



Science, Movement and Health, Vol. XVIII, ISSUE 2 Supplement, 2018 September 2018, 18 (2 supplement): 375 - 382 *Original article* 

# CONTRIBUTION OF CHALLENGES TO CHILDREN FROM CHURCH EDUCATION IN THE PHYSIC EDUCATION AND SPORTS LESSONS

# POPA CRISTIAN<sup>1</sup>, POPA CORINA<sup>2</sup>

### Abstract

*Objectives.* Physical development during the pre-school period physical development records obvious progress, there are a series of morphological changes, so that, towards the end of the pre-school period, the proportion of extremities - the trunk begins to change, in favor of the former.

During this period, one of the two hemispheres is hired, which influences the child's handiness (ambidextrous, right-handed or left-handed). Information processing improves, as is the precision of movements. The game, as a form of activity, continues to occupy an important place, the child showing preference for: building games, water games and games involving roles.

*Methods of research*. The need for movement and the availability for movement, extreme to be marked at this age, must be capitalized by placing the child in various situations, which contributes to the acquisition of a wide base of motoring actions. Running, jumping with all its variants, crawling, climbing, equilibrium exercises, throwing, suspension, rocking dominate the preschool's motoric repertoire. The research was carried out during the school year 2017-2018 at the Petre Ispirescu Primary School in Constanta.

*Results.* The difference between the subjects of the two groups on the final test on the route 1 (experiment group  $6,307 \pm 1,077$ , control group  $6,514 \pm 1,099$ , being statistically insignificant at  $p \ge 0,05$ ), apical course 2 - time during the deployment experiment  $8,428 \pm 1,289$ , control group  $8,554 \pm 0,89$ , being statistically insignificant at  $p \ge 0,05$ ) and target discarding (experimental group  $2,895 \pm 0,658$ , control group  $0,842 \pm 0,688$  at a significance threshold  $p \le 0,0005$ ) have improved due to the introduction of physical variables in the physical and sport education lessons of the independent variable experiment (patches and applicative pathways).

*Conclusions.* In conclusion, we can see that the motion games have positively influenced the results of the final test

Key words: children, physical education, motion games, preschoolers.

#### Introduction

Physical education and school sport are important activities in the educational system of children and pupils in our country (Octav, 2008).

Physical education is that part of education that aims at the harmonious development of the body, the strengthening of health and the cultivation of certain physical qualities necessary for the work of sporting activity.

The theory and practice of physical education has been continually developing. If at the beginning it was subordinated to some great goals, being regarded only as a means of recreation after a more intense intellectual activity, the educational ideal considers it an indispensable component that contributes to the development of the child's persons. Thus, physical education contributes to the functional development of the nervous system, providing favorable conditions for intellectual activities. It also plays an important role in the formation and education of moral conscience and conduct, in the formation of positive traits of will and character (courage, determination, perseverance, firmness, etc.). It then contributes to the formation of some motoring qualities such as strength, precision, strength, skill, mobility, etc. (Iakovlev, Bogdanov, 1950).

The physical education lesson must be understood as the main form of practicing physical exercise in an organized manner, with an extended scope, starting from kindergarten and ending with the completion of higher education. It can be organized as an activity in the "core curriculum", but also as an

<sup>&</sup>lt;sup>1</sup> Faculty of Physical Education and Sport, University Ovidius of Romania

<sup>&</sup>lt;sup>2</sup> Scoala Primară Petre Ispirescu Constanta, Romania Email: crispopa2002@yahoo.com

<sup>&</sup>quot;the abstract was published in the 18<sup>th</sup> LS.C. "Perspectives in Physical Education and Sport" - Ovidius University of Constanta, May 17-19, 2018, Romania Received 10 april 2018 / Accepted 5 may 2018





activity foreseen in the curriculum at the school's decision. "

As a basic form of organizing physical education, the lesson ensures the systematic and consistent implementation of the objectives of physical education and content of programs. The presence of students is mandatory for both practitioners and medical practitioners. The activity is led by the teacher in an organized and managed setting (Gloria, 2008).

This "sport education" implies the formation of beliefs and attitudes that encourage them to practice sport through its many forms of institutionalization and beyond.

This activity, with profound formative implications, must be understood by all educational factors as a solution that, through its content, achieves harmonious physical development, balanced physical and mental training of the pupils, strengthening health, strengthening and recreating young people included in the educational process (Octav C., 2008).

