



**International University Sports Federation**

**International Association of Physical Education and Sport Universities**

**National University of Physical Education and Sports of Bucharest**

**PROCEEDINGS**

**VII<sup>th</sup> International Scientific Conference of Students and Young Scientists**

**"University Sport: Health and Prosperity of the Nation"**

**Bucharest, 4-6 May 2017**



**ISBN 978-606-798-009-7**

## EXPERIENCE OF IMPLEMENTING HEALTH-FORMING TECHNOLOGIES INTO PHYSICAL EDUCATION OF PRIMARY-AGED SCHOOL CHILDREN

*Goncharova N., Nosova N., Butenko H.*

*National University of physical education and sport of Ukraine  
Kiev, Ukraine*

*e-mail: nata\_infiz@mail.ru*

*Coordinator: Oleksandr Dovzhenko Hlukhiv national pedagogical university,*

**Abstract.** Based both on the data from scientific and methodological sources and own practical experience, the publication represents definitions regarding the activity in forming and protecting health of primary-aged school children during physical education. The health-forming technology, based on the means of health tourism as a tool of positive influence on physical health of primary-aged school children was introduced, its effectiveness was proved.

**Key words:** health, primary-aged school children, health tourism.

**Introduction.** Pedagogical process of physical education includes complex performance of recreational activity, which primarily aims to implement the technologies of preventing negative influence of risk factors into pedagogical activity concerning health protection (Goncharova N. et al, 2016). This process involves obligatory consideration of children's functional capabilities, individual peculiarities of their reaction on the conditions of educational environment (Biryukova, 2006, Pyechka, 2016).

Nowadays, the significant factor of increasing the quality of general secondary education is performing school education on the base of health protection (Vitchenko, 2013). The process of physical education is the one, based on health protection of schoolchildren and possessing the range of tools to form healthy personality (Chin, et al, 2014; Dreiskaemper, 2015).

While creating an idea of health-forming and health-protecting technologies during physical education, it is necessary to define their main types:

– health-improving technologies – technologies, targeting to improve a person's physical conditions, increase health potential: physical training, physiotherapy, aromatherapy, cold training, gymnastics, herbal therapy, musical therapy;

– health education technologies mean hygienic education, forming performance-based skills (controlling emotions, solving conflicts, etc.), accidents, psychoactive substance abuse prevention, sexual education;

– technologies of health culture education involve developing the person's qualities which contribute to protecting and improving health, forming perception of health as value, strengthening motivation to keep healthy life-style, increasing responsibility for personal health and health of the family;

– health protection technologies – technologies that create safe conditions for alteration, person's studying and working, and those that solve tasks of rational organization of educational process (taking into consideration age, gender, individual peculiarities and hygienic norms), correspondence of study load and exercise load with a child's capabilities (Voronin, 2006);

– health-forming technologies mean purposeful recreational humanistic, personality-centered interaction of a teacher and a schoolchild, a lecturer and a student, a coach and an athlete etc., that involves the complex of means, techniques, aimed at forming, protecting, strengthening, restoring person's health (Anastasova, 2014);

– recreational technologies, which is the complex of procedures, techniques and tools, using which provides possibilities to display person's active attitude, depending on age peculiarities, interests, physical abilities and personal advantages and aimed at increasing culture of everyday

life and forming healthy life-style; contribute to physical and spiritual rehabilitation, maximum development of a person's initiative and independence, which relieve work, mental and intellectual load, promote social activity and build perfect conditions for person's creative self-expression (Krutsevych et al, 2013).

A special place among the technologies, oriented to forming schoolchildren's health, is taken by health-forming technologies.

The researchers considered possibility to use various means of physical education in order to perform health-forming activity. For instance, the effectiveness of using Ukrainian folk dance in increasing the level of physical fitness and health protection in primary-aged school children was proved (Olefrenko, 2013). Variety of means for protecting children's health are supported by usage of modern means of health-related fitness (Nordic walking) (Sainchuk, 2015).

To our mind, health tourism has huge potential for improving children's health. Different means, various conditions for conducting lessons, social interaction of tourist group members make it irreplaceable for forming school children's health. However, the analysis of scientific and methodological sources speaks for little experience in performing lessons in health tourism in physical education process in order to improve health.

**Purpose:** to develop the health-forming technology, based on the means of health tourism, oriented to increasing the level of primary-aged school children's physical health and test its effectiveness.

**Tasks:**

1. To analyze the approaches to forming and protecting school children's health by the data from scientific and methodological sources.
2. To develop and test the effectiveness of the health-forming technology, based on using the means of health tourism.

