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MODERN CHALLENGES AND PROSPECTS OF FORMING ENVIRONMENTAL AWARENESS OF STUDENTS-GEOGRAPHERS

***Abstract. The purpose** of the article is to study one of the important problems of our time – the formation of environmental awareness and increasing the effectiveness of formal environmental education in higher education institutions, which is due to the current needs of society.*

***The research methods** are based on a combination of structural-functional and scientific approaches. The first allows us to identify the structural components of environmental education programs and determine their role in the formation of environmental awareness of geographers. **The scientific novelty** lies in the study of the formation of environmental awareness during the study of environmental disciplines by students of the first (bachelor's) level of higher education in specialties 014 "Secondary Education (Geography)" and 106 "Geography" of the Faculty of Geography of the State Higher Educational Institution "Uzhgorod National University". A description of the educational disciplines of ecological content and their inclusion in the cycles of general and professional training, both mandatory and elective components of educational programs, is given. **Conclusions.** The theoretical and methodological directions of the study of ecological knowledge are outlined and a comparative analysis of educational programs by specialties and 106 "Geography" and 014 "Secondary Education (Geography)" is carried out regarding the presence and volume (in credits) of disciplines of an ecological profile. The article also considers the role of educational and production practices in the formation of students' environmental awareness through the practical application of knowledge in ecology and the development of ecological thinking at the final stage of continuous environmental education in higher education. Special attention is paid to the problems and prospects of implementing a competency-based approach in modern pedagogy of teaching ecology, which contributes to the formation of practical skills and abilities of future teachers for effective work in geography and natural science lessons.*

***Key words:** environmental awareness, formal environmental education, geography, educational program, ecological discipline.*

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СУЧАСНІ ВИКЛИКИ ТА ПЕРСПЕКТИВИ ФОРМУВАННЯ ЕКОЛОГІЧНОЇ СВІДОМОСТІ СТУДЕНТІВ-ГЕОГРАФІВ

***Анотація. Мета** статті полягає в дослідженні однієї з важливих проблем сучасності – формування екологічної свідомості та підвищення ефективності формальної екологічної освіти в закладах вищої освіти, що зумовлено актуальними потребами суспільства.*

***Методологія** дослідження ґрунтується на поєднанні структурно-функціонального та наукового підходів. Перший дає змогу виокремити структурні компоненти навчальних програм екологічного спрямування і визначити їх роль у формуванні екологічної свідомості географів.*

***Наукова новизна** полягає в дослідженні формування екологічної свідомості під час вивчення дисциплін екологічного спрямування здобувачами першого (бакалаврського) рівня вищої освіти за спеціальностями*

014 «Середня освіта (Географія)» та 106 «Географія» географічного факультету ДВНЗ «Ужгородський національний університет». Подано характеристику навчальних дисциплін екологічного змісту та їх включення до циклів загальної та професійної підготовки, як обов'язкових, так і вибіркових компонентів освітніх програм.

Висновки. *Окреслено теоретико-методологічні напрями дослідження екологічних знань і здійснено порівняльний аналіз освітніх програм за спеціальностями та 106 «Географія» та 014 «Середня освіта (Географія)» щодо наявності та обсягу (у кредитах) дисциплін екологічного профілю.*

У статті також розглянуто роль навчальних і виробничих практик у формуванні екологічної свідомості здобувачів вищої освіти через практичне застосування знань з екології та розвиток екологічного мислення на завершальному етапі безперервної екологічної освіти у ЗВО. Особливу увагу приділено проблемам і перспективам упровадження компетентнісного підходу в сучасну педагогіку викладання екології, що сприяє формуванню практичних умінь і навичок майбутніх учителів для ефективної роботи на уроках географії та природничих дисциплін.

Ключові слова: *екологічна свідомість, формальна екологічна освіта, географія, освітня програма, дисципліна екологічного спрямування.*

Problem statement. The current state of development of society in each country requires environmental awareness of citizens. The environmental threats that humanity faces today are largely a consequence of the insufficient level of environmental culture of previous generations. Ukraine, both today and in the future, needs highly qualified specialists with an ecological worldview. This necessitates the need to form eco-centric thinking in students of geographical faculties as future specialists in natural sciences – geographers and teachers. According to the strategies of sustainable development of society [10], the formed ecological and social consciousness, which develops through the mastery of environmental disciplines, will determine not only the professional value orientations of future specialists, but also their lifestyle, level of culture and intellectual development.

