

# Fostering Competences Development in Belarussian Higher Education

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**Abstract** – The research deals with processes of modernization of Belarussian higher education and use of the competences' approach in reforming of educational system. Important issues of integration of Belarussian educational system into the world educational space is also discussed. Concepts of modernization of national system of education are and the process of change of an educational paradigm which is understood as initial conceptual model of statement of problems and their solvation by means of certain methods are highlighted in the article. Erasmus+ project FOSTERC (Fostering competences' development in Belarussian higher education) is described as an example of an instrument for modernization and reforming educational systems.

**Keywords** – competences; integration; the system of education; educational space; globalization; processes of integration; modernization of education.

## I. INTRODUCTION

Higher education is characterized today by the processes of globalization, humanization and fundamentalization directed to the formation of the person as a cultural and historical subject, capable to productive conversion and implementation of potential of culture in specific socially and professionally significant qualities of personality (competences). It is connected with a new role of education in the modern world, which draws the important task – an advancing designing of the new social relations in the context of actively developing global economy, the global information environment, cross-cultural dialogue, internationalization and standardization of various spheres of activity of people of different countries of the world. The changes in nature of education, its orientation, purposes and content happening in the World and drive it to free development, creative initiative and independence of students, competitiveness and mobility of specialists.

## II. MODERNIZATION OF HIGHER EDUCATION

Concepts of modernization of education are united worldwide by the process of change of an educational paradigm which is understood as initial conceptual model of statement of problems and their solvation by means of certain methods. The new educational paradigm is oriented to forming of core competencies of the specialist as a result of formation in total of its motivational, valuable and cognitive components [2].

In the conditions of the accelerating changes in social, political, legal, economic and technological spheres of life higher education institution is urged not only to give professional knowledge, skills, but also to create a number of professionally significant and socially necessary personal qualities (competences) of the specialist. Among the main competences are the following: culture of system professional thinking, communicative culture, ability to work in team, tolerance, aspiration to self-education and self-development, responsibility, organizing and leadership skills, resistance to fixed changes (social and the environmental), flexibility and creativity of thinking, optimum style of professional behavior, ability to represent personal and professional qualities, culture of a healthy lifestyle [4].

At modernization of higher education, European countries consider the principles and approaches which are contained in the international documents on education, in particular in the Bologna declaration on June 19, 1999 which so far was signed by 40 states. According to this document by 2010 all European countries had to create uniform system of higher education with the uniform

educational standard and the recognized diplomas of university graduates in all State Parties of Bologna Process [1].

Basic points of the Bologna declaration are: acceptance of system of easily understood and comparable degrees (graduates can use effectively the qualifications in all countries of the European higher education); establishment of the system of credit units in training process); social and professional mobility of students and teachers; providing standards of high quality and comparability of qualifications in all European countries; life-long training; involvement of higher education institutions and students as its competent, active and constructive partners in forming and development of the European higher education space.

These approaches are correlated to the global strategies of development of education developed by UNESCO in the 21st century according to which the most important functions of educational institutions are the following: "to learn to live together", "to learn to learn", "to learn to do", "to learn to live". Basing on the principles, listed above, the Council of Europe determined five core competencies which must be gained by graduates of universities: social and political; cross-cultural; communicative (oral speech and written communication native and foreign languages; connected with emergence of information society; connected with a capability to study throughout all life in the context of the professional activity [5].

All the competences, listed above, form social and professional competence of the specialist. The analysis of essence of this concept shows that the focus in it is shifted from the conceptual field "I know that" to the field "I know how". In the Concept of reforming of Belarussian education it is also specified the period that we shall create complete system of encyclopedic knowledge, abilities, skills, and also experience of independent activities and the personal liability of students, i.e. the core competencies determining modern quality of education.

### III. COMPETENCE-BASED APPROACH IN EDUCATION

The education (competence-based education) oriented to competences began to be created in the 70th of the 20th century in the USA. Foreign and domestic researchers of competences (J. Raven, C. Scala, R. Whyte, V. I. Baydenko, G.E. Belitskaya, E. F. Zeer, I. A. Zimnyaya, N. V. Kuzmina, A. K. Markova, L. A. Petrovskaya, Yu. G. Tatur, G. Halazh, N. Chomsky, V. Hutmakher, A. V. Hutorskoy) connect this concept, first of all, with categories "readiness", "capability", and also with such psychological qualities as responsibility and confidence. In the list Ravenna is 37 types of competences which many names include the words "readiness" and "capability", for example, "readiness and a capability to study independently", "readiness to use the new ideas and innovations", "a capability to make decisions", "a capability to joint operation for the sake of goal achievement" [4].