**Research methods:** analysis of scientific and methodological sources, physical assessment of children.

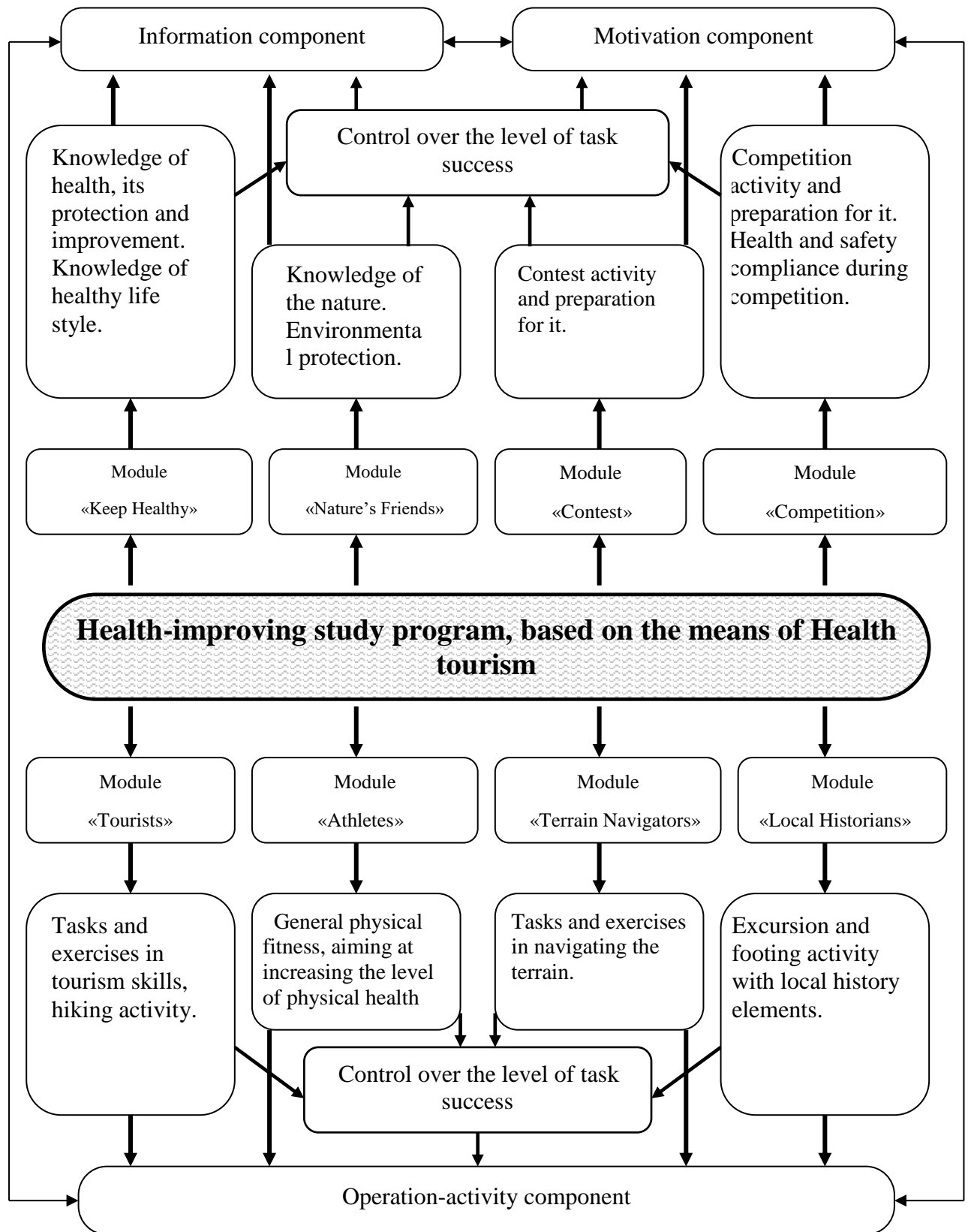
**Results of the research and their discussion.** Based on the analysis of the data from scientific and methodological sources and the experience of work in the field of physical education, the health-forming technology, based on the means of health tourism was developed. The aim of the technology is to increase the level of physical health in primary-aged school children. Besides health-improving tasks, performing the complex of educational tasks and forming motivation for independent health-improving activity are provided:

- improving chances to catch new kinetic experience, developing motor skills;
- developing children's knowledge of healthy life-style, physical fitness and sports, natural environment and the rules of behaving there, influence of motor activity and physical exercises on a person's health;
- promoting mental activity as a result of introducing creative tasks;
- forming strong motivation for participating in health-improving programs, increasing the level of school children's motivation, improving the level of health state, activity and well-being;
- increasing the level of physical and functional development, level of body's adaptive and spare capacity, physical efficiency, physical fitness, development of kinetic qualities;
- improving the level of body's resistance to negative factors of the environment;
- rising the level of physical health;
- building the skills of social activity and norms of behavior.