The physical education and sports lesson should be understood as a "permanently modifiable" teaching activity that requires the teacher to adapt and permanently adapt to the pupils' response to learning contents and activities, proposed and conducted by reconsidering operational objectives by completing the types of activities learning, by giving up some learning tools and introducing others, by structuring or expanding a lesson system allocated to a learning unit.

Physical education is always an "own creation" that must reflect the teacher's knowledge, skills, professional abilities and student assimilation. The decisive factor in the manifestation of the efficiency of the physical education lesson is the particular ability to adapt the teacher to the concrete material conditions, to the individual and collective peculiarities and to the inherent situations that occur during the course (Gloria, 2008).

Positive valences of this activity are widely known and applied in civilized countries, with many examples being made. However, in our society, although these are known, insufficient action is taken to create the organizational and material framework to stimulate interest and to ensure the physical education and sport of continuity (Octav, 2008).

Physical education also contributes to the development of the student's psychic processes and personality. In this direction, a particular emphasis is placed on the development of cognitive processes, emotional processes of the volunteers, and on the formation of perceived features (Nicola, 1991).

#### **Research hypothesis**

In the scientific approach we started from the premise that: if we use a game program, stages and applicative paths, the pupils' motor skills will be improved.

### Methods

The research was conducted in weekly physical education lessons. In January 2018 we applied a battery of anthropometric and motor tests that were applied to the experimental and control group.

Physical education hours were held every Wednesday and Friday from 8 o'clock to 10 o'clock.

Initial testing was performed at the beginning of the experiment (January 2018), when we started accommodating the team with this type of activity.

Final testing was done in May 2018, when the team had already consolidated the exercises applied in physical education and sports classes.

All subjects had the same training conditions and actuation systems and tests were run at the same time but on different days of the week.

During the experiment, the subjects had two holidays, namely the January and spring intersetrial holidays. Practically five months worked effectively, the rest being holidays and evaluation periods.

# Subjects

Our research was conducted at the Petre Ispirescu School in Constanta, in the 4th grade A, with an average age of Media = 10.8 years, which represented the experimental group consisting of 19 subjects, of which 12 were girls and 7 boys.

The control group was represented by fourthgrade pupils in the same educational institution, with an average age of 10.7 years old, consisting of 19 subjects, 10 girls and 9 boys.

We emphasize that the subjects of both groups were selected in equal numbers, of those who were at least 99% present at the times when our drive systems were applied, in order to make a pertinent comparison.

Starting from the hypothesis of the paper, that: if we use a game program, stages and applicative pathways, we will improve the students' motor capacity, we followed the behavior of the dependent variable (application paths) within the two groups (experiment group and control group) the application of the independent variable was performed only within the experimental group



(introducing the physical education of the scales and the application paths).

The research follows the evolution of two variables, the dependent variable and the independent variable as well as the positive or negative influence of these variables exerted by certain factors throughout the research. The evolution of the dependent variable, namely the evolution of the results obtained from the application paths, depends on the way in which the independent variable is applied in the lessons as well as the test conditions itself. Testing was done on the first day of the week because the children came after two days in which they did not work hard, being resting.

Testing of the dependent variable (application paths) was carried out in the gymnasium, by performing two tests, taking into account the best result of each subject, the result being recorded for the statistical treatment of the data. The children were tested on the following two applicative paths, namely:

#### **Application course 1**

The child is placed in the starting position with the handbal ball held in his hands, he will have the following route: starting from the legs, dribbling among 5 sets placed at a distance of 2 m bypassing the last pole and returning to the speedline running right. A contracronometer is running.

Time is recorded for statistical interpretation.

# Application course 2

he child is seated at the center of the field. Draw a triangle with the 2 m side facing the center of the field. On the start command, the subject has to tap the triangle tips, then performs dribble running to the 9 m semicircle, throwing at the gate (the gate is divided into 4 score points, namely: center 4 points, left 3 points, right 2 point and at the bottom of the 1point gate, outside 0 points) and return to running at the center of the court. A contracronometer is running

The sports equipment of the test subjects was identical. No health or accident (muscle or other) problems occurred prior to testing that could have adversely affected the subjects' progress.

Lesson program of investigated subjects

A first objective of the training, presented in these programs, of the subjects of both groups, was the development of motor skills. The warming of the body for the effort contains the same content in each lesson, the difference existed in the EXPERIMENT GROUP where games and applicative trails were introduced.

