

# Digital Storytelling Strategy for Teaching Arabic Language: The Success Formula of Developing Active Listening and Creative Thinking Skill

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**Abstract**--This study aims at investigating the effect of teaching the Arabic language by using digital storytelling for basic third-grade pupils in developing active listening skills and creative thinking. A purposive sample that consisted of (36) male and female pupils from the basic third grade were selected. They were divided into two groups which were the experimental and control. Two tests were used: post active listening and creative thinking tests. The validity and reliability of the tests were assured. The findings showed that there were no significant differences in ( $\alpha \leq 0.05$ ) between the means of the post active listening test in Arabic, in favor of the experimental group, but there were no significant differences in ( $\alpha \leq 0.05$ ) between the means of the post creative thinking test in Arabic attributed to any of the two groups.

**Keywords**-- Digital storytelling, active listening skills, creative thinking skills.

## 1 Introduction

Language is considered as a means of expression and communication among individuals and societies. It has a great importance in empowering the child to form his own world with all its dimensions. Language is a means for developing the child's sensory perceptions, mental abilities and social skills. Through these skills and abilities, the pupil can communicate within the school and outside world. Any language consists of four skills and these are; listening, talking, reading and writing. Listening is considered as an important skill in the Arabic language. It is a means of oral communication among individuals by using different ways. Listening is the first condition for developing the language of the child (Al-Nakah & Hafiz, 2002; Al-Mabar, 2005).

Digital storytelling has emerged over the past years, as an effective style of instruction and teaching. It is an effective means to motivate the learner to participate in the teaching – learning process seriously, which leads to in-depth content, modernity in the style of presentation, gives the opportunity to the learners to express the knowledge they knew already, and integrate it into the content, in more serious and committed ways (Randolph, 2007).

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Digital storytelling is defined as a collection of author stories that work with an electronic mediator (CD), by adding some techniques related to sound, image, and color, 1 animation cartoons and musical effects. These tales depend upon events, storytelling, characters and drama line and node, as well as have time and place that aim at teaching, education, enjoyment and entertainment (Mousa & Salamah, 2004).

The story in general, and digital storytelling in particular can achieve many educational benefits and features. Among the educational benefits in the educational sector reported by Shemi (2009) are: they are considered as a model to activate technology in the teaching-learning process, develop the skills of creative thinking, especially, fluency and flexibility, and develop the skills of critical thinking and constructive criticism. They help children to get rid of introversion and shyness. They also improve and develop communication, whether it is audio, visual or written. They work to raise the level of electronic, talking, expression and listening competencies, as well as, supporting self-representation through participation and expressing an opinion.

Ahmed (2005) classified digital storytelling into ethics and ideals, social, historical, adventures, comics and avatar stories. Among the previous studies related to digital storytelling, the study conducted by Wu & Yang (2008) which aimed at finding out the effect of using digital storytelling in the development of creative thinking, stir up the motivation to learn and develop the academic achievement of elementary school pupils. The sample consisted of (105) pupils, divided into three experimental groups. The findings indicated that using digital storytelling is effective in developing creative thinking, stirring up the motivation to learn, and developing academic achievement for each group separately.

Dogan & Robin (2008) conducted a study aimed at investigating teachers' usage of digital storytelling in classrooms, and to find out the effect of this usage on students. The findings indicated that (77.4%) of teachers had no idea about using digital storytelling in classrooms. While (80.4%) of teachers use digital storytelling prepared by others. There were a few other teachers who use digital stories they made. Few teachers depend on students who prepare these stories. The study found that using digital storytelling raised the level of technological skills, presentation skills and the level of motivation of student's learning.

Shemi (2009) conducted a study aimed at investigating the effect of style change of the digital story on the web, achievement, and developing some critical thinking skills, and the attitude towards it. The sample consisted of the first- and second-year students in the department of instructional technology in the college of education, Al-Fayoom University. They were divided into groups. The findings showed that there were significant differences in critical thinking skills, in favor of the experimental groups.

In another study carried out by Abdul Basit (2010), aimed at finding out the effectiveness of a proposed program on using photo story (3) software for the development of concepts and design skills to develop digital story required for geography teachers before service. A sample consisted of (20) geography teachers before service was selected from the population. Through the experiment (18) digital stories were designed and developed about the geographic phenomena surrounding the subject's sample. The findings showed the effectiveness of the proposed program.

