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# INTRODUCING CHILDREN OF PRIMARY SCHOOL AGE WITH THE WORLD

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## ABSTRACT

Natural science education in primary general school is built on the basis of the principles of humanism, individualization, systematic and consistent, integrity, variability, information support of the pedagogical process. The main source of formation of the content of natural science education is directly natural science and the current level of its development.

This article reveals the main didactic provisions on continuity, the connection of natural science education with biology, physics, geography, astronomy, ecology, on the formation of individual research skills in younger students during the study of the integrative course "Natural Sciences".

## **KEYWORDS**

Readiness and ability of students, natural science education in elementary school, familiarization of primary school children with the outside world, integration of concepts, knowledge, skills, skills and abilities of labor activity, biology, physics, geography, ecology, chemistry, natural sciences.

### **INTRODUCTION**

The goals of natural science education in elementary basic schools are determined by the state educational standard for elementary general education, which is a set of requirements that are mandatory for the implementation of basic educational programs for elementary general education. The standard establishes requirements for the results of students who have mastered the basic educational program of primary general education: personal, including the readiness and ability of students for self-development, the formation of motivation for learning and cognition, value-semantic attitudes of students, reflecting their individual and personal positions, social competencies, personal qualities; the formation of the foundations of civic identity; meta-subject, including universal learning activities mastered by students (cognitive, regulatory American Journal Of Applied Science And Technology (ISSN – 2771-2745) VOLUME 03 ISSUE 06 Pages: 09-14 SJIF IMPACT FACTOR (2021: 5.705) (2022: 5.705) (2023: 7.063) OCLC – 1121105677

and communicative), ensuring the mastery of key competencies that form the basis of the ability to learn, and interdisciplinary concepts; subject-based, including the experience, mastered by students in the course of studying the subject area, of activity specific to this subject area for the acquisition of new knowledge, its transformation and application, as well as the system of fundamental elements of scientific knowledge that underlie the modern scientific picture of the world.

Natural science education in primary general school is built on the basis of the principles of humanism, individualization, systematic and consistent, integrity, variability, information support of the pedagogical process. The main source of formation of the content of natural science education is directly natural science and the current level of its development.

Long-term research on the problem of familiarizing children of primary school age with the outside world has confirmed the conceptual idea that the priority goal of education at this age stage is the formation of the child's personality, his mental and social development.

The practical implementation of this goal at the present stage requires fundamental changes regarding all components of the methodological system: content, methods, means and forms of organization of training.

In the content of the natural science component of primary education, a number of leading content lines are distinguished: mastering the methods of cognition of the surrounding world; work with models; characterization of objects of reality, connections and dependencies; awareness of oneself as a biological, mental and social being; realize the need for a healthy lifestyle and life safety as conditions for a prosperous existence of a person; skills and abilities of labor activity; labor in nature includes seasonal labor in nature available to children, caring for plants and animals in a living corner, growing plants. Therefore, the content of these areas is quite fully covered by various forms of school science education, both basic and additional.

In the modern world, the vast majority of sciences are studied through a comprehensive review. At the same time, the most effective way of cognition is associated with the assimilation of the relationships between objects. The problem of intration and ways of its implementation is still relevant in the theory and practice of primary education. Integration in education acts as a natural interconnection of sciences, academic disciplines, sections and topics of different academic subjects, aimed at a consistent and multifaceted disclosure of the processes and phenomena being studied; There are three levels of integration of the content of educational material: intra-subject (integration of concepts, knowledge, skills, etc. within individual academic subjects); interdisciplinary (synthesis of facts, concepts, principles, etc. of two or more disciplines); transpositional (synthesis of components of the main and additional content of education). The integration process requires certain conditions to be met; the objects of study coincide or are close enough; integrable subjects use the same or similar methods of research; they are built on common patterns and theoretical concepts.

The real way to implement integration in teaching is integrated lessons, where one or another problem most often acts as the basis for integration, the isolation of which and passing through fairly local material does not cause significant difficulties for teachers. An integrated lesson is characterized by the following features: the existence of a basis for



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integration (problem, theory, object of study); an integrated approach to the selection of educational content; the choice of a form of conducting a lesson adequate to the content, which ensures the development of different spheres of the personality. The systematic conduct of integrated lessons of the surrounding world provides an increase in the level of knowledge on the subject, which manifests itself in the depth of the concepts being assimilated, the disclosure of patterns due to their multi-factorial interpretation using the information of the sciences being studied; at the same time, the formation of the ability to establish connections between objects, phenomena and processes of the surrounding world, as well as a positive attitude towards the subject takes place. It is necessary to note the developing possibilities of the integrated lesson.