# Table 1

Analysis of somatic parameters Experimental group - initial testing and final testing

Nr.	Parameters compare		Experimental group		
crt			Р	Initial testing	Final testing
1	Height (cm)		$M \pm Ds$	140,842±7,697	143±7,594
			CV	5,465	5,31
2	Weight (kg)		$M \pm Ds$	33,768±8,466	33,042±7,618
2			CV	25,071	23,056
3	Thoracic Perimeter (cm)	Inspiration	$M \pm Ds$	76,789 ± 7,576	77,789 ± 7,576
			CV	9,866	9,739
		Expiratory	$M\pm Ds$	71,842±7,794	70, 842±7,794
			CV	11,099	11,256
		Elasticity	$M \pm Ds$	2,474±0,612	4,421±0,607
			CV	24,737	13,73









The somatic indexes registered in the experiment group reveal a statistically significant increase between the two tests, the initial testing and

the final testing, the evolution of subjects being normal for their age and in full compliance with the national average of the school population.

# Table 2

Analysis of somatic parameters Martor group - initial testing and final testing

Nr.	Parameters compare		Experimental group		
crt			Р	Initial testing	Final testing
1	Height (cm)		$M \pm Ds$	140, 474±6,415	141,789±6,52
•			CV	4,567	4,598
2	Weight (kg)		$M\pm Ds$	34,532±6,457	34,816±6,174
			CV	18,699	17,733
3	Thoracic Perimeter (cm)	Inspiration	$M \pm Ds$	75,842±6,882	76,842±6,882
			CV	9,074	8,956
		Expiratory	$M\pm Ds$	73,421±6,777	72,421±6,777
			CV	9,23	9,358
		Elasticity	$M\pm Ds$	2,474±0,612	4,421±0,607
			CV	24,737	13,73





# Chart no. 2 Dynamics of the Somatic Parameters - control group



The results recorded in the martor group, as shown in Table 2, are statistically significant, demonstrating that the subjects of the control group also have the same positive evolution of harmonious physical development at the age of puberty.

### Results

Table 3 Analysis of motor parameters Experimental group initial testing and final testing

Nr.	Parameters compare		Experimental group		
crt			Р	Initial testing	Final testing
1	Rou	Route		6,522±1,094	6,307±1,077
	Applicative 1		CV	16,744	17,076
2	Route Applicative 2	Running	$M \pm Ds$	8,971±1,576	8,428±1,289
			CV	17,568	15,294
		Throw	$M\pm Ds$	1,842±0,958	2,895±0,658
			CV	52,009	22,729

# Chart 3

Dynamics of motor parameters

Experimental group initial testing and final testing



Ovidius University Annals, Series Physical Education and Sport / SCIENCE, MOVEMENT AND HEALTF Vol. XVIII, ISSUE 2 Supplement, 2018, Romania The journal is indexed in: Ebsco, SPORTDiscus, INDEX COPERNICUS JOURNAL MASTER LIST, DOAJ DIRECTORY OF OPEN ACCES JOURNALS, Caby, Gale Cengage Learning, Cabell's Directories





For the experiment group we will observe that the results of the subjects on the two applicative pathways, the applicative course 1 ( $6,522 \pm 1,094$  initially, and after 5 months in the final test  $6,307 \pm 1,077$ , at a significance threshold p $\leq 0,0005$ ) (8,971  $\pm 1,576$  initially, and after 5 months in final testing  $8,428 \pm 1,289$ , at a significance threshold p $\leq 0,0005$ )

and target discarding  $(1,842 \pm 0,958)$  initially and 5 months after final testing 2,895  $\pm$  0,658, with a significance threshold of  $\leq 0,0005$ ), due to the independent variability, the application of the physical and sports education lessons and application paths improved.

# Table no. 4

Analysis of motor parameters Control group Initial testing and final testing

Nr.	Parameters compare		Experimental group		
crt			Р	Initial testing	Final testing
1	Route Applicative 1		$M \pm Ds$	6,522±1,095	6,514±1,099
			CV	16,789	16,871
2	Route Applicative 2	Running	$M \pm Ds$	8,851±0,884	8,554±0,89
			CV	10,302	10,404
		Throw	$M \pm Ds$	0,789±0,631	0,842±0,688
			CV	79,975	81,71

# Chart no. 4

Dynamics of motor parameters

Control group Initial testing and final testing



Ovidius University Annals, Series Physical Education and Sport / SCIENCE, MOVEMENT AND HEALTE Vol. XVIII, ISSUE 2 Supplement, 2018, Romania The journal is indexed in: Ebsco, SPORTDiscus, INDEX COPERNICUS JOURNAL MASTER LIST, DOAJ DIRECTORY OF OPEN ACCES JOURNALS, Caby, Gale Cengage Learning, Cabell's Directories





