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# SELF-TEST AS A QUALITY ASSESSMENT MECHANISM OF UNIVERSITY EDUCATION PROGRAMS: MODERN REQUIREMENTS

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### *Abstract*

In this article we list the results of the study of the self-examination procedure conducted by higher education institutions (further - universities) and/or their structural units in relation to the various majors (educational programs) they implement. The study examines and establishes the main clusters (spheres) of self-examination, analysing which we assess the effectiveness, the correct implementation of a particular educational program (major) and its availability, demand, compliance with national and international educational standards at the state and public levels. The self-examination procedure, which involves systemic monitoring, collection and study of the received statistics on the major (educational programs), allows the university (or its structural unit) to establish the main positive aspects in the implementation of educational programs, assess the quality of the training offered to students, its compliance with modern requirements, its demand by society, as well as identify negative points, disadvantages and weaknesses that need to be modernized, improved and refined. At the same time, all these procedures can be carried out by the university (or its structural unit) without interference from any third-party organizations, state and non-state structures and institutions. Thus, in the course of the study, we come to the conclusion that having universities and/or their structural units self-examine on a systematic, planned basis, taking into account current trends and trends in the field of higher education and education as a public sphere of activity in general is highly efficient and necessary.

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**Keywords:** Higher education, major, educational program, elf-examination, structural elements of self-examination (clusters).



## **1. Introduction**

The relevance of the topic of the study is determined by the urgency and need to systematically monitor the quality of currently implemented higher education programs (Koshcheeva, 2011). It is obvious that the modern well-functioning higher education institution (further – university) is currently a university that implements its superior educational programs flawlessly, which in turn provides competitive levels of training of graduates who have mastered them (Aldakimov, 2017). Such higher education institutions implement training of specialists who meet not only state educational standards, but also standards of professional and public accreditation, as the latter determines compliance not only with state-run Russian standards, but also with the standards of foreign countries, European in particular (ESG-ENQA1), professional requirements, and demands of the labour market (Amanatsky, 2017; Sokolova, 2017). At the same time, professional public accreditation necessarily takes into account federal educational standard of the Russian Federation.

## **2. Problem Statement**

We need to note that the main goal of our research is to prove that thoroughness, comprehensiveness and criticality of self-examination, analysing the implementation of the respective major track by the university, provides an assessment of the quality of educational programs, as well as ensures trust of professional communities, other social groups and society at large in the areas of training (clusters of major tracks).

## **3. Research Questions**

Within the research, we will provide answers to the following questions:

- How is the self-examination mechanism implemented?
- What are the prerequisites to this process?
- Which constituent elements and blocks make up the self-examination process?
- How can we correctly research and determine the contents of structural blocks of self-examination?

## **4. Purpose of the Study**

The main goal of our research is to study the main components of the self-examination process conducted by the university (or its structural unit) concerning some of the majors it implements.

## **5. Research Methods**

The self-examination mechanism is implemented through internal audit (internal assessment) and is designed to determine the degree of compliance of the majors (or their clusters) to the relevant standards,

for example, standards of professional public accreditation, and priority directions of the development of the educational program (Mamyachenkov, 2018).

The self-examination process should be carefully planned, comprehensive and take a specified amount of time, based on the capabilities of the institution itself, as well as taking into account the readiness requirements of the organization to which such a self-examination report is submitted.

Structural unit of the university (further – university unit) implementing the major (cluster of major tracks) independently determines the timing and prepares a schedule for self-examination activities.

Completion of the main stages of self-examination is directly related to the systematic receipt and generalization of statistical indicators, which in the future will serve as documentary (material) proof of compliance with the information presented in the self-examination report.

In addition to fixing certain facts during self-examination, the university unit should:

- answer the question: "To what degree does a specific educational activity meet the requirements of certain standard, for example, the requirements of standards of professional public accreditation?";
- identify key strengths and weaknesses (spheres or blocks requiring improvement) of implementation of the major (cluster of major tracks);
- assess the adequacy of resources and identify the main reasons that prevent or limit the use of available resources, as well as hinder the possibility of attracting new funds that will improve the quality of training in the major in question.

