MODERN EDUCATION UPGRADE
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Abstract. From the essential approach position, the modern educational organization formation and performance are considered in the article as a scientific-educational, learning, socio-cultural object that meets the society requests; the modern teacher education priorities and development directions are determined; the development of the modern pedagogical knowledge prospects is emerged, which are formed under the new education paradigm conditions, which are characterized by digitalization, networking, distance transmission of information, the subject's generation of all possible alternatives to reveal individual’s personal balance; the research process dynamics and methodological optics of a modern university is analyzed; the rational use of the teacher education available resources is discussed; the methodological practice and ways of the new practices subsequent multiplication in university education the system are reflected; the factors, affecting a modern subject education quality are established; the degree of the mediated product influence on the modern teacher university educational strategy implementation is determined; the training and educational tools of the marketable specialist are investigated; an approach is implemented that identifies a modern student in his/her development, which helps to determine the pedagogical matter motion state, to recreate a coherent picture of the available stocks and funds, necessary for the individual’s education at the qualitative.

Keywords: flexible management, didactic potential, artificial environment, media, education system development.
Introduction. The first decades of the XXI century became the dynamic changes time in the teacher education. The significant shifts have occurred in the domestic system of the teacher education: most teacher education institutions have become parts of the federal universities; the transition to a three-stage (bachelor's degree - master's program - postgraduate program) model of higher pedagogical education was completed. As a result of the legal and regulatory framework radical updating, the digitalization, the transition to project management and a significant expansion of the international contacts, the teacher education values, system and infrastructure is greatly changed.

The aim of this article: understanding the results and experience of the teacher education reformation; determination of the teacher education priorities and development directions; formation of a network community in the field of the teacher education.

To achieve this aim it is necessary to solve the following problems:
1. To identify the value priorities and tools for the teacher education development in the near and medium-term perspective;
2. To determine the priorities for the systems modernization and innovative activities practices in the field of the teacher education;
3. To develop the individualization and personification strategies of the teacher education.

Research methodology. The education has deep philosophical, historical and socio-cultural meanings, since the education is the national treasure; it is the cultural transmission in the society; it is the “soft power”; education’s mission is to invest in the human capital. The national teacher education development is an integral part of the society life: the implementation of the country's socio-economic policy, national projects, and training strategies.

Therefore, we ask ourselves: what is a modern educational organization, Russian higher school? We believe that a modern domestic university is a cluster of interdisciplinary and convergent studies in the field of humanities and sciences, successfully realizing federal, regional, local research projects, developing as an expert, scientific-methodological and educational center, which activity is aimed at solving the priority tasks of the modern domestic education.

In Russia many famous scientists are concerned with the determination of the teacher education development priorities and directions: the works of M. V. Boguslavsky, A. N. Dzhurinsky are devoted to the historical background study of the educational system formation; B. S. Gershunsky, N. D. Nikandrov consider the philosophical and methodological problems and principles of the education individualization in their works; E. V. Bondarevskaya, A. G. Bermus studied the main development strategies of the modern teacher education; the issues of the modern teaching staff training are reflected in the studies of L.V. Bykasova, V.V. Serikova; E. A. Antyukhova, P. I. Kasatkin study the research activities strategic management in the conditions of a pedagogical university; tools and models for the results assessing in the general and pedagogical education became the subject of study by S.A. Safontseva, L. B. Sharshakova, etc.

In our article the methodological regulations are: a method for predicting the modern educational organization functioning; a hermeneutic, essential, system analysis, which will help to identify the university teacher education mission in the changed conditions of the XXI century, consisting in transferring the composite knowledge to a subject and the formation of competencies demanded by the employer; in the educational process institutionalization; in the integration of the education subjects.

Conceptual approaches. We’d turn to the university teacher education phenomenon and vividly try to present the tools for creating the presenters of a new social reality (teachers who will
teach Homo Cognoscens); the human capital role and the potential of the teacher education; strategies for the teacher education individualization and personification; professional and personal identity, status and development of a teacher; the didactic potential of media, digital technology and artificial environments in the teacher education; the flexible management methods (Agile, Scrum etc.) in the project activities operation in the teacher education [20, p. 112].

A modern university is a platform for the most important scientific projects and new ways of research, it is developed successfully and efficiently in priority areas in the field of science and education; the quality of student learning is being improved continuously. The following factors affect the modern student education quality:

– the analysis and implementation of the national scenarios, allowing to implicate the advanced pedagogical experience in the domestic education system, is conducted by the university academic teaching stuff;

– the methodological practice reflection of teachers, students and the new practices subsequent multiplication of the academic teaching staff (ATC) in the educational process: cultural and educational research projects, implemented with the foreign partners participation; scientific and practical conferences with the international participation held with the aim of positioning the traditions of the Russian education, culture, science; “bridges construction” of youth humanitarian relations, assistance in the participation of the university foreign partners in organizing and conducting forums in the field of the cultural exchange [2, p.89].