The offered health-forming technology matches the criteria of designing the system of health-improving activity: scientific validity, systemacity, structural properties, controllability, efficiency, effectiveness, reproducibility (Andreieva, 2015) and approaches to the correction of physical state (Kashuba et al, 2010). The structure of the technology as a system includes

interrelated components: motives, aim, content, operations, result and reflection, as defined by the recommendation of O.Yu.Anastasova (2014).

Fig. 1. The structure of the health-improving study program, based on the means of health tourism for primary-aged school children



As a part of the technology, the study program, based on the means of health tourism, was developed (its general structure is represented in Fig.1). The level of work load, provided by the technology, was defined according to the level of children's physical fitness.

Children with low and below the average level of physical fitness mainly were doing the exercises of aerobic type of low and medium intensity, and exercises for developing motor qualities with fewer sets per exercise and repetitions.

Children with average and above average level of physical fitness were doing the exercises of aerobic type of medium and high intensity, and exercises for developing motor qualities with more sets per exercise and repetitions.

Physical exercises, both general (including the complexes of combined developing exercises) and special ones were being performed mainly in motion (including doing physical exercises during walks, excursions and hikes) in order to form aerobic endurance. At the same time positive emotional mood, which is the core component of keeping high motivation level, was kept.

Differentiation of exercise load was brought into action by: easing the conditions of doing exercises, reducing the number of sets and duration of doing exercises, changing the speed of doing exercises, shortening the stage length or distance.

Effectiveness of the health-protecting technology was defined during pedagogical experiment. Two groups of children – experiment group (EG) and control group (CG) – of 20 children each were formed. Children in EG were having classes by the technology we developed. Children in CG were attending the circle as a part of out-of-school facility by the program “Young Tourists-Local Historians”, developed by the Ukrainian State Center of Tourism and Local History and the Scientific and Methodological Committee in Out-of-School Education. Lessons in EG and CG were held three times a week for two hours each.

The main technology effectiveness criterion was the parameter of the level of children's physical health.

At the beginning of educational experiment there were 15% (n=3) children with average physical health level (PHL), with the ratio of boys – 5% (n=1) and girls – 10% (n=2). There were 20% (n=4) of primary-aged school children (4 boys) with the below average PHL. There were 65% (n=13) children, among which there were 25% (n=5) boys and 40% (n=8) girls, with the low PHL.

At the end of the experiment we recorded 1 girl with above average PHL, which is 5% of the total number of children, and significant increase in number of children with average PHL up to 50% (n=10), with 30% (n=6) ratio of boys and 20% (n=4) – of girls. We as well recorded the increase in the number of children with below average PHL up to 30% (n=6), with 10% (n=2) ratio of boys, and 20% (n=4) ratio of girls. At the same time we recorded significant reduction of the quantity of children with low PHL down to 15% (n=3), with 10% (n=2) ratio of boys, and 5% (n=1) ratio of girls.

In children from CG with average PHL at the beginning of the educational experiment there were 15% (n=3) of primary-aged school children, where the ratio of boys was 10% (n=2), the ratio of girls was 5% (n=1). 35% (n=7) (25% (n=5) boys and 10% (n=2) girls) of children with PHL below average were recorded. Low level of PHL was recorded in 50% (n=10) children (10% (n=2) boys and 40% (n=8) girls).

At the end of the experiment we recorded the increase in number of children with average PHL up to 55% (n=11), with 30% (n=6) boys and 25% (n=5) girls. At the same time we recorded reduction of the quantity of children with PHL below average down to 25% (n=5), with 15% (n=3) ratio of boys, and 10% (n=2) ratio of girls, as well as reduction of the quantity of children with the low PHL down to 20% (n=4), with 5% (n=1) ratio of boys, and 15% (n=3) ratio of girls. Children with PHL above average were not found.

Thus, during health-improving activity 100% (n=20) children in EG either improved PHL, or increased grades of PHL up to upper limit values, whereas in children from CG such changes were not so obvious.

