarro, 2004). They provide many positive emotional experiences, such as optimism and pride (McGonigal, 2011). Crucially, they also help players persist through negative emotional experiences and even transform them into positive ones because games involve repeated experimentation, they also involve repeated failure. In fact, for many games, the only way to learn how to play the game is to fail at it repeatedly, learning something each time (Gee, 2008). Games maintain this positive relationship with failure by making feedback cycles rapid and keeping the stakes low. The former means players can keep trying until they succeed; the latter means they risk very little by doing so. In schools, students realize of making mistakes is a chance of learning, and improve and practice the language in many different contexts; by generating content using game-based learning on its learning.

Social: Games allow players to try on new identities and roles, asking them to make in-game decisions from their new vantage points (Squire, 2006; Gee, 2008). With the present research, it was observed students expressed positive feelings on facing the exercises, and communicate about their performance and reinforce their formative assessment. JClic, given the simplicity of its management and practice of its use for teachers at all educational levels, apart from generating support, also strengthens your class in an active, participatory

and funny way, getting motivation and curiosity from the learner. This facilitates the Teaching and Learning process (Serrano García, 2015). It supports the research on finding a new way to teach grammar and vocabulary in English as a second language. Laura De La Cruz (2019) recommended to add the JClic software to their teaching methods while continuing to use the other strategies, JClic gave successful results to the improvement of understanding texts in English as a second language facing regular and irregular verbs in simple past in a private school in Peru. This study focused on a public school, and could identify the difference in the present research.

## **METHODOLOGY AND METHODS**

The type of research was "applied" because it was trying to change facts that occur actually, also served to identify problems on which to intervene as to define the solution strategies. The research was a pre-experimental design and pretest and posttest with only one group because there was just one classroom in that year of studies. The study unit was constituted by the students enrolled in the thirdyear of the secondary level at a public school in Peru, 2019.

## **Technique**

It worked with the technique of "a test" to measure the level of comprehension of text in the affirmative form of simple past in English.

*Instruments:* The instrument was worked on written test, through a test of input and output.

## Software JClic

## **Measurements Indicators**

- Relevance: Difficulty according to the grade (or age). In this case it was worked with third year of the secondary level at a public school.
- Flexibility: That allows facing with circumstantial situations.
- Adaptation: That isaccepted and recommended by participants.

# Measurement scales

It is not considered because the result of the investigation establishes if improve the level of comprehension of texts or not, but it was developed a module with all activities with JClic software and exercise to reinforce the research.

## Understanding texts in affirmative form of simple past

#### **Measurements Indicators**

It was considered to work with dimensions and indicators in the present research:

# Dimension 1: Get information of written text

Identify regular and irregular verbs in simple past. Reconstructthetextsequence.

## Dimension 2: Infer information of writing text

Deduce the meaning of words and phrases.

Deduce the functions of characters, objects and places.

Deduce the topic.

Deduce the purpose of text.

#### Measurement scale

Through of a writing prove consideringBaremos scale:

0-5: Beginning level 6-10: In process

11-15: Expected achievement 16-20: Outstanding achievement

## RESULTS

Difference between "Comprehension of texts in English" before and after the JClic Software application "in 2019. Of the 16 students evaluated in the present study obtained in table No. 01, we have to: Before applying the use of the JClic software, less than half of the students were at a understanding texts level of "Beginning", that is, 31.25% of the students had difficulties in understanding texts in simple past, then more than half are at a "Process" level, that is, 62.50% of the students are on the way to reinforce their skills in understanding texts in English.

And a little of the students are located at an "Expected Achievement" level, that is, 6.25% of the students achieved a good level of understanding texts in English at a scheduled time, and finally, there is no student was at an outstanding achievement level. Meanwhile, after JClic software was applied as a tool of gamification, almost all of the students were at level of "Outstanding Achievement", meaning 87.50% of the students achieved a great level in understanding texts in English about simple past structure, then a little more at an "expected achievement" level, that is, 12.50% of the students have achieved a good level in understanding texts. Finally, there is no student was at a process level, even less at a beginning level.

## DISCUSSION

Studies between understanding texts in English and JClic software have not been developed even with a sufficient level of depth, so in this article it is important to highlight the use of technological trends in Peruvian Education.

But in order to have a better approach, the terms associated with understanding texts in English and JClic Software are conceptualized. According to the authors Farroñay, M. (2011) about comprehension of texts in English mentions that is: "This approach includes some important features in instructional students reading in a foreign language:

Table 1. Public school, secondary level students, according to "Level of understanding texts in English" before and after the JClic software application in the academic year 2019

LEVEL OF UNDERSTANDING TEXTS IN ENGLISH	EXPERIMENTAL GROUP				TOTAL	
	PRE TEST		POST TEST			
	n	%	n	%	n	%
BEGINNING LEVEL	5	31.25	0	0.00	5	15.63
IN PROCESS	10	62.50	0	0.00	10	31.25
EXPECTED ACHIEVEMENT	1	6.25	2	12.50	3	9.38
OUTSTANDING ACHIEVEMENT	0	0.00	14	87.50	14	43.75
TOTAL	16	100.00	16	100.00	32	100.00

Source: Own elaboration, based on a written test addressed to the students.