The modernity urgent requirement is the expansion of horizontal subject-subject relations in the modern higher education. It can be innovative platforms created with the participation and with the direct scientific and methodological guidance of the university academic teaching staff. For realizing this initiative, basic departments curricula at children's health camps (CHC) are developed; camp counselors practical training passing is provided by students; agreements are signed between university and children's health camp about the basic department creation.

Thus, according to the results of the applications examination and with the purpose of creating conditions for the innovative projects and programs implementation, the innovative platform status was assigned to several schools in Taganrog for realizing the projects “Development and testing of models for the inclusion of children with complex combined disorders, including autism spectrum disorders, in municipal educational environment”; “Creating an integrated educational project for the children's giftedness development: kindergarten - school - university”, etc.

In order to improve the education quality and to develop innovative activities in educational organizations of the municipal education system in Novosibirsk, a network of innovative training platforms for students has been formed. The status of innovative platform in the following directions: “The practice of creating a positive image of an educational organization”, “Educational practices of inclusive education”, “Children with unlimited possibilities”, etc was given to MAEI secondary school No. 213 “Otkrytie”.

Kazan Federal University updates actively a school-university partnership, developing new forms of interaction between the Institute of Psychology and Education and the school. The basis for teaching practices were: MAEI "Secondary school No. 167 with enhanced study of individual subjects" in Sovetsky district of Kazan; MAEI “Gymnasium No. 10” in Aircraft Building District of Kazan; OSHI “IT Lyceum FSAEI of HE K (P) FU”.

Results.

Practice-oriented technology for assessing the education quality (Worldskills etc.) is one of the most important requirements for higher education in the 21st century. For a modern subject, it is necessary to form “soft skills” (students' project work), training through practice, and mentoring experience. Kazan Federal University developed an appropriate assessment of cognitive practice:
senior students of non-pedagogical specialties (economists, lawyers) were sent for practice to school, which led, for example, to the subsequent employment of IT specialists to computer science teachers; physicists to teachers of astronomy, etc.

For the successful process of the teacher education modernization in the university context, a modern university needs to consider a number of factors:

- predicting competencies that will be in demand in 10-15 years to eliminate potential conflicts of interests, that is employer - higher education institution [4, p.130];
- institutionalization of the educational process (the process of transforming new, episodic social practices, innovations into stable structures, operating for a long time);
- structuring the consciousness of a modern young man (behavioral and social skills while studying a university program, upgrading the level of subject’s mental competences) [14, p.72];
- taking into account the growing demands of parents to the education system (operational data possession: holding parents' meetings, the site of the electronic information and educational system (EIES), parents’ individual consulting);
- the popularization of the teaching profession (the dominant influence of the academic teaching staff corporate ethics, the use of the university administration regulatory powers, the application of anthropopractors and acmetechnologies of students’ personal and professional development; the methods of designing psychological and pedagogical activities [11, p. 108]; the sociocultural rehabilitation of children with disabilities through the occupational therapy [17, p. 201]; the use of art therapy methods in solving students’ personal problems [16, p. 244]; the implementation of the visualization method as a condition for increasing the educational and cognitive activity; the portfolio method as a means of upgrading the level of subject’s professional and personal development) [18, p. 41];
- the education process upgrade (objectively existing Internet of all life). The reality of today is subject’s reception of a significant part of information from the digital sources, i.e. this is the virtual communication development, a local network, telecommunications, data storage and processing capabilities, etc. That is why one of the ways to improve the education quality is to introduce modern information technologies into the educational process: presentation support of classroom studies; educational materials location on the university’s e-learning website; creation of own sites by teachers; pages of faculties, departments, teachers in social networks, etc. [6, p. 73];
- the implementation of an approach identifying the student in his/her development. In the modern university, the general space of education and culture is consistently strengthened, creative workshops in faculties are developed, projects related to local history, folk art, and the historical heritage preservation of the public of our country are realized;
- conducting the social surfing: taking into account the complex social context of students. In the learning process, students work out a mechanism for overcoming inequality as a way to equalize the chances of success for people from different social strata (social conditions, subject motivation, age, gender aspects, personality flexibility, transparency of the educational process, etc.) [5, p. 24];
- creation of an artificial environment. An environment is a surrounding having a configuration, a navigation system, its own information field, a development path, the potential for integration interaction; a structure with the properties of connectivity, integrity, controllability, depending on its saturation with various resources [8, p. 202].

The modern educational space is a combination of different environments: informational, scientific, aesthetic, creative, social contacting, cultural, etc. The educational environment of a university is a structure that includes several interconnected levels that are determined administratively, institutionally, socially, which allows:

a) to develop the motivational-semantic sphere of the subject;
b) to build the learning process based on the productive experience generation;
c) to differentiate the education, taking into account the formation and implementation of the individual educational programs [12, p. 76]. An artificially created environment provides the opportunity for the education subject to choose preferred forms of communication; it contributes to the implementation of the general didactic principles (accessibility, information scientificity, computerization and informatization of training); it also creates some prerequisites for the special didactic principles implementation (information and communication, ideological, information and environmental principles);

– diagnostics of the subject education quality (point-rating system, monitoring academic performance and education quality, electronic information and educational environment, questionnaires of students to identify satisfaction with the educational process) [19, p. 11].