Firstly, it allows you to implement one of the most important principles of didactics - the principle of systematic training (if the complex of educational corresponds to integrity, material structure, interdependence, hierarchy, plurality). Secondly, it creates optimal conditions for the development of thinking (the ability to abstract, the ability to highlight the main thing, draw analogies, analyze, compare, generalize, etc.), thereby developing logic, flexibility, criticality. Thirdly, it contributes to the development of systemic worldview, harmonization of the а personality of students.

The unity of the world in all its manifestations serves as the philosophical basis that makes us talk about the need for integrated courses at certain stages of schooling. In the primary grades, we present a holistic picture of the world, reveal the general, global interconnections of astronomical, geographic, biological, historical and other knowledge in their unity and interpenetration (when, according to L.V. Zankov,



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"the knowledge of students is characterized by pronounced differentiation, and they receive a detailed scientific obscene in separate subjects"), this course, which holistically represents the Natural Sciences, gradually "breaks up" into separate subjects by the 7th grade.

The didactics of preparing and conducting an integrated lesson when studying the subject "Natural Sciences" in the primary grades involves:

1) a clear definition by the teacher of the purpose of conducting interactive lessons. In our opinion, the general objective of intefaciation is to form in students a holistic view of the world around them, a certain style of thinking that allows them to see objects, phenomena, processes in their interconnection and system, starting from primary school age. At the same time, each lesson has its own specific goal and tasks set from the point of view of integration;

2) transformation of the content of the studied material. We propose to build customized lessons on the basis of the available subjects of a particular year of study in elementary school.

To design integrated lessons, it is necessary to analyze the primary school programs in various subjects, identify the same topics, combine them from the position of the leading idea and leading provisions;

3) in accordance with the new approach to the content of the material being studied, there is a revision of the methods and means of teaching, forms of organization of educational activities of students, since the integration of knowledge involves a detailed study of all units of educational material included in the topic of this lesson. Based on the purpose and objectives of the integrated lesson, the choice of methods and means of teaching is determined by the need for a complete,

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comprehensive and in-depth disclosure of each component of the content of the material being studied.

Thus, the systematic conduct of integrated lessons of the surrounding world provides an increase in the level of knowledge on the subject, which manifests itself in the depth of the concepts being assimilated, the disclosure of patterns due to their multi-faceted interpretation using the information of the sciences being integrated.

At the same time, the formation of the ability to establish connections between objects, phenomena and processes of the surrounding world, as well as a positive attitude towards the subject takes place.

As already noted, natural science is specific. Its development potential is enormous and still underestimated. They come from the specifics of the natural nature of the world in which we live and from which we came out, in which we have deep genetic roots. However, didactic support for the assimilation of educational material and the development of the child's personality faces certain problems and contradictions, as well as difficulties associated with their resolution in primary school. The most important problem in the natural science education of younger schoolchildren is the problem of clearly identifying the object of children's cognition. Natural science in elementary school is characterized by the fact that the object of children's knowledge is the world of real-life objects and natural phenomena. However, there is a paradox leading to certain consequences. It manifests itself in the fact that in the methodology of elementary natural science (for example, in textbooks for students), thoughts about the object of children's knowledge do not sound clearly and definitely. Intuitively, it is understood that children study nature.

The meaning of the words natural science, natural history speaks for itself, and teachers-methodists dealt with them quite easily and with will. Earlier in the first years of education, children got acquainted with the outside world. This separate subject had the same name, and the teaching methodology "Natural Sciences" was attributed to the methodology of natural science, without dividing nature into natural and socialized.

Indeed, the world of nature and the world of culture coexist together. To separate them is to impose artificial restrictions. In this sense, the complex concept of the surrounding world is expedient. Only the accents should be different.

Nature is primary, culture is a consequence of its development. This is where the basis of the natural science content is formed. Its center must be natural. But in the world of natural nature it is necessary to show the world of socialized nature not as a selfcontained component, but as dependent on the natural world. So, school natural science is a subject in which schoolchildren should learn about natural nature and the various manifestations of socialized nature in it.

Nature is an object of knowledge. This must be defined clearly and unambiguously.

It should be noted that there is another problem: the creation of integrative courses is gradually blurring the boundaries of natural science as a special subject of natural nature. Primary natural science - the only subject about the natural world - is also taught in the aspect of the study of socialized nature.

