

## THE EFFECT OF USING GAMES IN DEVELOPING SOME CONCEPTS OF TRAFFIC SAFETY FOR FIFTH GRADE PRIMARY STUDENTS

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### Abstract

The purpose of this paper is to preparing small games for fifth graders. And to identify the impact of these small games in developing some concepts of traffic safety for fifth graders. The two researchers used the experimental method to solve the research problem, and the research community was identified with students. The fifth grade of primary school in the province of Baghdad and a sample was chosen from the private Baghdad Primary School, which numbered (60) male and female students. They were distributed equally into two groups by simple random method (experimental and control groups). As for the most important conclusions reached by the two researchers, it is the presence of an effect of small games in developing some concepts of traffic safety for the fifth-grade students. The two researchers recommended the adoption of small games as a popular method for students to learn scientific concepts, including the concepts of traffic safety, and to make students' interest and attitudes towards practicing positive behaviors to achieve the concept of traffic safety.

**Keywords:** Games. Baghdad primary school. Traffic safety

### Introduction

The rapid development and the great explosion of knowledge that the whole world is witnessing is a motive towards achieving. Knowledge of its importance in facing the challenges of the modern era, where primary schools are a "field pigment for the development of concepts, and the primary stage is one of the most important stages of development for students, as it grows their abilities and be capable of influencing, directing, shaping and determining their future directions" (Badr, 1987). The lesson of physical education in primary schools is one of the important areas for developing the different abilities of students, and that the use of small games in physical education lessons is of exceptional importance to the students' desire to play small games because of their advantage With its special nature and its diversity, whether it is practiced with or without tools, or whether it is performed individually, in pairs or in groups, it provides the students with the appropriate opportunity to express their desires and tendencies, as well as the pleasure that they gain through practicing them, and endearing them to games by practicing and teaching them through cooperation among them and investing it for the motive of playing. For students, "small games" are simple organized games characterized by

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ease in their performance, accompanied by joy and pleasure, and carry within them honest competition, and at the same time, the laws governing them are characterized by flexibility and simplicity" (Al-Zayan, 2012) Encouraging students to play small games and develop the spirit of competition away from the idea of winning and losing, which gives them an educational and positive dimension that contributes to the development of concepts among students. It has excitement and suspense through which students can be taught various practices, behaviors, knowledge and concepts, so it was our duty to make the school an appropriate environment for the development of students at this stage and directing them in the right direction that we want for them in building their future personality and progress in the service of their societies away from stereotype and routine. Small games are also seen as one of the means and methods with important educational and educational goals as well as their contribution to satisfying this natural tendency of students, as well as gaining them consistency in moral and social qualities such as cooperation, forgiveness, overcoming difficulties and working for everyone, and through the two researchers watching the physical education lessons in primary schools Of the (Directorate of Education Rusafa3) noticed the weakest interest in these lessons and their lack of small games that are concerned with the development of concepts in general and the concepts of traffic safety in particular, relying on physical and skill exercises only and to a large extent, and the almost total absence of physical education lessons in the primary stage, which is an important stage in physical development and movement for students, which prompted them to try to employ small games within the physical education lesson to develop some concepts of traffic safety for primary school students

### Research Objective

- Preparing of small games for elementary students
- Identify the impact of these games on the development of some concepts of traffic safety for elementary students.

### Research fields:

- Human field: primary school students in Baghdad governorate

- Time field: (12/2/2021) to (12/4/2021)
- Spatial field: Baghdad Primary School hall, Baghdad Governorate.

### Research Methodology and Field Procedures

#### Research methodology:

The two researchers used the experimental method and the design of the two equal groups (experimental - control) with two cardiac and dimensional tests to suit the nature of the problem.

#### Community and sample research:

The research community was determined by primary school students, the fifth grade of primary school, for the school year 2021.2022, in the governorate of Baghdad, and the research sample was chosen from one of the schools covered by the research (Baghdad Primary School), which numbered (60) male and female students. They were divided into two groups, the experimental group, which included 30 male and female students, and the control group, which also included 30 male and female students.

#### Devices, tools and means used in the research

##### Data collection methods

- Arab and foreign sources and references.
- The International Information Network (Internet).
- Personal interviews.
- Traffic safety concepts development test.
- A special form for recording test results.

##### Tools and devices used

- Electronic stopwatch number (3).
- 1 laptop (Lenovo)

- One (1) Sony camera.

**Field Research Procedures**

**Defining the concepts of traffic safety for students:** The two researchers identified some concepts of traffic safety for students and presented them to experts and specialists to show their suitability for the research sample. The experts approved their validity and suitability for the age and level of the sample. These concepts were as follows:

1. The concept of traffic safety.
2. Identify the crossing points for pedestrians.
3. The three-colour traffic lights.
4. Knowledge and importance of pedestrian lines.
5. The dangers of crossing from places not designated for this.
6. Discipline and adherence to the rules of road traffic.
7. Not to run in front of vehicles.
8. How to sit in the vehicle.