– articulation of the education subjects. One of the most important areas of a modern university activity, which affects the educational programs quality and the level of the subject preparation, is scientific internships. University students are recommended to participate in grants of foreign countries that give the right to carry out teaching activities abroad.

We’d turn to the forms of educational programs implementation, affecting the education quality of a modern subject. We’ll illustrate the forms’ kaleidoscopy with their approximate list: intensive schools (short-term dives); subject-practical "polygons"; social trainings; educational projects; developing and forming the spaces (interactive museums, theaters and cinemas); problem clubs; tutoring centers; historical and ethnographic reconstruction (workshops, quests, foresight sessions); social partnership; interregional and international projects; teamwork; scientific societies; development of information and communication technologies; updating the educational content; science festivals; heuristic classes; discussions; search seminars; development of integrated educational technologies, etc. [10, p. 91].

To support the education quality of students at a university, it is advisable to use the following approaches: conventional, system-active, ontological, nature-aligned, sociocultural, holographic, anthropological, competency-based, etc., in such case, almost every student may show the leadership qualities, creativity, ability to personal growth.

The reflection of the education quality in a modern pedagogical university allows us

– to recreate a coherent picture of the available stocks and funds necessary for the person education at a qualitative level [3, p. 5];

– to determine the motion nature of a pedagogical matter [7, p. 216];

– to evaluate the features of modern teachers training [13, p. 39].

Numerous innovations are directed at improving the education quality in a modern university:

1) the network form of the educational programs, when the university cooperates with technology parks, colleges and enterprises, using their modern equipment, qualified teachers and tutors;

2) the formation of design thinking (stages: empathy, focusing, generation of ideas, prototype, testing) [15, p. 41];

3) changing the educational organization legal field (the university is given an opportunity to buy methods from private companies and work according to them);

4) the creation of long-growing transmedia products (the transmedia product has a complex and flexible architecture, which borders are open; the development is multi-vector and manageable; the content is holistic, updating) [9, p. 154];

5) cascading training;

6) exponential growth in information volumes;

7) the Internet is the available but not fully utilized potential. The youth adaptation ideology to the digital conditions of modernity involves the formation of the education subject own
“compliance culture”, which components are network culture, computer culture, digital competence, computer ethics, electronic document management, etc.) [1, p. 58];

8) network as a community of users, education personalization, a park of training vehicles and simulators: the ability to choose preferred forms of communication; realization of general didactic principles (accessibility, scientific information, computerization and informatization of education);

9) design activities, experimental platform;

10) receiving the qualitative education by a modern subject in the place in which he is studying.

We’d consider a number of issues of the teacher education modernization in the university context, which solution will ensure the non-conflict existence of a specialist in the educational society:

– permanent education of the teaching staff with a different focus: composite knowledge (formalized, emotionally charged), practice marginalization, personal experience dissemination, stress tolerance, developed skills of persuasion, ability to make innovative decisions, time management, etc.;

– the formation of the teacher research culture. Today, a higher pedagogical school needs specialists, creating and using breakthrough technologies in education (teachers’ STEAM education), that is why updated curricula and programs are widely introduced into all levels of education; the training of teachers and specialists with the necessary competencies for those industries that are still being formed, is organized;

– maintaining the ecological balance of a subject (a new generation technique for monitoring the psychological and psychophysiological state of a subject; diagnosing professional inclinations about professional abilities, etc.);

– rendering of assistance to a modern teacher (emotional autism and diffusion of the professional identity led to the teaching stuff mental anorexia);

– intensive cooperation and harmonization of the teaching staff advanced training. In a modern university, it is important to develop the corporate thinking culture, when employees understand that they bear the personal responsibility for the quality of the provided educational services, they realize that the approach to supporting the education quality should be complex;

– use of the education recreational resources. An important element in improving the education quality in the university is the implementation of the new ambitious scientific and technological programs.

**Conclusion.**

Thanks to the retrospection of the modern educational organization formation and functioning, we can identify

– analytic tools of the modern educational reality presentants, based on the independence of the subject’s thinking, on the desire to raise culture;

– the most optimal ways to update the teacher education in a university context: a modern university is a platform for scientific projects, new research areas, it successfully improves the student education quality;

– soft competencies acquired by a subject that contribute to the updating the modern education content. Competencies demonstrate “reference points” that assist to the education content renewal which is necessary for the national higher education institution in connection with the pedagogical stability emerging risks in creating the digital education;

– risks, affecting the further improvement of the student education quality, ways to overcome risks;
– student’s awareness of the intellectual potential application scale, of the educational process possibilities (computer techniques, network resources, transparent media competencies, “flashing” all levels of education). The “mutating” system of media competencies allows the educational subject to recognize patterns and see the meaning between areas of knowledge, to develop algorithmic thinking among students, to turn the learning process into a decision-making process, to improve the subject’s education quality.

The teacher education mission in a university context is to be a cultural transmission in a society that initiates upbringing and training, and it accompanies a person throughout his/her life.

References:


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