From Robin's (2006) definition of listening skills as an active, constructive process that includes activating the listener to his previous knowledge that aims at helping him to understand the listened text. There were some distinct characteristics of listening skills, summarized by Abdul Bari (2011), that listening is one of the language phonoreception skills, through which voices and language symbols are transferred through the auditory nerve to the hearing center in the brain. So a new process, based on analyzing and explaining the message will start. It is a

positive active reception process, in which a set of higher thinking skills is employed, such as understanding, analyzing, synthesis, interpretation, judgments and criticizing them by using the constructive criticism.

It can be said that active listening is important in the communication process. It plays an important role in the teaching learning process. The more the listener is characterized by active listening, the more he will be a positive listener that can communicate with the audio material, understands what he listens to, and concentrates on it.

The importance of active listening emerges in the teaching learning process. It forms a vital part of the student program. It is a basic and necessary condition to learn the arts of languages. The listening skill is not restricted to receiving sound, and perceiving meanings only, but it is a mental effort that infers, disproves, analyzes and interprets information. Listening is an integrated performance and requires the listener to employ his sight and listening senses, as well as the mind in following up the speaker's talk, understands the meaning and determines ideas.

One of the previous studies related to active listening was conducted by Doveston (2007), that aimed at developing active listening skills of students in the classroom. Teachers, consultants, and local social researchers participated in the study. Topics related to social relations were selected. The findings showed a significant relationship between social topics and active listening, concern and cooperation. The findings showed also the importance of recreation, and an observed improvement regarding listening and social skills.

Al-Ramadan (2008) conducted a study aimed at constructing an educational program to develop listening skills of fifth-grade pupils. The tools of the study were preparing a list of listening skills, preparing a proposed program to develop listening skills, pupil's text, teacher's guide, and preparing a test for listening skills. Among the findings of the study were the following, there were significant differences in favor of the experimental group, and the proposed program was adequate in developing listening skills of the experimental group.

Mizyad (2012) conducted a study to find out the effect of an educational program in the development of active listening skills of kindergarten children in general, and according to a sex variable in particular. The sample consisted of (60) male and female children, whom their ages ranged from 5-6 years. They were distributed in two groups, the experimental and control groups equally. An educational program was constructed in developing active listening skills. The findings indicated that there were significant differences in the means of the active listening skills test, between the children in the experimental group according to sex variable.

Since the creative thinking is a complex ability, it means that it contains many sub-abilities, mentioned in educational literature as the following: (a) fluency, (b) flexibility, (c) originality, (d) sensitivity to problems, (e) inclusion or complete details.

Among the previous studies related to creative thinking, the study conducted by Al-Shami (2000) which aimed at investigating the availability degree of creative thinking abilities, as it appears through the oral expression of preparatory stage students in Demiat Governorate. Two tools were used to collect data. The findings showed that there were significant differences, in favor of the experimental group in creative thinking abilities related to oral expression in fluency and flexibility domains and the total score of the scale used in the study.

Farmawi (2001) conducted a study aimed at finding out the effect of using a teaching unit based on two strategies; story and role-playing in the development of creative thinking of kindergarten children. The sample consisted of (60) children. Two tools were used to collect data: (a) Innovative thinking test, (b) Religious, linguistic, scientific and mathematical concepts test that is suitable for kindergarten children. The findings indicated that there were significant differences, in favor of the experimental group attributed to story and role-playing strategies in

developing creative thinking, but there were no significant differences regarding the effect of the developed unit on creative thinking for both sexes.

Also, in another study conducted by Fahmi (2002) aimed at developing some written expression skills of secondary third-grade students. The sample consisted of secondary female students. Two tests were used to collect data. Validity and reliability of the tests were assured. The findings indicated that there were significant differences in ( $\alpha \leq 0.05$ ), between the means of experimental group students in pre and post application of creative thinking test and its abilities, in favor of the post application.