**Preparation of a test for the development of traffic safety concepts for the primary stage:** The two researchers made use of the test of developing the concepts of traffic safety for primary school students prepared by (Al-Zayan, 2012, giving a score of (1) for each correct paragraph of the test, and giving a score of (0) for each wrong paragraph of the test.

The total score of the test was (38) degrees according to a binary answer scale (0,1), and the two researchers presented the scale to experts and specialists to indicate its validity and suitability for the research sample. Experts confirmed its validity and the agreement reached 100% (Table 1).

It is clear from Table 1 that the research sample is equal in some traffic safety concepts.

**Main Experience**

**Pre-test:**

After completing the exploratory experiment and completing the test preparation procedures, the two researchers conducted the pre-test on February 12, 2021.

**Preparation and implementation of educational units:**

The two researchers prepared educational units for small games, depending on the sources and references and their personal experience, and the educational units began to be applied to the experimental group on February 20, 2021.

The details of the educational units were as follows:

- Duration of application of the educational units (8 weeks).
- The number of educational units per week, two educational units on Sunday and Wednesday of each week.
- The total number of educational units is (16) educational units.
- The unit time is (40) minutes.
- The time of the main section of the educational unit is (28) minutes.

The vocabulary of the educational units of the experimental group was implemented by the teacher of the private Baghdad Primary School with the help of the assistant work team and under the direct supervision of the two researchers. Some things were taken into account in the development of the educational units and my agencies:

1. Diversification of small games and traffic games in the educational units to prevent the state of boredom and monotony that appears on the members of the experimental group.
2. The transition from easy to difficult in the application of educational units.
3. Achieving the goal of applying the educational units, this is the development of some concepts of traffic safety for primary school students.
4. The members of the control group used the educational units prepared by the physical education teacher in the private Baghdad Primary School, with the same number and times of educational units for the experimental group.

**Post-tests:** The two researchers, with the help of the assistant work team, conducted the post-tests of the research sample after completing the application of the educational units for small games on 12/4/2021, and the same conditions were taken into account in which the pre-test was conducted.

**Statistical methods:** The search data was processed through the Statistical Package for the Social Sciences (SPSS).

**Presentation, analysis and discussion of the results:**

Presentation and discussion of the results of the pre and post-experiment for the control experimental groups to test the development of traffic safety concepts (Tables 2-4).

**Discuss the Results**

With regard to tables (2,3,4), it is clear that there are significant differences between the cardiac and posttest scores for both groups and in favor of the post-test in the test of developing some concepts of traffic safety for students. Instructions, directions, advice and feedback, increased their desire to compete

**Table 1:** Shows the equivalence of the two research groups (experimental and control) in some traffic safety concepts.

Variables	Experimental		Control		T value	level Sig	type Sig
	Mean	standard deviation	Mean	standard deviation			
Traffic Safety Concepts	19,42	4,321	19,15	4,681	0,241	0,138	Non sig
Significant when the significance value $\leq 0.05$							

**Table 2:** Shows the arithmetic means, standard deviations and (t) values calculated between the pre and post-tests of the control group in the concepts of traffic safety.

Variables	Pre-test		Post-test		Mean of differences	deviations of differences	T value	level Sig	type Sig
	Mean	standard deviation	Mean	standard deviation					
Traffic Safety Concepts	19,15	4,681	21,82	5,118	2,67	4,957	2,950	0,002	Sig
Significant when the significance value $\leq 0.05$									

**Table 3:** Shows the arithmetic means, standard deviations and (t) value between the pre and post-tests of the experimental group in the concepts of traffic safety.

Variables	Pre-test		Post-test		Mean of differences	deviations of differences	T value	level Sig	type Sig
	Mean	standard deviation	Mean	standard deviation					
Traffic Safety Concepts	19,42	4,321	28,68	3,874	9,26	4,118	12,330	0,000	Sig
Significant when the significance value $\leq 0.05$									

**Table 4:** Shows the arithmetic means, standard deviations and the value of (t) calculated between the two experimental and control groups in the post-tests in the concepts of traffic safety.