**Conclusions.** Nowadays health condition of children in Ukraine demands introducing effective means of forming and protecting young generation's health. The variety of means of physical education, which are used in health-improving activity, contributes to forming children's interest to physical education, one of which is health tourism. The developed health-forming technology was held in three stages: preparatory, main and final.

Health-improving study program, developed within the technology, consists of three components: information, motivation and operation-activity ones, aimed at improving physical health of primary-aged school children by means of health tourism. Testing effectiveness of the technology developed proves its positive influence on physical health of primary-aged school children.

#### References:

Anastasova O. YU. (2014) *Pidhotovka maybutnikh uchyteliv fizychnoyi kul'tury do Vprovadzheniya zdorov'yaformuval'nikh tekhnolohiy u navchal'no-vykhovnyy protses zahal'noosvitn'oyi shkoly: dis. kand. ped. nauk* [Training of future teachers of physical culture to the introduction health-forming technologies in the educational process of secondary school: PhD diss.]. Berdyansk. 257 p. (in Ukr.).

Andrieieva, O. (2015). "Prerequisites for the development of the conception of recreational and health promoting activities of different population groups". *Theory and methods of physical education and sports*, 1, 11-15 (in Ukr.): [http://tsushko.tutdomen.com/tmfvs/article.php?file=archive%2Fxml%2F19927908\\_2015\\_2015\\_1\\_unicode.xml&pages=11-15&lang=ukr](http://tsushko.tutdomen.com/tmfvs/article.php?file=archive%2Fxml%2F19927908_2015_2015_1_unicode.xml&pages=11-15&lang=ukr)

Andrieieva O., Galan Y., Hakman A. & Holovach I. (2017). Application of ecological tourism in physical education of primary school age children. *Journal of Physical Education and Sport*, Vol 17, Supplement issue 1, pp. 7-15. doi:10.7752/jpes.2017.s1002

Biryukova N.A. (2006). "Health-saving technologies in general education institutions" *Gigiyena i sanitariya* [Hygiene and sanitation], 1, p. 76-77 (in Russ.)

Chin M.K. & Edginton, Ch. R. (eds.) (2014). *Physical Education and Health. Global Perspectives and Best Practice*. Urbana/IL: Sagamore.

Dreiskaemper D. & Naul R. (2015). Healthy children in sound communities – four cohorts of longitudinal intervention project in primary schools. *Revista Espanola de Education Fisica y Deportes*, No. 410, supl LXVII, p.466.

Goncharova N., Butenko H. & Usychenko V. (2016). "Features motion activity of primary school-aged children". *Sports Bulletin of the Dnieper*, 3, pp. 39-42, (in Ukr.): [http://www.irbis-nbuv.gov.ua/cgi-bin/irbis\\_nbuv/cgiirbis\\_64.exe?I21DBN=LINK&P21DBN=UJRN&Z21ID=&S21REF=10&S21CNR=20&S21STN=1&S21FMT=ASP\\_meta&C21CO M=S&2\\_S21P03=FILA=&2\\_S21STR=svp\\_2016\\_3\\_9](http://www.irbis-nbuv.gov.ua/cgi-bin/irbis_nbuv/cgiirbis_64.exe?I21DBN=LINK&P21DBN=UJRN&Z21ID=&S21REF=10&S21CNR=20&S21STN=1&S21FMT=ASP_meta&C21CO M=S&2_S21P03=FILA=&2_S21STR=svp_2016_3_9)

Kashuba V. & Goncharova N. (2010). "Assessment of the physical state: problems, solutions". *Sports Bulletin of the Dnieper*, 2, pp.120-123, (in Russ.): file:///C:/Users/TEMP.UNI-SPORT.001/Downloads/svp\_2010\_2\_36.pdf

Krutsevych T., Andrieieva O. (2013) "The theoretical basis of research of physical recreation as a scientific problem" *Sports Bulletin of the Dnieper*, 1, pp. 5-13, (in Ukr.): [http://nbuv.gov.ua/UJRN/svp\\_2013\\_1\\_2](http://nbuv.gov.ua/UJRN/svp_2013_1_2)

Olefrenko K.O. (2013). "A healthy lifestyle means of Ukrainian national dance in primary school children" *Visnyk Chernihiv's'koho natsional'noho pedahohichnoho universytetu. Pedahohichni nauky* [Bulletin of the Chernihiv National Pedagogical University. Pedagogical Science], 112.3, pp. 267-269 (in Ukr.)