At present, in order to ensure the effectiveness of the educational process, the university must clearly understand and define its policy in educational activities, namely form and adjust the goals and strategies of development of the necessary areas of training (Andreeva, 2017).

We need to note that modern educational policy should:

- in some way guarantee quality of the appropriate major;
- be accessible to the general public;
- ensure the functioning of an internal quality system, which will allow for the dynamic development and improvement of the educational process in the relevant areas of training;
- have criteria for assessing education policy to evaluate the system;
- include a developed system of monitoring the implementation of the main areas of educational policy.

By answering these questions within the framework of self-examination of the university (or its structural unit) it is possible to assess the compliance of the policy in the field of quality assurance to the development strategy of the university as a whole.

At the same time, we need to pay attention to which powers in the development, implementation and realization of quality assurance policy are given to such participants in the educational process as the leadership of the university, its scientific and educational workers and students, and also the structural units of the university (for example, departments, scientific schools, faculties (directorates) and others).

We need to note that we share the position of experts who believe that it is necessary to clearly understand which university units meet and implement the tasks of attracting large partners who provide employment of graduates in order to involve them in the development of a policy to guarantee the quality of educational programs of the university (Matveev, 2014). It is important to understand whether the views of such large partners are actually taken into account, and whether they are involved in the development of a policy to guarantee the quality of the major tracks involved.

Another important component of self-examination of the university's structural unit should be the study of volume and quality of the student-centred training.

Current trends in education indicate an acute need for student-oriented educational programs implemented by the university (Galaktionova, 2018). The methods through which major tracks are implemented should encourage students to take an active role in joint drafting, organizing and adjusting the educational process (Krichevsky, 2017).

The criteria for assessing the availability of effective student-oriented education are:

- taking into account the needs of different groups of students and presence of the opportunity to form an individual educational trajectory (individual curriculum) of mastering the educational program;
- using methods that encourage students to take an active role in the joint construction of the entire educational process by deans (directors) of faculties in the realization of appropriate majors;
- applying clearly defined criteria and the most objective procedures for assessing the results of training (forming competencies of students) that would correspond to the planned results of training, the goals of the major and its purpose (current, intermediate or final control);
- high level of awareness of students of the major track (implemented disciplines), the criteria and procedures for assessing the results of training (competences), exams, tests and other forms of control activities;
- availability of mechanisms of evaluation procedures for independent assessment of the results of educational programs (obtaining the necessary competencies) in the arsenal;
- ability to appeal and contest the results of the assessment of competences by students and the effectiveness of its implementation in practice, determination of how to respond to complaints of students.

By implementing the principle of student-centred learning, universities must provide:

- accounting and attention to different groups of students and their needs, considering their chosen individual major track (individual training plan);
- using different forms, methods, and approaches to teaching the material, taking into account the specifics of the discipline taught (Smith, 2014);
- applying a variety of pedagogical methods as efficiently and flexibly as possible;
- regular feedback from students used to obtain information about the techniques and methods of knowledge assessment, to adjust them if necessary;
- supporting the independence of teachers, while guiding, supervising and assisting them;

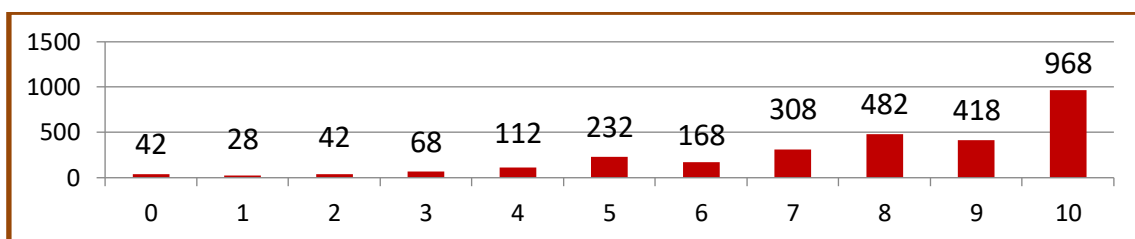
- strengthening the mutual respect between the teacher and the student;
- procedures for responding to student appeals and complaints.

