



The Impact of Flipped Learning Strategy on the Achievement of Tenth-Grade Students in Arabic Language Subject in Jordan

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Abstract: *The study aimed to find out the impact of the Flipped education strategy on the achievement of tenth-grade students in the basic Arabic language subject in Jordan. The study sample consisted of (69) basic tenth-grade students distributed among two divisions randomly, one division was randomly selected to represent the experimental group, consisting of (33) students studied using the Flipped learning strategy, and the other division represented the control group, consisting of (36) students studied in the usual way. The study results showed that there are significant differences between the average performance of students in the experimental and control groups on the dimensional Achievement Test in favor of the experimental group, and the study recommended that teachers of the Arabic language should adopt the Flipped learning strategy as a teaching method because of its impact on achievement.*

Keywords: *flipped learning; achievement; arabic language; tenth grade.*

I. Introduction

The wide progress in the field of information and communication technology is one of the most prominent features of the current century, especially in the use of the Arabic language and computerized educational programs, as it has become one of the most important educational means used to provide a rich educational environment that serves students in this digital age. It is necessary to use various teaching strategies that arouse students' inclinations and interests, increase their motivation to learn, provide them with educational experiences, develop thinking and innovation skills, and help them develop their skills in using modern technological tools, such as internet services in the teaching and learning processes (Bani Amer, 2021).

The spread of this knowledge and progress in the field of technology affects education in the knowledge explosion, represented by the quantitative and qualitative increase in knowledge, which necessitates educational institutions to reconsider the foundations of their choice of curricula, and methods of dealing with knowledge, for this it is necessary to keep pace with the era of informatization and create a generation that can deal with Arabic language technologies to cope with the accelerated changes in this era (Sevin, 2010).

Hence, e-learning has spread, which consists of an integrated system in terms of teacher, students, and electronic content. The teacher is responsible for facilitating the educational learning process, and the role of students is not limited to accessing information only, but also to participate, comment and give opinions. The teacher must always guide the educational learning process, and work to ensure that the electronic lessons are appropriate and attractive that increase the motivation of students and make them attend them, in order to

increase communication between each other, and between them and teachers, to build the educational community in the right way (Shehata, 2009).

Despite the emergence of several types of e-learning such as blended learning, which includes several types such as the rotation model, the flexible model, the selective model, and the virtual model, the most common of these models is the rotation model, as it consists of four sub-models formed from it, the most important of which is the Flipped learning model, which arose as a result of developments in the blended learning environment, and although inverted education is the development of blended learning, the method of its application and Idea make it a pattern independent of it (Shorman, 2015).

Flipped education is a leading idea these days, where technological techniques and tools are used to transfer lectures or the study topic outside the classroom, and it is emphasized that the concepts reach the students inside the classroom, that is, the heart of the classroom to a place for activities and discussions, especially through student groups, this is one of the types of active learning, and also allows students to complete their homework prepared by the teacher, by attending pre-prepared lectures, by the educational body or the teacher, refer to electronic links, prepared by the teacher or attend an educational program for the content of the material, and this is the opposite of teaching in the usual way(Crawford,2015; Bersin&Verleger,2013).

Based on the above, the importance of the current study lies in the use of Flipped education in the development of achievement among students in the tenth grade of the basic Arabic language subject.

1.1. The Problem and Question of the Study

The subject of the Arabic language is one of the subjects that need educational strategies that keep pace with the scientific, technical and technological revolution, that the world is witnessing today, and the pursuit of students to acquire a set of skills and trends, increase their motivation towards learning, and pay attention to their level of achievement, the researcher has noticed through his return to previous studies and- Some previous studies have recommended conducting studies that investigate the impact of Flipped learning on achievement in different subjects and age stages, such as a study (Hamdallah, 2015) and a study (al-Mashni, 2015), and in light of the previous data, this study came to answer the following question:

- Does the level of achievement of basic tenth-grade students differ depending on the teaching method (Flipped education, the usual method)?

1.2. Objectives of the study

This study aims to:

- Detection of differences in the level of achievement among students of the tenth grade due to the teaching method (Flipped education, the usual method).

1.3 Significance of Study

The importance of the study lies in the following points:

- The results of the study may contribute to the development of the Arabic language book by enriching it with activities based on the Flipped learning strategy that develops students ' achievement

- This study may help provide modern strategies for Arabic Language teachers, as well as for curriculum planners and teaching methods to develop more effective educational models and strategies, which better enriches the learning educational process.
- Guidance towards the use of modern technology in teaching Arabic inside the classroom, in a way that enriches the educational learning process, and facilitates the learning of Arabic language material, by focusing on the learning process using the teaching strategy of Flipped learning in the classroom and outside.
- Adopting a new type of education at various educational stages is in line with the trends of the digital generation.