The discussion about the need for natural science was conducted at the beginning of the last century, and it was determined that the initial natural science should



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exist as a separate subject. Its importance has been emphasized by many educators. However, the term "primary natural science" did not exist in primary education at all, and is now being integrated, while losing the intrinsic value of the science of real natural nature.

To the problems outlined above, there is a problem connected with the fact that the concept of the surrounding world is too voluminous in structure. Even if there were simply "natural science", then its astronomical fullness already exists here. And the world of culture has also been added to it. So the school subject runs the risk of "choking" in the information. Is it possible to solve the problem that has arisen? Obviously, it is possible if we agree on what exactly children should learn in a school subject with a certain name. Thus, in our opinion, two questions are still unresolved in the methodology of elementary natural science: how to name this school subject now and according to what laws to select content for it? We are firmly convinced that natural science under the same name should remain in school. History has shown that since the middle of the 19th century. it was removed from education more than once, but it reappeared and revived.

"Natural sciences" is a relatively new subject for elementary school, which integrates natural science and social science knowledge in order to form a holistic view of the world around and the place of man in it in elementary school students. The course is aimed at the integration, socialization and greening of knowledge. The subject "Natural Sciences" was introduced to elementary school in accordance with the basic curriculum of 2020. A significant difference between this academic subject and its "predecessors" - natural science and history - is a broad integration, built on the



basis of the inclusion in this academic subject of natural science, sociology, history, informatics, life safety.

By means of the subject "Natural Sciences" the problem of intellectual readiness of children for cognitive activity in elementary school is solved. In this case, the development of a visual-schematic form of thinking and mental operations, independence and activity of thinking, the formation of cognitive interests, which have a great incentive effect on the process and result of learning, are of great importance.

The participation of younger students in the process of research on the subject "Natural Sciences", the acquisition of knowledge forms such skills that will be transferred to other subjects of study and become personal neoplasms.

The most important component of natural science education during the implementation of the course "Natural Sciences" is the ecological component, during the implementation of which an eccentric type of ecological consciousness is formed in primary schoolchildren as a system of ideas about the world, which is characterized by focus on environmental expediency, the absence of opposition between man and nature; perception of natural objects as fullfledged subjects, partners in interaction with a person; balance of pragmatic and non-pragmatic interaction with nature.

Thus, the didactic potential for the development of the personality of a junior schoolchild in the process of mastering the surrounding world lies in the possibility of forming a scientific worldview, a holistic scientific picture of the World, the development of thinking, cognitive interests, natural curiosity, intellectual readiness for cognitive activity, skills of educational research, and as well as the socio-ecological culture of  

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the younger schoolchild, his emotional and value attitude to the world around him.

### REFERENCES

- Артемьева В.В. Использование компьютерных технологий в формировании естественнонаучных знаний у младших школьников // Известия Российского государственного педагогического университета им. А.И.Герцена. 2007. -№ 16(40). –С. 325-331.
- Денисенко Р.Н. Модель формирования у младших школьников эколого-валеологической культуры в процессе изучения окружающего мира // Оздоровление средствами образования и экологии. Материалы V- междунар.научпракт.конф. Челябинск, СПб. Изд-во ЧГПУ, 2007. –С. 195-200.
- Матвиеева. М.М. Система дидактического обеспечения как фактор развития естественнонаучных представлений об окружающем мере в начальной школе // Актуальные проблемы современного образования: опыт и инновации. – сб.матер. II-науч.прак.конф. с межд.участием. – Ульяновск, 2011. – С. 363-367.
- Элмуратова Д., Каримова С. Кичик мактаб ёшидаги ўқувчиларни табиий билимларини узвий ривожлантириш // Узлуксиз таълим -№ 6. 2022 й. –Б.
- Kharaxonova L. M. Specific aspects of media education and its use in high schools //Academic research in educational sciences. – 2021. – T. 2. – №. CSPI conference 3. – C. 278-284.
- 6. Карахонова Л. М. Эффективное использование электронных образовательных ресурсов в обучении биологии //Наука и образование сегодня. – 2020. – №. 6-1 (53). – С. 41-42.
- **7.** Джураев Р. Х., Карахонова Л. М. Педагогическое сопровождение одаренных детей

образовательными учреждениями //Integration of science, education and practice. Scientificmethodical journal. – 2022. – Т. 3. – №. 4. – С. 66-70.

 Караханова Л. М. Новые интерактивные электронные ресурсы в современном открытом образовании в обучении естественных наук //Academic research in educational sciences. – 2021. – Т. 2. – №. CSPI conference 1. – С. 1303-1305.

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