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MONITORING OF THE HIGHER EDUCATION QUALITY AS AN OBJECTIVE NECESSITY OF THE EDUCATIONAL SYSTEM INNOVATIVE DEVELOPMENT

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ABSTRACT

The theoretical framework for monitoring of the higher education quality was reviewed in the article. The types, principles, tasks and functions of monitoring were systematized, also the evaluation and diagnostic criteria for the assessment of quality in higher educational establishments were specified. The authors determine the main approaches of improving the higher education quality in increasing the level of applicants training, conducting career guidance to future specialists in a certain branch, increasing the motivation of all educational process participants, improving the high school logistical support, further informatization of the educational process, its availability, transparency and openness of its results, development of scientific and pedagogical stuff competence.

Keywords: higher education, quality of education, criteria, monitoring, diagnostic and evaluation procedures.

Problem setting. The entry of Ukraine into the European educational and scientific space determines the strategic objectives of higher education development — the integration into the international community while preserving and developing achievements and traditions of national high school, strict adherence to the principle of public responsibility, which involves training throughout life (LLL — LIFE LONG LEARNING), realization of right to qualification obtaining, extending knowledge and skills, acquisition of new competencies and personal growth [2; 12; 13; 18].

In this context, the issue on quality of education (QE) is of particular importance. Currently, monitoring is the mechanism that can ensure QE, which is defined in article 41 on the Draft Law of Ukraine "On Education" as a system of consistent and systematic measures to identify and study the tendencies of the quality education development in the country, in certain areas, educational establishments, conformity determining of educational activities actual results to its stated objectives as well as assessment of the degree, direction and causes of deviations from the goals [11].

Recent research and publications analysis. Various questions on QE and its monitoring are constantly in the focus of the scientific interests. Thus, the theoretical and practical problems of QE monitoring were thoroughly studied by T. Lukina [5; 6; 7], the issues on organizational and methodical support of monitoring the quality in secondary education were considered by O. Liashenko and co-authors [8], the pedagogical conditions of monitoring the educational achievements quality of students in non-state owned higher educational establishements were highlighted in thesis research by N. Baidatska [1], organizational mechanisms for the management of specialists training quality in pedagogical higher educational establishements were defined by O. Sakharchuk [14], the issues on higher education quality were considered by N. Selezniova [16] and S. Trapitsyn [17], the theoretical-methodological aspect of QE monitoring was discussed by L. Shchegoleva [15], the approaches

for assessing the quality of higher education were studied by T. Minakova [9], the structural and functional characteristics of the system approach in management of the basic educational programs quality for the higher educational establishements were presented by M. Chandra [3], the problems of QE evaluation in Ukraine in the context of public policy were analyzed by I. Yafonkina [19].

Paper objective. To analyze the questions concerning the theoretical framework for monitoring of the higher education quality, systematize the types, principles, tasks and functions of monitoring, determine the main approaches of improving the higher education quality.

Paper main body. However, the concept "quality of education" currently remains one of the most controversial in pedagogical theory. Ukrainian scientist O. Liashenko determined 6 specific characteristics that indicate the complexity of this pedagogical category: a) multi aspects of QE phenomenon, that is evidenced in the quality of the educational process final result, quality of staffing and resource capacity of education systems that achieve the intended purpose, the effectiveness of managerial decisions; b) multiple-level final results in the assessment of quality both according to the levels of education and level of the final goal achievement; c) the polysubjective assessments of QE, causing a different meaning of this term in various educational services consumers; d) multicriteria approach in evaluation of QE, depending on the purpose of monitoring and choice of criteria and indicators, invariance for specific monitoring studies (e.g., according to Standardized External Testing (SET) results) and the variability depending on the objectives and chosen assessment tools; e) polychronous evaluation of QE, which is achieved by comparison the current, tactical and strategic evaluations at different periods (e.g., the same individuals reevaluate the quality characteristics of their education in different periods of life or work activities); f) inconformity of QE evaluations to priority directions of state policy in educational systems reforming, introduction of subjectivity to the assessment of activity efficiency of managerial bodies and educational establishments[8, p. 12].

The necessity for monitoring of the higher education quality caused by numerous internal and external factors, such as: the maximal orientation to the consumer of educational services, long duration of training, close cooperation between various units of the educational establishment, the necessity to sustain a positive image of the higher educational establishment, awareness of the importance of effective management to ensure the competitiveness of certain educational establishment in the national and international arena, the necessity to expand the export market of educational services and exploring potential foreign partners.