Mousa and Salama (2004) conducted a study to investigate the effectiveness of linguistic games on the development of creative thinking skills of pre-school children in UAE. The sample consisted of (40) male and female children. They were divided randomly into two experimental groups and two control groups. Three tools were used to collect data. The findings showed that there were significant differences in the observation card in creative thinking skills, in favor of the experimental groups.

Al-Sameeri (2006) carried out a study to investigate the effect of using the brainstorming method in teaching creative expression on the development of creative thinking for eight-grade female students in Gaza, compared with the traditional method. The sample consisted of two groups: experimental and control groups. The experimental group was taught by brainstorming method, while the control was taught by the traditional method. Two tools were used to collect data. The findings indicated that there were significant differences in ( $\alpha \leq 0.05$ ) between the means of the two groups in the total score of the creative thinking test, in favor of the experimental group.

Abu Al-Shamaat (2007) conducted a study aimed at finding out the effectiveness of using stories as a source for artistic expression in developing creative thinking skills of the preschool child. A scale was prepared to evaluate creative thinking skills in the artistic expression domain. A quasi-experimental design was applied to a sample of preschool children in Makka city. Their number was (32), comprising of male and female children. The findings indicated that there were significant differences, in favor of the experimental group in fluency, flexibility and originality.

Digital storytelling is effective in bringing children's attention in listening to topics and increases their concentration in events, as well as making them feel comfortable and have fun, through listening and watching and help them in the imagination of similar characters in reality to the characters of the story. Digital storytelling forms the ability to analyze and criticizing better than hearing the story in a traditional style, as well as, children learn through digital storytelling how they arrange thoughts serially, form meaningful sentences, and telling stories after watching and hearing the story (Salih, 2000).

Since there was no Arabic or foreign study investigated, the digital storytelling variable, active listening skills and creative thinking skills together, within the limits of the researchers' knowledge, the present study could be considered as the first study in Jordan. It came as a response to investigating the effectiveness of digital storytelling in the development of active listening and creative thinking skills of the pupils.

### *Statement of the problem*

Based on the findings of the studies about the roles of the modern technology in teaching and learning process, and employing them in an integrated method with the curriculum, and according to the different results regarding the effects of using technology and employing them by students and teachers, on the learning process outputs in general, and due to the importance

of improving the level of mastering Arabic language skills, which is considered as a key for other sciences from one aspect, and employing modern technology in education from other aspect, this encouraged the researchers to study the role of the educational digital storytelling and examine its effect, on the development of active listening and creative thinking skills for basic third-grade pupils. Mastering listening skills in the early educational stages represents a problem with many dimensions that will encounter students in higher educational stages, such as: following up lectures and writing the most important information.

#### *Importance of the study*

The importance of the present study stems from the concern of the educational institutions with employing the technological developments in teaching-learning situations, and link their employment with pupils' needs, to improve the educational productivity and learning outcomes.

#### *Definition of terms*

The following terms were defined conceptually and operationally:

##### *Digital storytelling*

The art of storytelling, integrated with multimedia of voice, image, video and technical software, with the aim of telling anecdotes or narrating events or inform the learners about a subject (Robin, 2006).

The operational definition of the digital storytelling is a collection of purposeful stories, with story elements of events, characters, time and place presented by the computer through laser discs, or CD – ROMs, or through the internet. Three stories were presented in this study.

##### *Active listening skills*

An active constructive process that includes activating the listener for his previous knowledge and aims to help the listener understand the audible test (Robin, 2006).

The operational definition is an active behavior that requires from basic third-grade pupils, to have some skills such as the interaction with the audio material, communication, assuming responsibility, attention to the message and understanding it, the formation of meaning and the translation of the audio text into words.

##### *Creative thinking*

A new production, purposeful and goal oriented. It is the ability of the mind to form new relationships that make a change in students' reality, when the student exceeds the conservation and memorization to thinking, studying, analyzing and concluding, then reaching innovation and creativity (Al – Bangaly, 2003).

The operational definition of creative thinking is the total score obtained by basic third-grade pupils, from the sample of the study, in the skills of the creative thinking (fluency, flexibility and originality) on the creative thinking test, that was prepared for this study.