Taking into account the importance of assessing students' performance for their future professional activities, assessment procedures should take into account the following:

- teachers doing assessment should be able to use pedagogical measurement techniques to guarantee the quality and validation of students' knowledge, systematically and periodically improve their qualifications in this area;
- criteria and methods of assessment should be available at the stage of the educational program, both in general and for specific disciplines;
- assessment should demonstrate to the trainees their level of achievement of the expected learning outcome;
- students should receive feedback from their teacher (curator) and, if necessary, advice on the process of mastering the educational program (discipline);
- exams should be conducted not by one examiner (if possible), but by several in order to increase the objectivity of the evaluation process;
- assessment should be consistent, objective to all the students and carried out in accordance with established rules and regulations;
- there should be a formal appeal procedure that allows for an objective re-examination of the outcome of the educational program (discipline).

Thus, we should note that student-centred learning plays an important role in increasing motivation, self-reflection and student involvement in the educational process. For higher education institutions, implementation and realization of student-centred teaching calls for a balanced approach to the development and teaching of the educational program within the specific major and evaluation of learning outcomes (Bezuglaya, 2017).

Illustrating these findings, we will provide the results of the survey of students of Krasnoyarsk State Agricultural University, conducted in 2019.



**Figure 01.** The distribution of answers to the question "How satisfied are you with the results of your education (exams, credits, grades)?"

The scale of possible responses ranged from 0 to 10, where 0–3 meant "completely dissatisfied," 4–6 – "somewhat satisfied," 7–10 – "completely satisfied"

Thus, according to the results of the survey results indicated in Figure 01, 2 176 students (75.9%) who took the survey are fully satisfied with the results of their studies, 512 students (17.9%) are somewhat satisfied with the results of the study and only 180 students (6.3%) who took the survey, are completely dissatisfied with the results of mastering their majors.

Taking into account the data obtained in Figure 01, we can conclude that the majority of the students of Krasnoyarsk SAU are satisfied with the results of their training, which indicates a well-functioning system of assessment, which meets the requirements of consistency, objective attitude in relation to all the students, and compliance with the established rules and procedures.

In addition, universities must have approved, published and consistently applied rules, regulating all periods of "lifetime" of students: admission, support and promotion of academic achievements (high performance of academic and other activities), recognition of qualifications (student certification system) and graduation.

Assessing this direction, we should take into account how the structural units of the university organize the following activities:

- systematic professional orientation activities aimed at preparing and selecting applicants (future students);
- systematic activities based on effective rules and procedures for admission, transfer of students from other universities, recognition of qualifications, periods of study and prior education of different levels of training of specialists;
- presence of systemic activities aimed to support (tracking (control) and analysis) academic performance of students;
- systematic activities ensuring that students can participate in mobility programmes at various levels, including international ones (Abdulkerimov & Esetova, 2010).

Analysing these statements, we need to note that the university's policy, the procedures, mechanisms and rules for admission of applicants or students from other universities, should be implemented as systematically and consistently as possible. At the same time, information support for this activity should ensure the accessibility and transparency of such processes. In addition, after admission to the university, the adaptation of students should allow for a comfortable and consistent acquaintance with the system of organization of all processes of the university, including the educational one, in the particular chosen major.

Undoubtedly, the procedures and mechanisms of admission, the recognition of academic achievements and their acknowledgment, the subsequent graduation of students, along with the educational program itself and the system of support for students, play an important role in ensuring the quality of education, especially if students are highly mobile both inside the country and beyond its borders (Zebnitsky et al., 2013).

Thus, the implementation of this line of policy of the university and its assessment within the framework of self-examination of the structural unit of the university will ensure gradual development of the academic career of students with respect to all their interests and characteristics, training areas, university, and higher education system as a whole.