Considering the above mentioned, the researches of the scientists [3; 17], who regarged that the system-based general-methodological approach was the most applicable for monitoring studies should be taken into account. The system-based approach enables to identify the totality of monitoring elements (structural units): subjects, objects, groups of assessment procedures, goals and methods of implementation and represent monitoring as an integral system, to characterize its systemic qualities and organization features.

Among monitoring systems classifications suggested by different scientists for theoretical research, the classification proposed by the S. Trapitsyn [17, p. 19] is the most applicable, in our opinion (see table 1).

Table 1

Types of monitoring	Characteristics
Dynamic monitoring	The data on dynamics of specific education system development (technical, pedagogical, medical) or its quality indicator (e. g., successful activities of graduates) become monitoring information. The main objective of such monitoring is prevention of possible risks; determination of the reasons has the secondary character. For example, the study of the educational subsystem of a particular educational establishment for several years enables to determine certain persistent negative tendencies, however, it does not provide explanation whether this situation is specific to this educational establishment or it is caused by the specific features of the certain education system (technical, pedagogical, medical) or provoked by the system of the higher level, i.e. education system in whole.
Competitive monitoring	The incentives for monitoring are the results of identical studies of other educational systems. Alias monitoring is the analogue of plan with multiple series of tests. The study of two or more systems of education, which are included in the higher level system, is carried out in parallel, using the same tools, concurrently, which gives reasons to conclude on effect value. The advantage of this approach is the possibility to evaluate the risk degree, its significance .
Comparative monitoring	The results of identical studies of one or several educational systems are analyzed.
Comprehensive monitoring	The combination of several reasons for monitoring. For example, for organization of monitoring for students' research work effectiveness at a particular educational establishment it is necessary to highlight the peculiarities of this work in whole that can be explained by the influence of the educational establishment specifics. Ergo, to assess the effect of student participation in research work it is necessary to obtain data on several educational establishments.

General principles of monitoring in education are the following [5; 6; 7]: a) the coherence of normative-legal, organizational and scientific-methodical support of its constituents; b) the objectivity of information obtaining and processing, which involves maximal elimination of subjective assessments, taking into

account all the results, formation of equal conditions for all participants in in the process of primary information acquisition; c) comprehensive evaluation of various aspects in the investigated process or object, processing and analysis of obtained results; d) the continuity and duration of observations on the object condition; the timeliness of obtaining, processing and use of information; the prospects of the planned monitoring studies, their focusing on solving of actual problems of society development; d) reflectivity, the analysis of the project activities and development results of the object at all levels, self-esteem and self-control on the part of all participants; e) humanistic orientation of monitoring – the creation of favourable conditions, positive climate, confidence and respect for the personality; f) the openness and timeliness of bringing research results to project managers, corresponding governing bodies, public and other interested parties.

Mostly, scientists define the following functions (with certain variations) of monitoring the higher education quality [1; 3; 15; 16; 17] (see table 2).

Table 2

Functions	Characteristics
Informative	providing objective, comprehensive, thorough information to administration bodies for making necessary managerial decisions; considering, that the subjects of monitoring are the administration body, teachers, students, staff and employers, the findings of the assessment procedures are of interest for each individual; openness of information for all participants of monitoring – discussion of its results at different levels (administration, departments, student groups) enables to provide feedback, creates a situation of confidence and preconditions for the acceptance of necessary changes by all interested parties, contributes to the formation of culture, oriented on definite educational activities results;
Diagnostic	provides a mechanism for monitoring and evaluation in management of educational process quality at higher educational establishment; this function is specified depending on the purpose of evaluation procedure: determination of the sufficiency level of the students' residual knowledge to state standards requirements, type of assessment (midpoint and final), its method (test, exam);
Comparative	information, accumulated in the process of evaluation procedures of the same type, allows to compare the results, identify the positive or negative dynamics of monitoring object; it enables to determine the strong and weak points of the educational process and, accordingly, define which aspect requires priority changes;
Prognostic	identification of opportunities for further organizational improvement of monitoring; determination of perspective ways in monitoring development; prognostication of expected results alias, setting of strategic goals and prospects of educational process improvement;
Managerial	administration body of the higher educational establishment not only makes decisions based on information analysis obtained through monitoring, but also participates in its organization;
Integrative	the results of monitoring as aggregate information obtained from all evaluation procedures, should be centrally analyzed and summarized, that in summā will enable to obtain a comprehensive assessment of the quality in effective and procedural components of QE, to reveal the framework connections between the subjects of monitoring, considering all factors that influence the quality of higher education

Monitoring involves the assessment of the quality: the applicants and students contingent; educational and professional programs; educational-methodical and material technical provision of the educational process; level of scientific and professionally-pedagogical training of teachers; the state of scientific-research works and their connection with the content of academic disciplines; the effectiveness of the educational process organization; knowledge, skills and competencies acquired by graduates during their studies.