## 2 Method

### *Research Goal*

This study came to investigate the effect of digital storytelling on the development of active listening and creative thinking skills for basic third-grade pupils, as well as, there was a sense of inadequacy in reality of education, which is based primarily on memorizing and doesn't develop creativity and innovation among pupils, the present study seeks to answer the main following question:

*What is the effect of teaching the Arabic language by using digital storytelling for basic third pupils on the development of active listening and creative thinking skills?*

From this question, the following two null hypotheses emerged:

- The first null hypothesis states that: There were no significant differences in ( $\alpha \leq 0.05$ ) between the means of basic third-grade pupils in the post active listening skills test in the Arabic language attributed to the employment of teaching strategy by digital storytelling and traditional method.
- The second null hypothesis states that: There were no significant differences in ( $\alpha \leq 0.05$ ) between the means of basic third-grade pupils in the post creative thinking skills test in the Arabic language attributed to the digital storytelling strategy and ordinary method.

### *Sample and Data Collection*

Pupils from two divisions of basic third grade were chosen purposively. One of the two divisions was selected randomly, to be the experimental group. The number of the pupils in this group was (19) male and female pupils, while the second division was the control group. Its pupils were (17) male and female pupils.

A pilot sample that consisted of (10) pupils, from both sexes, was drawn from the population, to apply the tests on its individuals, in order to find out the reliability of the tools.

### *Study Design*

The quasi-experimental design was applied to investigate the effect of teaching Arabic language, by using digital storytelling for basic third grade pupils, in the development of active listening and creative thinking skills in Jordan.

### *The tools of the study*

Three tools were applied in the present study. They are (a) the post active listening skills test, (b) the post creative learning test, and (c) teaching plans. Validity and reliability of the two tests were assured. Content validity of the teaching plans was assured too.

### *Procedures of the study*

After determining the population of the study and its sample, the researchers conducted the following:

- Selecting the suitable digital storytelling.
- Preparing teaching plans.
- Preparing the post creative thinking skills test in the Arabic language.
- Preparing the post active listening skills test.

- Finding out the validity and reliability of the tools.
- Obtaining the formal approvals for applying the study.

### 3 Discussion

1. The findings related to the first null hypothesis states “There were no significant differences in ( $\alpha \leq 0.05$ ) between the means of basic third-grade pupils in the post active listening skills test in the Arabic language attributed to the employment of teaching strategy by digital storytelling and traditional method.

To test this hypothesis, and to find out whether the differences between the means are significant in ( $\alpha \leq 0.05$ ), ANCOVA was used. Table (1) shows the findings:

Table 1

ANCOVA for basic third-grade pupils on the post active listening skills test, between the experimental and control groups, according to the teaching method used in instruction

Source of Variation	Sum of Squares	Degrees of Freedom	Mean Squares	F-Value	Level of Sig.
Post achievement	483.225	1	483.225	19.65	0.000
Method used	376.453	1	376.453	15.308	0.000
Error	811.537	33			
The adjusted total	1696	35			

Table (1) shows that the “F” value of the post active listening skills test, according to the teaching method used in the instruction was (15.308) at (0.000) level of significance. This value means that there were significant differences between the means of basic third grade third-grade pupils on post active listening skills test in Arabic language, according to the method used. This result means that the null hypothesis is rejected.

To find out the return of differences, the adjusted means of the two group’s performance on the post active listening skills test was extracted. Table (2) shows the findings.

Table 2

Adjusted means, standard errors of the performance of the study subjects on the post active listening skills test according to the method used in instruction

Method used in instruction	No. of pupils	Adjusted Mean	Standard Error
Ordinary Method	17	80.58	1.20
Digital Storytelling	19	87.06	1.14

Table (2) shows that the adjusted mean of the post active listening skills test for the experimental group individuals who studied by using digital storytelling was higher than the adjusted mean for the control group individuals who studied by using the ordinary method. The adjusted mean of the experimental group was (87.06), while the mean for the control group was (80.58). This means that using digital storytelling has an effect on active listening skills development, for basic third-grade pupils in Arabic language compared with the ordinary method.

This result may be attributed to the effectiveness of instruction by using digital storytelling strategy, which helped in simplifying teaching, continuity of pupils' enthusiasm to learn, concentrating their attention and increasing motivation for listening. Integrating information technology in the educational process, helps in attracting pupil's attention and stimulates his/her motivation to learn, as well as increases his interaction with his/her peers. Digital storytelling is considered as a typical tool for that. It declaims the multiple intelligences of leaders. It is considered as an incubator of diversity in learning styles.