1.4 Procedural Definitions

Flipped education: it is a teaching strategy that works to achieve educational outcomes in the Arabic language subject by preparing short videos on the main topics in the Arabic language subject and presenting them to students to watch at home to make room for activities and discussion of these topics in the classroom and under the supervision of the teacher.

Achievement: it is the amount that students get in a test designed in an educational unit of the Arabic language, and is measured by the mark that students get in the achievement test in the Arabic language, which was prepared by the researcher specifically for this study.

Tenth-grade: it is one of the classes of the basic stage, and the last grade level in the basic stage according to the educational ladder in Jordan, and the age of students at this grade level ranges around (16 years), and includes tenth-grade students studying in Karak governorate public schools.

1.5 Study Limits

The results of this study are limited to the first module of the Arabic language textbook for the tenth basic grade, in the schools of the Directorate of education in Karak governorate in the second semester of 2022-2021.

II. Review of Literature

Flipped education is seen as a form of blended learning, as it includes the use of technology in education, as it aims to use time in various educational activities, allowing students to familiarize themselves with the basic concepts in the subject of the desired lesson, outside the classroom time, through guidance from the teacher, in addition to the usual classroom education (Al-Zain, 2015). Brame (2014) defined Flipped education as an educational method through which students are exposed to new knowledge outside the classroom, where they watch recorded lessons, and then students are exposed to the discussion, dialogue, and problem-solving inside the classroom. Flipped learning aims to enrich the educational environment in various educational sources, improve student learning, and meet their needs, where the objectives of Flipped education are summarized as follows (Shakaa, 2016):

- Development of individual skills.
- Organize your online search skills by asking specific questions to guide the search process.
- Activating the role of parents in helping their children in educational projects and encouraging their children to self-learn.

- Involve students in the preparation and development of supporting materials for their learning and organize them in a way that makes it easy for them to use each as needed.

When comparing education in the usual way with Flipped education, it becomes clear that Flipped education begins with home lectures, and ends with training, practice, and problem-solving, while education begins in the usual way in the classroom, and ends with training through homework (Haroun and Sarhan, 2015). Bishop (2013) believes that Flipped education is not only a technology-based education, but also an education in which appropriate technology tools are used, availability of good quality that suits the educational content and the age of students, in order to enrich the educational learning process itself and improve student achievement and development, and this is done by reconfiguring the stages of the educational learning process and it's the class session, through which the new content is strengthened and enriched, through what the learner does from Several practical applications and experiments, as well as many discussions with the teacher or with colleagues, all this remains under the supervision of the teacher, and through this, the class time is full of active and effective learning, and learners have sufficient opportunity to understand the content of the material well, and this is reflected in the high academic achievement of students (Bani Amer& Al-Khataybeh,2022; Crawford, 2015).

Shorman (2015) points out that there is no specific design for the implementation of Flipped education, but there are steps agreed by all, which he lists as follows:

- Familiarizing the student with the study material outside the classroom, whether through video and its time ranges from five to seven minutes, a reading text that the teacher records to explain a particular lesson or readings related to the subject of the lesson, where students are directed to focus on them without distractions.
- The student takes notes and questions, and they are discussed with the teacher during the live class.
- At the beginning of the class, students are given enough time to ask questions about what they have seen.
- The time is then allocated to conduct a specific activity related to the topic of the lesson and then a research task, a laboratory experiment, or an investigative task, as planned by the teacher.
- The teacher does what the students have learned.
- Students are provided with a new video or another reading text for another new concept as homework to follow at home and so on.

Bishop (2013) added In this field that Flipped education increases the time of academic education, as students in Flipped education increase their involvement in the activity or in the educational tasks they carry out, because Flipped education frees the time spent by the teacher in writing notes, and frees the time necessary to achieve the minimum cognitive levels in the knowledge pyramid of Bloom, and this is done through the optimal use of the student's time outside the classroom and enables the student to write his notes and queries about what he learned, all according to his own speed in learning.