Pyechka L. (2016). Continuity in the kindergarten and primary school in the implementation of the contents of laying the foundations of individual value attitude to their own health. *Journal of Vasyl Stefanyk Precarpathian National University*. Vol. 3, 2-3 (2016), pp. 106-113.

Sainchuk O. M. (2015) Prohramuvannya fizkul'turno-ozdorovchychykh zaynyaty skandynavs'ka khod'ba u fizichnoho vikhovanni molodshyy shkolyariv: *dys. ... kand. nauk z fiz. vykh ta sportu*[Programming of Nordic walking fitness classes in physical education of primary schoolchildren: PhD diss.]. Kiev. 233 p.(in Ukr.).

Vitchenko A.M. (2013). "To the problem of health preservation and strengthening primary school pupils by the methods of breathing exercises" *Visnyk Chernihivs'koho natsional'noho pedahohichnoho universytetu. Pedahohichni nauky* [Bulletin of the Chernihiv National Pedagogical University. Pedagogical Science], 108.2 (in Ukr.): [http://nbuv.gov.ua/UJRN/VchdpuP\\_2013\\_2\\_108\\_7](http://nbuv.gov.ua/UJRN/VchdpuP_2013_2_108_7)

Voronin D.Ye. (2006) *Formuvannya zdorov'yazberihayuchoyi kompetentnosti studentiv Vyshchych Navchal'nykh Zakladiv zasoby fizychnoho vykhovannya: dis. kand. ped. nauk* [Formation of competence of health-forming college students by means of physical education: PhD diss.].Melitopol. 222 p. (in Ukr.).

## Contents

<b>Bashirova, D.M., Burtseva, E.V.</b> -Thinking and game attention developing methods among 12-13 years old athletes, engaged in table tennis.....	3
<b>Bordei Alexandru-Silvian</b> -Performance prediction using the method of standardization, at swimmers.....	6
<b>Buiucliu Ștefan, Breană Bogdan</b> -The coaches' vision regarding the share of psychic features in the selection and training for individual and team sports .....	12
<b>Nadejda Bushueva</b> -The selection of children for the field and track athletics classes based on the indexes of physical development .....	20
<b>Felegeanu Constantin-Cosmin, Sburlan Irina</b> -Study on the importance of improving passing game with both feet to improve performance in football .....	25
<b>Gavrilo Aleksej</b> - Biomechanical markers dynamics in qualified powerlifters under the influence of a power load.....	31
<b>Gheorghe Marian Ciprian</b> -Study on the development of quality driving force of iii level swimmers.....	35
<b>Layzan Ksenia</b> -Model characteristics sports- technique indicators free programs young single skaters .....	39
<b>Severin Alina</b> -Developing mobility of child swimmers .....	42
<b>Constantin Dan, Săcuiu A.I., Tănase T.B., Vernescu M.F</b> -The analysis of marking and dispossession to the level of the teams from play-out and play-off.....	48
<b>Roman Iordan, Felegeanu Constantin</b> -Assessment of the coaches' opinion on the use of the questioning method in training 11-12-old football players .....	53
<b>Sokolov Sergei</b> -Physical training of futsal players during preparation period.....	61
<b>Tachev Tomi</b> -Analyzing the match between the teams of Bulgaria and France. Semifinal of European Championship 2015 in Bulgaria.....	65
<b>Terekhin Vladimir</b> -Design of model characteristics of elements on the basis of the complex biomechanical analysis of movements in acrobatic rock'n'roll .....	69
<b>Yampolskiy Alexey Sergeevich</b> -Individualization of the training process in command sports (on the example of handball) on the basis of the .....	73
<b>Zibrova Ekaterina</b> -Influence of two sides of skill of highly qualified figure skaters upon evaluation of their competition programs .....	79
<b>Goncharova N., Nosova N., Butenko H.</b> -Experience of implementing health-forming technologies into physical education of primary-aged school children.....	83
<b>Rusănescu Alina-Gabriela</b> - The use of information and communication technology means in physical education and sports classes .....	89
<b>Rusu, O.H., Rusu, R.G.</b> -The relation between the class of physical education and the selection for football training with the purpose of developing the general motricity for 7-8 year old pupils .....	93
<b>Ionescu Gheorghe Drăguț</b> -Physical training in down syndrom judo athletes .....	96
<b>Boncheva, M.D. Vladova, I.</b> - Methodical requirements to ensure safety in lessons in physical education and sport .....	101
<b>Cebotaru Veronica</b> -The development of motor qualities of secondary school students in physical education lessons with football themes .....	107