Variables	Pre-test		Post-test		T value	level Sig	type Sig
	Mean	standard deviation	Mean	standard deviation			
Traffic Safety Concepts	28,68	3,874	21,82	5,118	4,078	0,001	Sig

Significant when the significance value  $\leq 0.05$

with the students of the experimental group, which made progress in the development of practicing small games, especially in the field of traffic safety. It is performed by the student or more, and it is divided into homogeneous groups, each group differing from the other with regard to its educational and educational impact and in relation to the nature of its activity" (Ibrahim and al-Sayeh. 2007). The results of the experimental group also indicate its superiority over the control group in the post-test in the development of some concepts of traffic safety for students. Games that aim to develop some concepts of traffic safety. We achieve the goals that we seek by creating an educated and aware generation that cares about itself and others, meaning that these games are concerned with developing students through their continued playing, and allow them to invest appropriate opportunities to develop their preparations, capabilities and abilities, as well as satisfy their basic needs, As (Zakia Ibrahim and Mustafa Al-Sayeh, 2007) indicate that "simple games of organization do not require great skill complications, as the one who implements them can determine some of their laws according to the goal to be achieved, not the student and his gender in an interesting and entertaining way" (Kamel and Yassin. 1981), By looking at tables (2,3,4) in testing the development of some concepts of traffic safety and for the experimental and control groups, the effectiveness of using small games in developing some concepts of traffic safety in a sound and correct manner and which resulted in achieving their effectiveness with merit.

#### Conclusions and Recommendations

Based on the research results that were reached within the limits of the research community, the following conclusions were reached:

#### Conclusions

- The members of the experimental group excelled in the development test of some concepts of traffic safety for the fifth-grade students.
- Small games have a clear impact on developing some traffic safety concepts for fifth graders.

#### Recommendations

Under the conclusions reached by the researchers, they recommend the following.

- Focusing attention on the use of small games in developing the concepts of traffic safety for fifth-grade students.
- Encouraging students to actively participate in learning the concepts of traffic safety for fifth-grade students
- Using small games to teach students scientific and social concepts.
- Conducting similar research and study that includes different samples to know the students' attitudes and tendencies towards scientific concepts, including the concept of traffic safety.

#### References

- Ahmed Badr. 1987. Principles and Methods of Scientific Research, 4th Edition: (Kuwait, Publications Agency)
- Khalil Misbah Al-Zayan. 2012. The effectiveness of the animation program in acquiring the concepts of traffic safety among primary school students in Gaza, Master's thesis, College of Education, Islamic University.
- Sherif Abdel Hamid. 2015. Physical and kinetic education for normal and challenged children between theory and practice, 2nd Edition: (Egypt, Al-Kitab Center for Publishing).
- Yassin Kamel and Wadih Yassin. 1981. Small Games, (Mosul, Ministry of Higher Education and Scientific Research).
- Zakiya Ibrahim and Mustafa al-Sayeh. 2007. Al-Wasat in Small Games, 1st Edition: (Egypt, Dar Al-Wafa for Donia Printing and Publishing).

## **Appendix No 1**

### **Shows the questions of the test of developing the concepts of traffic safety**

\*\* Choose the correct answer from the following:

1. The components of the road include the following, except for one
  - a. sign b. traffic light c. trees d. The Car
2. The green color in the traffic light means
  - a. whoa b. wait c. Narrative. Not what was mentioned?
3. Number of pedestrian traffic lights
  - a. color and one b. Lunan c. Three colors d. four colors
4. Pedestrian lines prepared for
  - a. Pedestrians cross the street safely b. To decorate the street c. To cut streetcars safely d. To safely cut street bikes
5. All of the aforementioned sections of the road except for one
  - a. street b. sidewalk c. lighting d. middle carrot

## **Appendix 2**

### **A sample of some small games**

#### **1. Game name: Traffic direction**

Method of performance: The children spread widely in the square, and the teacher puts a wide colored adhesive tape inside a square, and the teacher places the child at the head of the intersection and directs the other children by the hand to walk towards the green line ahead, to walk towards the yellow line to the right, to walk towards the red line to the left, or to stop.

#### **2. Game name: Game name: Focus on the road**

Method of performance: The teacher divides the children into two groups in the form of a square and draws the white outlines for crossing correctly on the square, and when the signal is launched by the teacher, the children move towards the road for the purpose of crossing, and the children are heard by the absence of the sounds of cars coming from afar.

#### **3. The name of the game: Skilled Driver**

Method of performance: The children run in a free spread around the square, imitating the sound of cars using the bat while they are on the road. When they hear the sound of the traffic policeman's whistle fired by the teacher, each child tries to stop in his place suddenly, and the child who stops his car succeeds faster.

#### **4. The name of the game: No to running in the street**

Performance method: The teacher divides the children into one group and draws the square in a square shape and paints the sidewalks in white and yellow, and when the whistle sounds, the children move towards the sidewalks and remain standing and do not cross the street until after making sure that the street is free of passing cars.

#### **5. The name of the game: Sorting traffic colors.**

Method of performance: The teacher divides the children into two groups in the form of a circle and mixes the elements of all colors red, yellow and green together, then asks each child to sort the elements of the same color and put them in a different prayer.