2.1 Previous Studies

The researcher has obtained several studies related to this study, which will be mentioned from the latest to the oldest as follows:

The study of al-Mashni (2015) aimed to investigate the impact of the use of Flipped learning on the achievement of seventh-grade students in the subject of Science and in their creative thinking. The study sample consisted of (57) male and female students of the basic seventh grade, randomly selected to represent one of the groups the experimental group and the number of its members (30) male and female students, and the selected unit of science was taught using the Flipped learning strategy, the other group represented the control group and the number of its members (27) male and female students, and after the application of the study tools, the results of the study showed that there are significant differences between the averages of the grades of the basic seventh-grade students in the achievement test in favor of the experimental group, the results also showed the presence of significant differences between the averages of the grades of the basic seventh-grade students in the achievement test in favor of the experimental group at the level of their creative thinking and for the benefit of the experimental group as well.

Hamdallah (2015) conducted a study aimed at revealing the impact of using the Flipped teaching method on the development of inductive thinking among eighth-graders in Arabic grammar in Salt City. The sample of the study included one of the public schools in Salt City, where two divisions were selected and then distributed to the experimental and control study groups, the experimental group included (20) female students to study Arabic grammar in Flipped education and the control group consisted of (20) female students, both groups were subjected to the test of inductive thinking before and after, and the study reached the most important results, the most significant of which is the presence of a statistically significant effect of the use of Flipped education in the development of inductive thinking.

The study of Johnson and Renner (2012) also aimed to investigate the impact of reversed learning on achievement and to find out the attitude of students and teachers towards it. The researchers used the semi-experimental method and two divisions were randomly selected from a school in the US state of Kentucky. The study showed that Flipped learning did not show a significant improvement in students ' achievement in the subject of applied Arabic language and attributed their results to the lack of creative competencies and individual desire of the teacher, as well as the entry of many problems that prevented the achievement of goals.

Through the review of previous studies, it is clear that there are no studies that dealt with the impact of the Flipped learning strategy on the achievement of tenth-grade students in the Arabic language subject in Jordan. As for the dependent variable, this study agreed in terms of its impact on achievement with several studies such as the study of al-Mashni (2015) and the study of Johnson and Renner (2012), some studies also indicated a positive impact on teaching according to Flipped learning in different thinking skills, especially in the subject of the Arabic language, and these studies include the study of Hamdallah (2015).

III. Research Method

3.1 The Approach of study

The semi-experimental approach was used in this study, based on two groups (experimental and control) for its relevance to the objectives of the study.

3.2 Study population

The study community consists of all students of the tenth grade in the public schools of the governorate of Karak in the academic year (2021/2022).

3.3 Study Sample

The school where the study was applied to its students was chosen intentionally, and it was Emra' secondary school for boys, because the researcher works as a teacher, and because it contains the necessary tools and equipment from computer laboratories and the availability of the internet in it, and it contains several divisions for the basic tenth grade, where the study sample consisted of (69) students from the basic tenth-grade students distributed into two divisions at random, one of the divisions was randomly selected to represent the experimental group, where it consisted of (33) students who studied using the Flipped learning strategy, and the second division was the control group consisted of (36) students who studied in the usual way.

3.4 The study Instrument

The researcher built an achievement test in the Arabic language subject, by reference to the previous theoretical literature, where the test is in its initial form of (25) paragraphs of a multiple-choice type, which measures the achievement of tenth-grade students in the Arabic language subject.

3.5 The Validity of the achievement test

The researcher confirmed the validity of the achievement test by presenting it to a group of arbitrators with experience and specialization in the field of teaching methods, measurement and evaluation, educational supervisors, and Arabic Language teachers, to make sure the extent to which it achieves the objectives of the study. Their suggestions were made on the achievement test, and their suggestions were accepted, and the number of paragraphs of the test in its final form became (20) paragraphs based on the observations and suggestions of the arbitrators.

3.6 Reliability of the achievement test

The researcher verified the stability of the achievement test using the equation (Richardson 20), and the value of the stability coefficient reached (0.89), and this value is good and acceptable for the purposes of this study.

3.7 Study Procedures

The researcher carried out the following procedures to achieve the objectives of the study:

1. Review the educational literature and previous studies related to the subject of the study.
2. Analysis of the Arabic language material for the basic tenth grade, to extract the concepts, generalizations, theories, and cognitive processes contained in it, and prepare study plans for them.
3. Building a test that measures achievement, commensurate with the objectives of the study, and it has been confirmed to be truthful and consistent.
4. Obtaining official approvals to facilitate the researcher's procedures in applying the study.
5. Meeting with the administration of the school where the study was applied, to ensure its readiness to apply the study, discuss ways of cooperation and facilitate the application procedures.
6. Applying the achievement test to the students of the two groups before the study started of the application.
7. Applying the study tools to a survey sample, to ensure that they are suitable for the study objectives, in terms of design and coordination commensurate with the tenth-grade students, to ensure that there are no obstacles that may occur during the application, and to find their sincerity and consistency depending on the results.