Another important issue in the implementation of the self-examination procedure should be the question of the systematic work of collecting, analysing and applying information to increase the efficiency and effectiveness of managing majors, as well as other areas of its activities.

Assessing this work as part of a self-examination, the structural unit of the university should take into account:

- presence and effectiveness of the monitoring system and collection of information on each particular major track;
- participation of students and staff, including faculty members, in collecting, periodic monitoring and analysis of information for managing the major tracks, their modernization and adjustment;
- presence in the university (or its structural units) of the unified telecommunication information network, its effectiveness, the degree of introduction of modern information technologies in the management of the major tracks.

What information exactly is monitored and collected is determined by the type and nature of the educational mission of the university. However, any university (or its structural unit) must take into account the following components:

- information about the contingent of students;
- information about the levels of students' academic achievements, their expulsion and graduation;
- information about students' satisfaction with implementation of specific majors;
- information about accessibility of educational resources and various structures (services) of supporting and counselling students;
- information on the results of employment of graduates (information about the success of employment, problems with it, etc.);
- information about the most important (key, significant) indicators of the effectiveness of the university.

Moreover, various methods can be used to collect information. It is important that students and staff are involved in the collection and analysis of information, as well as in the process of subsequent adjustment of the educational process

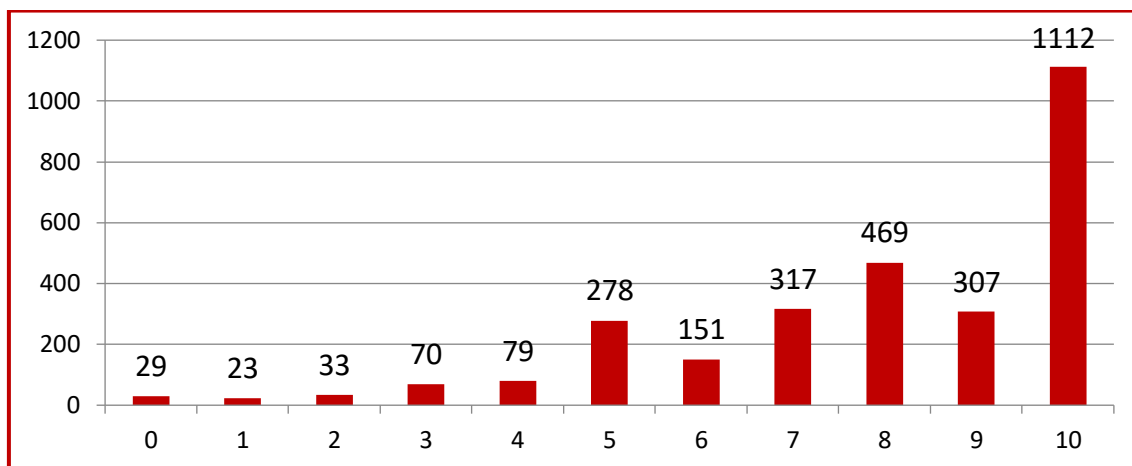
Universities (or their structural units) should use reliable information to assess the effectiveness of their work and make recommendations for improving educational activities. Educational organizations should have procedures for collecting and analysing information about educational programs and their activities and use this information in the functioning of the internal quality assurance system.

Illustrating these findings, we will provide the results of the survey of students of Krasnoyarsk State Agricultural University, conducted in 2019.

The scale of possible responses ranged from 0 to 10, where 0–3 was "completely dissatisfied," 4–6 – "somewhat satisfied," 7–10 – "completely satisfied".

Thus, according to the results of the survey indicated in Figure 02, 2 205 students (76.9%) who took the survey are fully satisfied with the chosen major, 508 students (17.7%) are somewhat satisfied with the

chosen major track and only 155 (5.4%) of those who took the survey are completely dissatisfied with the chosen training area.