The basic requirements that are put forward by the scientists [3; 14] to the organization of monitoring in the higher school are the following: a) analysis systemacity of the totality of criteria process quality and the result of professional training with simultaneous awareness of each individual subject value; b) objectivity of interpretation and evaluation that is achieved by sufficient representativeness and sample validity; c) certainty of observation rate, i.e. developed recurrence and repetitiveness of the same procedure under the same conditions, but at different time; d) synthesis of quantative-quantitative interpretation of the results; e) the unity of the external and internal aspects; f) graduality and increasing of

prognostication rate in the quality positive changes of all aspects of specialists training.

In this context, such recommendations by Yu. Fedorchenko [4] for monitoring of QE should be taken into account: 1) the importance of differentiation the policy of openness of the higher educational establishment and elements of unfair advertising while carrying out monitoring; 2) completeness and independence of monitoring from the public-political situation; 3) necessity to provide equal conditions for the higher educational establishments in cities and provincial ones to create positive competitive environment in the higher education system.

The main objectives of monitoring the quality of education in higher education establishments are clearly defined by M. Osiichuk and co-authors, these tasks are the following: development of indicators totality that provides holistic view of the educational process state, qualitative and quantitative changes in it; information systematization on the condition and progress of the educational process at the higher education establishment; providing of consistent and visual information presentation on the processes taking place in higher education establishment; information support of analysis and prognostication of the educational process condition and development, making managerial decisions [10].

All interested parties are monitoring subjects: the state as a social demander side, applicants as potential participants in the educational process, students and their parents, administration bodies of higher education establishments, scientific and pedagogical staff, educational support staff, employers (heads of the enterprises or institutions where the graduates will work), graduates as young specialists with higher professional education, and foreign partners of national higher education establishments.

The literature analysis on the studied issue enables to state that QE should be evaluated from the perspective of content, process and result, in other words, monitoring of educational process quality should cover content, processual and resultative components. Considering that monitoring is aimed at assessing the effective and processual components of educational process quality at the higher education establishment, the objects of monitoring should be [3, p. 106]: “the quality of applicants' potential”, “the quality of students' educational achievements”, “quality of graduates preparedness for professional activity”, “quality of conditions for students teaching in high school”, “the quality of conditions created in the higher education establishment for the activities of teachers and educational support staff.”

Criteria of quality in educational process organization of higher education

(the interpretation of the authors of the article (according to M. Chandra [3])

Table 3

Group of criteria	Criteria	Indicators
The quality of specialists training	The quality of applicants' potential	Results: centralized testing in the form of SET; entrance exams; pre-university education (for foreign students)
	The quality of students' educational achievements	Results: current progress of students; educational achievements of students in midterm assessment; interim assessment of educational achievements; residual knowledge of students on the studied academic disciplines in the form of licensing exams.
	The quality of the graduates' preparedness for professional activities	Results of the final attestation (state exams). Positive evaluation of quality of graduates' training and level of preparedness to professional activity by employers.
The quality of education process organization	The conditions quality created for the training of students in the high school	Positive evaluation: quality of academic disciplines teaching (based on the study of the students' opinions) by students; quality of the educational process by students and teachers.
	The quality of working conditions created in the higher education establishment for the teachers and educational support personnel	The positive evaluation of working conditions by scientific-pedagogical staff and educational support personnel.

Diagnostic and control-evaluation procedures that should be used for monitoring the quality of educational process in higher education establishment can be divided into two groups, which are presented in table 4.

Table 4

Diagnostic and control-evaluation procedures

Procedures			
Measurement of objective indicators in education quality		Expert assessment of quality – obtaining of feedback from the interested parties	
Traditional	Present-day		
Test Exam	Programmed control Rating system of evaluation of educational students' achievements Portfolio Final module control State exams	Questioning: identifies some average tendencies, represents the most successful and problem areas.	Focus group interview:enables to discuss the questionnaire results with the interested parties (dean's offices, departments, students)

Conclusions. The main approaches of improving the higher education quality lies in increasing the level of applicants training, conducting career guidance to future specialists in a certain branch, increasing the motivation of all educational process participants, improving the high school logistical support, further informatization of the educational process, its availability, transparency and openness of its results, development of scientific and pedagogical stuff competence. The efficiency of mentioned tasks solving is provided by monitoring of the higher education quality, which is the objective necessity for innovative development in any educational system and serves as an effective tool of management in educational process quality of higher school.

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