8. Starting to apply the study, the researcher taught the study material to the two groups (experimental and control) in the same period of time, under the same conditions, where the control group studied in the traditional way, and the experimental group studied using Flipped learning, where the duration of the application was (4) a week by (6) classes per week, and the total actual classes of the application was (24) classes, committed to the class time for the two groups (experimental and control), as the actual class duration was (45) minutes.
9. Applying the achievement test to the two groups (experimental and control) was after the end of the application.
10. Monitoring the students' responses to collecting, unpacking, and analyzing data statistically, the statistical package for Social Sciences (SPSS) was used.

3.8 Variants of the Study:

The study included the following variables:

Independent variable: The teaching method and it has two levels, namely:

A- The usual way.

B- The flipped learning strategy.

Dependent variable: achievement.

Statistical Analyses:

The researcher performed statistical manipulations using the statistical package for Social Sciences (SPSS) to answer the study question as follows:

- 1- The means and standard deviations of the responses of the experimental and control group members to the achievement test.
- 2- ANCOVA test-analysis of the accompanying variance to detect differences between the two groups (experimental and control) in the measurement of the level of achievement.

IV. Discussion

The following is a presentation of the results of the study, as well as a discussion of the results of the study, and the recommendations emanating from these results, which are as follows:

The study question, states: “Does the level of achievement of basic tenth-grade students differ depending on the teaching method (Flipped education, the usual method?”

To answer this question, the achievement test was applied to the students of the two groups (experimental and control) after completing the application, then the mean and standard deviations of the results of the dimensional test for the two groups were found, and Table (1) shows this.

Table 1. Mean and standard deviations of achievement test results

Standard Deviation	Mean	Number	Group
2.43	17.55	33	Experimental
3.39	12.94	36	Control

It is clear from the data referred to in Table (1) that there are apparent differences in the mean between the two groups of the tenth-grade students in the Arabic language due to the method of teaching; table (2) shows the results of that.

Table 2. The results of the analysis of variance (ANCOVA) test in the post-test of achievement

Level of significance	Value (F)	Mean of squares	Degrees of freedom	Sum of squares	Contrast source
0.202	1.66	14.48	1	14.48	(Pre) variance
*0.000	33.94	295.99	1	295.99	The group
		8.72	66	575	The error
			68	954.55	Total

* Statistically significant at the level of significance ($\alpha \leq 0.05$)

Through Table (2), the data indicate that there are statistically significant differences between the performance of the two groups in the post application of the achievement test in terms of the value of (F) (33.94), and the level of significance associated with it (0.000), and by referring to the arithmetic averages in Table (2), we note The average performance of the experimental group students was (17.55), and the average performance of the control group students was (12.94), which indicates that the differences were in favor of the students of the experimental group, which were studied using the flipped learning strategy.

This indicates that there is an effect of teaching using the flipped learning strategy on the achievement of the tenth graders in Arabic language, compared to the group that studied in the usual way. These results are attributed to the fact that flipped learning can deal with all levels of students, which enhances the student's confidence. By himself; It provides an open learning environment, which prepares the student at the center of the educational process, and allows him to dialogue and discuss with the teacher and his colleagues, which makes him active, in addition to that it provides the opportunity for students to learn about the topics of the lesson, and gives him sufficient time that is commensurate with his mental abilities, and the reason may be attributed To the factor of comprehensiveness that characterized the flipped learning strategy as it relies on the planning process for its procedures and the practical application of its steps, and the expansion of the circle of events and activities carried out by the teacher, and then the accuracy in the systematic implementation granted by the strategy, which helped students to understand the material in a simplified manner; Which generated impulse and harmony with the learning process, and the occurrence of effective interaction during the lesson.

Referring to the educational literature and previous studies related to this study, the researcher did not find any study that dealt with the impact of the flipped learning strategy on the achievement in Arabic language for tenth grade students, so the researcher resorted to studies close to his study, where this study agreed with the study of Al-Mashni (2015) and the study of Johnson and Renner (2012), the study of Hamdallah (2015).

V. Conclusion

This study came out with several recommendations based on its results:

1. The Arabic language teachers' adoption of the flipped learning strategy as a teaching method because of its impact on developing achievement.
2. Conducting similar studies that deal with other study subjects and different age stages and on other dependent variables.

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