Table 2. Own Resources

Author	Theory	ComparativeAnalysis
Busquets (1995) Creatorof JClic	Software Jclic	The proposed activities help develop English language skills. Using JClic software, students interact with the computer making it a fun and innovative learning way.
(Cebrián, Sánchez, Ruiz, & Palomino, 2009)	JClic reports	The teacher shows, proposes, challenges, and guides the students in the adventure of learning autonomously through the computer. Through JClic Reports students can verify their progress with statistical data for each activity they have done. The effect of this software provides guidelines in the development of skills in some specific curricular areas. Likewise, the finished work serves as an antecedent for grade school teachers, who can then incorporate JClic educational programs in their pedagogical work as an alternative to reach the best learning results.

Table 3: OwnResources

Author	Theory	ComparativeAnalysis
MINEDU (2016)	Organization of Regular Basic Education	The directed learning is contain learning objectives added in little steps, of active answer, immediate check, free progress and evaluation with students,
According Louise, Kanashiro& Young (2011)	DirectedLearningby Skinner	and this evaluation and supervision of learnings is permanent and autonomous for part of student It is that Education in Peru wants to get nowadays in the autonomy of students in his teaching -learning process respecting the organization of this, and Curriculum, this is a new proposal to integrate areas and strengthen and autonomous self-evaluation of student that evidences his progress consistently and recognize his strength and weaknesses.



Figure 1. Public school, secondary level students, according to "Level of understanding texts in English" before and after the JClic software application in the academic year 2019

That the cultural background of students plays an important role in reading comprehension; The L2 (second language) readers must use the same kinds of skills as effective L1 (first language) readers do. Reading must be integrated into writing. That students must commit themselves in cooperative contexts".

While that Campos (2014), adding an aspect to consider about understanding texts in English "It is the process of creatively elaborate a meaning appealing to the relevant information or ideas in the text, relating with the ideas and information that the student or reader have stored in his mind (that is, with previous knowledge or knowledge scheme)"(p. 77). In this meaning Rodríguez (2012) contributes three stages in reading comprehension "Reading comprehension in three stages starting with the activities prior to reading in which the content, grammatical structures and vocabulary are found, activities during reading that it includes identifying the main idea, finding details, inferring the context, recognizing the writer's purpose and the teacher's role, and post-reading activities that can be working with unusual words and writing exercises based on the topic of the text, but in different situations (p. 24). On the other hand, Carhuas (2017) supports the following Paradigm:

"The theoretical principles that guide the understanding of texts in English are based on the Socio-Cognitive-Humanist Paradigm, which sought to answer the questions about the needs of the students and today's society. Therefore, he has proposed an education that considers the following aspects: (a) Strengthen and develop the skills and abilities of the content; and (b) Enhance and develop the axiological dimension (values and attitudes)" (p. 36). According to Espinola (2018), he adds a different aspect to the aforementioned "Reading must develop the understanding process and interpreting each word. This process helps them to constantly expand their vocabulary, achieve greater fluency in words, and a safer and more precise conversation" (p.36). While the software JClic has a technological tendency that is oriented to improve the comprehension skills of texts in English; Serna (2011) "JClic software is robust because it allows the ability to obtain reports from every student. Therefore, it allows teachers to obtain evaluation results from each student." Urgilés (2015). "The application of JClic tools made students increase their knowledge, and as a result the grades of the students went up reaching 75.6% of correct answers, confirming the alternative

hypothesis proposed in the project". On the other hand, Huerta (2016) "JClic software is a very useful and educational tool that allows the user to carry out multiple activities such as puzzles, associations, word searches, crosswords, activities and identification of exploration, written responses, text activities, etc. It is aimed at all educational levels". At this point Pérez (2014) strengthens the aforementioned by saying that JClic "is an interactive computer program, where the students can carry out a large number of educational activities in a playful way. This program is sequenced into several parts, each of which has a specific learning purpose. The JClic program also has the characteristic of being self-correcting". According to La Cruz (2014) "JClic Author lets teachers create and organize project libraries selecting between various graphic environments and function operations, on the other hand it allows the execution of activities from storage units or from the network without having to be connected to the Internet".

#### Conclusion

With the data shown in the present article we can emit fair conclusions about functionality and impact of the application of a software in understanding and improvement texts in English in Peru's students. Then, the results are highlighted below. Understanding texts in simple past affirmative form in English area, before the application of JClic software in the third secondary level students of a public school in 2019, the most of the students were in process which they represent the 62.50% from the students who gave the pretest. Understanding texts in simple past affirmative form in English area, after the application of JClic software in the thirdlevel students of a public school in 2019, the most of the students were in outstanding achievementwhich they represent the 87.50% from the students who gave the posttest. This study also has several significant pedagogical implications. First, with the results it was obtained; JClic generates innovative changes in the teaching - learning process, that's why the teacher could use the software optimally; incorporating and storing material which he considers necessary for the students; it depends of the work context. It's recommended to teachers from different areas to use different techniques to let students to have the best results in their subjects that correspond to them. Because it contains gamification components, new ones which have better access and acceptance by the students. It should be noted that part of developing of a student's autonomy and constant selfevaluation; besides understanding the learning process it is involved them.

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