The results of the control group subjects at the two applicative pathways, application route 1  $(6,522 \pm 1,095$  initially, and after 5 months in the final test  $6,514 \pm 1,099$ , being statistically insignificant at  $p \ge 0,05$ ), the Applicative course 2 in terms of time  $(8,851 \pm 0,884$  initially and 5 months after final test  $8,554 \pm 0,89$ , being statistically insignificant at  $p \ge 0,05$ ) and target discarding (0,789  $\pm$  0,631 initially and 5 months after final testing 0,842  $\pm$  0,688, being statistically insignificant at  $p \ge$  0,05) were statistically insignificantly improved only by applying programs that did not contain the independent variable.

#### Chart no. 5

Dynamics of motor parameters Experimental group - Control group - Final testing



#### Discussion

Physical education and sport, included in the act of culture and education, contribute together with the other educational factors to the construction of the spiritual, moral and physical edifice of man (Mihailescu, 2003). Physical education and sporting activities are a constant concern for all the actors responsible for generating training in health education, and health and biodiversity. The constituent part of the complex process of training



and formation of the young generation, physical education has been recognized as contributing to the multilateral fulfillment of personality in all periods of society's development (Mitra, Mogoş, 1980).

It can be seen that during application 1 (experimental group  $6,522 \pm 1,094$ , control group  $6,522 \pm 1,095$ , at a significance threshold  $p \le 0,05$ ), apical course 2 - time during the deployment time (experiment group  $8,971 \pm 1,576$  control group  $8,851 \pm 0,884$  at a significance threshold  $p \le 0,05$ ) and target discarding (experiment group  $1,842 \pm 0,958$ , control group  $0,789 \pm 0,631$ , at a significance threshold  $p \le 0,01$ ) the difference between the group experiment and control group on initial testing is significant but at a small threshold, which means that at the beginning of the experiment the subjects in both groups were very little different in terms of the results achieved on the two applicative pathways as the subjects did not practice either a sport.

The difference between the subjects of the two groups on the final test on the route 1 (experiment group  $6,307 \pm 1,077$ , control group 6,514  $\pm$  1,099, being statistically insignificant at p  $\geq$ 0,05), apical course 2 - time during the deployment experimental group 8,428 ± 1,289, control group 8,554  $\pm$  0,89, being statistically insignificant at p  $\geq$ 0,05) and target discarding (experiment group 2,895  $\pm$  0,658, control group 0,842  $\pm$  0,688, at a significance threshold  $p \le 0$ , 0005) have improved due to the introduction of physical variables in the physical and sport education lessons of the experimental group of variables (APIs and APIs). Looking at the results of these applied paths in the physical education and sports lessons, we can confirm the hypothesis of the paper that the effects of introducing in the physical and sport education lessons of active participative methods in the 4th grade are positive (significant) in children with ages between 10 and 11 years.

On the significance thresholds but also the difference between the average of each group in terms of TI. and T.F. we will find that subjects developed approximately at the same pace, as long as

the experiment lasted, and could have both positively or negatively influence both groups.

In other words, we can say that height and weight affect both groups in the same but insignificant way, which means that the lessons containing applications and application paths are the main means of increasing the results of the experimental group vs. the control group in terms of the results of the two applicative pathways.

#### Conclusions

Looking at the results of these applicative paths, applied in the physical education and sports lessons, we can confirm the hypothesis of the paper that: if we use a games program, batches and applicative paths, the pupils' motor skills will improve, leading to the following conclusion:

Participatory active methods (stadiums and application pathways) improve the driving ability of pupils in the 4th grade.

#### Acknowledgments

I thank all students for participating in this study.

### References

- Iakovlev V, Bogdanov PG, 1950, Educația fizică a elevilor în clasele I-IV, Ed. Cultură fizică și sport.
- Gloria R, 2008, Didactica Educației fizice și sportului, Edit. PIM, Iași.
- Nicola I, 1991, Teoria educației și noțiuni de cercetare pedagogică, E.D.P., București.
- Octav C., 2008, Metodica predării educației fizice în ciclul primar, Edit. "Gheorghe Alexandru", Craiova.
- Mihăilescu L, 2003, Cuvânt înainte, în Gîda D.M.,, Profesorul de educație fizică, statutul socialrolul și coordinate comportamentale, Editura Pământ, Pitești, pag.5.
- Mitra Ghe, Mogoş A, 1980, Metodica educației fizice școlare, Editura Sport-Turism, București, pag.7.