Analysis of recent research and publications. The field of study of ecological culture and the formation of ecological thinking is studied by scientists of both natural and social sciences. Thus, V. Bekh [3] focused on the study of ecological competence as a component of professional training of specialists in the higher education system, O. Zhurba [4], I. Feketa [13] studied the formation of students' ecological culture in the process of studying natural disciplines.

Aspects of professional training of future geographers are revealed in the studies of Ukrainian scientists – O. Chubrey [14], V. Yavorska, M. [15]. A significant contribution to the study of the role of ecological competence in the training of future specialists was made by Ya. Absalyamova [2] O. Mateyuk [6], O. Prutsakova [11], N. Ridey and S. Tolochko [12]. For scientists and researchers, it is important to determine the correct approaches to the formation of environmental awareness not only as an indicator of the level of knowledge, but also as a factor in the formation of a holistic society and the ability to apply this knowledge in future professional activities.

The purpose of the article is to study the formation of environmental awareness of applicants for the first (bachelor's) level of higher education in specialties 106 "Geography" and 014.07 Secondary Education (Geography) of the Faculty of Geography of the State Higher Educational Institution "Uzhhorod National University", analyzing subject competencies in mastering environmental disciplines.

Presentation of the main material. Environmental awareness, which is based on the principles of the Strategy for Sustainable Development of Society, which are reflected in the Action Program "Agenda of Humanity for the 21st Century" [10 should be the basis for the life of a modern person. Environmental awareness is not only about the present, it is also about the future. The formation of environmental awareness occurs primarily through the mechanism of formal environmental education in the system of higher educational institutions. During the mastering of environmentally oriented disciplines, higher education applicants gradually form environmental knowledge, which, having become specialists, can be implemented in practice.

Educational programs of specialties 014 "Secondary Education (Geography)" [9] and 106 "Geography" [8] of the Faculty of Geography of the State Higher Educational Institution "Uzhgorod National University" contain a complex of educational and elective components of the environmental direction.

The program results of training students of these specialties determine the understanding of the cause-and-effect relationships of the development of society, as well as the awareness of current trends as impossible without environmental knowledge.

The formation of environmental awareness in higher education institutions is given considerable attention, however, the issues of studying its practical component still remain insufficient. In this regard, the article considers the features of the formation of environmental awareness in students-geographers.

Higher education institutions provide in-depth assimilation of environmental knowledge based on various approaches and methods. This contributes to the formation of environmental awareness in students, which involves a responsible attitude to the study and preservation of the environment, rational use of natural resources, as well as awareness of the role of man in the system of interaction with nature. Environmental education in higher education institutions is developing in two directions:

– professional environmental education, which includes the training of specialists for various branches of the economy;

– normative basic discipline, mandatory for representatives of all specialties [1].

In higher education institutions, environmental education appears as a logical continuation of the knowledge obtained in preschool and school institutions, performing the role of a formal component, while being supplemented by the influence of family values, cultural traditions and the media as sources of informal education. Environmental awareness is a dynamic phenomenon and can change throughout life, and an important role in this process is played by environmental knowledge that is formed both within the framework of formal and informal education [7]. Both paths – formal and informal – remain important for the formation of environmental awareness.

Students of geographical specialties within the framework of continuous multi-level environmental education have the greatest opportunities for the development of environmental awareness. This is due to the fact that geography as a science covers a wide range of issues – from the study of natural geosystems of the planet to the study of socio-economic aspects of the functioning of society.

The formation of environmental awareness of students of geographical specialties is carried out due to the presence of normative basic disciplines of environmental content in the curricula. At the Faculty of Geography of the State Higher Educational Institution "UzhNU", the training of applicants for the first (bachelor's) level of higher education is carried out according to the educational programs of specialties 106 "Geography" and 014.07 "Secondary Education (Geography)", developed in accordance with the Law of Ukraine "On Higher Education" and the Standard of Higher Education of Ukraine for the bachelor's level [1].

The program 106 "Geography" is focused on the multidisciplinary training of specialists capable of performing professional and applied tasks in the field of geography, local history, territorial planning, taking into account the principles of sustainable development and rational use of nature. In turn, the program 014.07 "Secondary Education (Geography)" is aimed at training geography teachers, specialists in the field of teaching methods of the subject in institutions of general secondary and extracurricular education. The purpose of these programs is to train highly qualified specialists who possess modern knowledge to solve problems both in the field of geographical science and in practical activities.

Both educational programs provide for the students to master ecological disciplines that are included in the cycles of general and professional training and are represented by both mandatory and elective components.