**Figure 02.** The distribution of answers to the question "How satisfied are you in general with the chosen major?"

Accordingly, based on the data in Figure 02, we can conclude that in general students are satisfied with the major tracks implemented in Krasnoyarsk SAU. In addition, it is obvious that quality professional orientation work with future applicants has been done, as the satisfaction of students with the chosen direction is determined, among other things, by the correct primary choice of their major.

We believe that during self-examination, the structural units of the university also need to establish how, at what qualitative level, the public is being informed about the activities of the university (or its structural units), including in the appropriate area of training.

Undoubtedly, the requirements of the present times dictate the need for universities to systematically publish information about their work, both in general and in specific areas of training (Popova, 2014). The information provided should reflect the current and objective situation of the university and its educational activities, as well as be accessible to interested parties and the general public.

When assessing this requirement, we should consider:

- effectiveness and efficiency of the use of the university's official website to improve the quality of educational programs and training areas;
- presence of full, sufficient and reliable information about the appropriate major track, its achievements, prospects for development, etc. posted on the official website of the institute, as well as in the media;
- the availability of published reliable and objective information about employment and demand in the labour market of graduates in the appropriate major;
- the methods of integration and social environment used by the university, the methods used to interact with various professional associations, unions and other organizations, including foreign ones.



Thus, in today's society in the field of education, information about the work of the university is always in demand by applicants, students, university graduates, and other interested parties (primarily, potential employers) as well as a wide range of public groups, particularly parents of prospective students.

Accordingly, during self-examination of the structural unit of the university, in order to ensure the quality of education, they must determine the reliability, comprehensiveness, demand, effectiveness of the placement of information about their work, the expected results of the educational process, appropriate graduates' qualifications, teaching of relevant disciplines, evaluation procedures used, passing grades (assessments) and educational opportunities provided to students, as well as information on the employment opportunities provided to their graduates.

Another important component of the self-examination of the modern university (or its structural unit) should be the study of the availability of constant systemic monitoring and periodic assessments of the major tracks (or disciplines included in them), the functioning mechanism of feedback (polls, interviews, questionnaires of applicants, students, and key employers to ensure that the goals are met, to assess compliance with the current needs of students, and ultimately to the public interests). The results of systematic monitoring and evaluation of these processes should contribute to the continuous improvement of major tracks. At the same time, information about planned and executed procedures (actions) should be available to all interested parties, as well as participants in the educational process.

## **6. Findings**

We should note that the information is analysed and content of the major is constantly adjusted and is brought in line with modern requirements. The introduced changes are published and become publicly accessible to all the participants in the educational process.

Thus, the constant monitoring, periodic evaluation and revision of educational programs contributes to the effective implementation of educational activities of the university as a whole and the creation of a favourable educational environment for students.

Accordingly, in a university that meets the modern requirements of the quality of education (Prokudina, 2017), the areas of training are systematically evaluated and reviewed with a certain frequency. Students and other parties interested in the educational process should be involved in this process, for example, employers (associations of employers), relevant ministries and departments, etc.

## **7. Conclusion**

Summing up the results of our study, we can draw the following conclusions:

- Self-examination carried out by the university or its structural unit allows to assess the quality of implementation of the studied areas of training, the compliance of educational programs with standards of various levels (international, federal, standards of professional public accreditation) critically, comprehensively, by analysing the respective clusters of educational activities.
- The results of self-examination, compiled in the form of a report using an established template can be used for accreditation, for example, for professional public accreditation.

- Credibility and accessibility of the results of self-examination of the structural units of the university allows to form trust, recognition of quality on the part of applicants, students, university staff, professional communities, other social groups and society as a whole, and the data presented in Figure 01 and Figure 02 confirm this conclusion.
- The main components to be evaluated in self-examination of educational activities are: educational programs, educational policy of the university, the university's policy on the quality of education, student-oriented education implemented in the university, the rules governing all periods of "lifetime" of students at the university, work on the collection, monitoring, control, analysis, evaluation and use of information on the majors to inform the public about the activities of the university.

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