This result may be attributed to the positive participation of the pupil in the events of the story. He/she listens to the soundtrack, views images, and movements, to become more motivated to listen. This may appear in the achievement of adequate teaching-learning outcomes. This result agreed with the result of Mazyad (2012) and Al-Basheer *et al.* (2013).

2. The findings related to the second null hypothesis that states "There were no significant differences in ( $\alpha \leq 0.05$ ) between the means of basic third-grade pupils in the post creative thinking skills test in the Arabic language, attributed to the digital storytelling strategy and ordinary method.

To test this hypothesis, and to find out whether the differences between the means are significant in ( $\alpha \leq 0.05$ ) MANOVA was used. Table (3) shows the findings.

Table 3  
Multivariate analysis of variance (MANOVA) for the study subject's performance on the post creative thinking skills test according to the method used in instruction

Source of Variation	Creative thinking skills	Sum of Squares	Degrees of freedom	Mean of squares	F-value	Level of significance
Method used in instruction	Fluency	2.008	1	2.008	0.044	0.835
	Flexibility	4.022	1	4.022	0.112	0.740
	Originality	194.348	1	194.348	3.821	0.059
	Total score	301.487	1	301.487	0.887	0.353
Error	Fluency	1499.928	33	45.452		
	Originality	1180.802	33	35.782		
	Originality	1678.648	33	50.868		
	Total score	11218.5	33	339.955		
Adjusted total score	Fluency	1584.972	35			
	Flexibility	1184.972	35			
	Originality	1922	35			
	Total score	11526.22	35			

Table (3) shows that the "F" value for fluency dimension, according to the method used was (0.044) in ( $\alpha \leq 0.05$ ) which means that there were no significant differences in ( $\alpha \leq 0.05$ ) between the means of the two group's performance, on fluency dimension attributed to the method used in teaching Arabic language to basic third-grade pupils.

With regard to flexibility dimension, the "F" value was (0.112) in ( $\alpha \leq 0.740$ ), according to the method used in teaching, which means that there were no significant differences in ( $\alpha \leq 0.05$ ) between the means of the two group's performance on flexibility dimension attributed to the method used in teaching Arabic language to basic third-grade pupils.



The “F” value of originality dimension, according to the method used in teaching was (3.821) in ( $\alpha \leq 0.059$ ), which means that there were no significant differences in ( $\alpha \leq 0.05$ ) attributed to the method used in teaching Arabic language to basic third grade pupils.

Table (3) shows also that the “F” value of the total score of the creative thinking test according to the method used in teaching was (0.887), which means that there were no significant differences in ( $\alpha \leq 0.05$ ) between the means of the two group’s performance attributed to the method used in teaching.

According to these findings, the second null hypothesis was accepted, with regard to the three skills (fluency, flexibility and originality) and the total score. The findings indicated that there were no significant differences between the experimental and control groups.

The findings may be attributed to the equivalence between the experimental group, which studied the Arabic language by using digital storytelling, and the control group that studied the same subject matter by using the ordinary method; or the procedures used by the teacher who used the digital storytelling strategy are closer to the procedures that were used by the teacher who used the ordinary method.

The findings may be attributed to the probability that the teacher who taught the experimental group pupils did not cover the subject matter, by using digital storytelling, and lack of commitment to teaching plans. These findings agree with the findings of the studies conducted by Farmawi (2001) and Abo Al-Shamaat (2007).

### *Suggestions*

In light of these findings, the following recommendations were presented:

- Investigating the effectiveness of using digital storytelling in the development of linguistic skills for basic stage pupils and kindergarten children.
- Finding out the effect of using digital storytelling in developing social skills and ethical values of children

### *Limitations*

This study was restricted to basic third-grade pupils in private schools in Amman Governorate in Jordan, for the academic year 2015/2016.

The delimitations are represented by the following:

- The study is restricted to a group of digital storytelling, which was selected to suit active listening and creative thinking skills.
- Validity and reliability of the two tools.

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