Analyzing the educational programs in the specialties 106 "Geography" and 014.07 "Secondary Education (Geography)", it can be noted that they contain mandatory components (MC) – the disciplines "Fundamentals of Ecology" and "Fundamentals of Ecology and Human Ecology".

At the same time, in the program 014.07 "Secondary Education (Geography)" these disciplines are classified as a general, not a professional training cycle. In addition, students have access to a significant number of elective components (EC): 10 disciplines in the program 014.07 and 6 disciplines in the

program 106 “Geography”. This allows applicants to choose subjects according to their interests, but it is worth noting that in practice, preference is often given to specialized subjects.

Regarding the credit ratio, environmental disciplines among the mandatory components account for 1.66% in the program 014.07 Secondary Education. Geography and 1.45% in the program 106 Geography, which together makes up about 2.2% of the total amount of credits in mandatory disciplines. Since geography is a natural science and is closely related to the study of the state of the environment, certain issues of environmental content are partially studied during the development of other specialized subjects.

An essential element of the professional training of students of both specialties is the training practices – “Topographic. Complex-geographic” and “Socio-economic-geographic”. Complex-geographic practice, which is conducted in the 1st year on the basis of the Carpathian Biosphere Reserve (in accordance with the cooperation agreement), allows students to apply the acquired theoretical knowledge in practice. It covers work with environmental protection topics, analysis of anthropogenic transformations of landscape complexes, assessment of the use of natural and demographic resources of the territory and identification of ways to optimize them.

Socio-economic-geographic practice is held in the 2nd year. Before the full-scale invasion of Russia into the territory of Ukraine, this practice, according to the cooperation agreement between the State Higher Educational Institution “UzhNU” and the Odessa National University named after I.I. Mechnikov took place on the territory of the Black Sea coast (Odesa and Bilhorod-Dnistrovsky). Now the internship takes place in the territory of the Transcarpathian region. Individual tasks of students include topics related to the analysis of the state of the environment and the factors of its changes. Here, such issues as: administrative-territorial division of the Transcarpathian region and its features are investigated. Economic assessment of natural conditions and resources of the Transcarpathian region. Population dynamics of the Transcarpathian region. Population density, natural growth and migration processes. Labor resources. Employment of the population of the region. General characteristics of the economy of the Transcarpathian region, its structure, level of development and place in the economic complex of Ukraine. Branches of specialization. Machine-building complex of the Transcarpathian region. Production relations. Products. Territorial organization of the economy of the Transcarpathian region: industrial nodes, centers, districts. Development of the recreational economy of the Transcarpathian region.

Thanks to this, students have the opportunity to work not only with geographical topics, but also analyze ecological-economic and ecological-social aspects of the development of the region.

In the third year, students of specialty 106 “Geography” undergo practical training, during which they deepen their knowledge in the chosen field of geographical science, master the methods of applied research, learn to collect, systematize and analyze literary, cartographic and statistical materials. Practical training includes conducting observations, sampling, laboratory analysis, surveys, questionnaires and other methods of obtaining primary geographical information.

The practice is carried out on the basis of cooperation agreements between the State Higher Educational Institution “UzhNU” and the Department of Ecology and Natural Resources of the Transcarpathian Regional State Administration, the Carpathian Biosphere Reserve, the National Natural Park “Synevyr” and other institutions. It is here that students gain practical experience in assessing the state of the environment – experience that is especially important for the formation of ecological thinking.

For students of the specialty 014.07 “Secondary Education (Geography)”, practical training is carried out in general secondary education institutions. It forms pedagogical competencies, in particular the ability to apply modern educational technologies, analyze the effectiveness of lessons and form subject competencies in schoolchildren. At the same time, the practice covers the explanation of the spatial differentiation of the geographical envelope, the description of the mechanisms of functioning of natural and social territorial complexes, the classification of the relationships between the components of the environment – all this creates a pedagogical-natural-ecological basis for the training of students.

Conclusions. According to the results of the study, it was found that the educational programs of the first (bachelor's) level of higher education in the specialties 106 "Geography" and 014.07 "Secondary Education (Geography)" of the Faculty of Geography of the State Higher Educational Institution "Uzhgorod National University" ensure the formation of eco-centric knowledge in students through subject competencies. At the same time, the analysis of the credit load of ecological disciplines showed their insufficient share among the mandatory components, which indicates the need to expand this block. It is advisable to transfer a number of environmentally oriented courses to the list of mandatory ones in order to ensure the systematic formation of ecological awareness, skills and practical skills in geography students necessary for further professional activity.

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