On the basis of the analysis of results of many researches of competence-based approach in education it was theoretically proved and allocated three groups of core competencies, their necessary nomenclature and types of competences from into each group. The first group is constituted belonging to the person as the identity of competence: health-saving; valuable and semantic orientation in the world; civic consciousness; self-improvement, self-regulation, self-development, personal and subject reflection. The second group is formed belonging to social interaction of the person and social environment of competence: social interaction with society, labor collective, family, friends, cooperation, tolerance, respect and acceptance of others, social mobility; in oral and written communication. The third group includes the competences relating to activities of the person: cognitive activity, including statement and the problem resolution; educational, game and labor activity; in the sphere of information technologies, including computer literacy and of Internet skills [6].

The analysis of tendencies of development of higher education in the world demonstrates that increase in its quality and efficiency depends not so much on curricula and the number of classroom hours, but on the identity of the teacher capable to realize the installations, knowledge, skills in the creative potential of students. Training of such teachers who are capable to build cross-disciplinary

curricula, enter productive communication with other teachers, administration and students, use various styles of pedagogical activities, constantly improve the skills is an extremely topical issue today. Development of productive educational activities, autonomy of the personality and creativity of students, naturally, demands that the teacher himself had pronounced pedagogical identity, creativity, ability to flexible professional behavior, creative search and professional self-improvement [8].

Necessary condition and means of self-improvement of the identity of the teacher is his constant reflection of the professional activity. Development of a professional reflection, adequate self-assessment becomes today one of priority problems of vocational training and professional development of teachers without which solution or any essential modernization of higher education is hardly possible. As the instrument of measurement of level of formation of professionally significant qualities of the identity of the teacher, key competences, development of his reflexive and estimated consciousness it is necessary to use widely the diagnostic techniques and technologies developed in pedagogical medical ethics and psychology [9].

Today, when Belarussian education is integrated into European and World educational space, and joined Bologna process, it is extremely important to preserve and even improve the quality of higher education and make Belarussian higher educational institution competitive in the market.

Erasmus+ project FOSTERC (Fostering competences' development in Belarussian higher education), which started in 2016 and united 11 Belarussian HEIs became one of the important instruments of integration and competencies' formation.

FOSTERC is directly focused on the National (and Regional) priorities fixed by Government of Belarus, regarding the modernization of governance, management and functioning of Belarussian higher education system. Immediately upon attaining independence, Belarus has made a breakthrough towards the formation of a socially oriented market economy. Belarus has adopted the concept of sustainable development as the ideology of its social, economic and cultural development. The changes taking place in the economic and sociocultural life of the country and the realities of the new historical phase of development are having an impact on the development of Belarussian education system. The creation of the legal and economic mechanisms to ensure the functioning and development of the education system has made it possible to give effect to the constitutional right of citizens of Belarus to receive high-quality and accessible education. The fact that Belarus has achieved some of the Millennium Development Goals ahead of schedule, the high level of human development and the ensuring of political, socio-economic and inter-ethnic stability within the country are evidence of the results achieved (UN, Economic and Social Council, 2011).

In this context, one of the objectives, fixed for the National Strategy for Sustainable Socio-economic Development of Belarus up to the year 2020, is to bring the national higher education system up to a level that matches world standards, while retaining its national and cultural identity. In this sense, particular attention is paying to increasing the quality of higher education and improving the structure for training specialists and bringing it as close as possible to the requirements of the labour market. The development of competent research and teaching faculty matching international requirements are pushing through increasing academic mobility, skills development and teacher training, including internships abroad that are providing access to new knowledge and technology. Moreover, in line with world trends, the quality of higher education and the recognition of national institutions of higher education are improving with the completion of the process of obtaining ISO 9001 certification for the educational and research activities of Belarussian universities and by implementing elements of the Bologna process in the national system of higher education.

#### **IV. FOSTERC PROJECT AND ITS ROLE FOR BELARUSSIAN EDUCATION**

However, although higher education in Belarus has a good level, the recent integration of Belarus in the Bologna process requires some harmonisation with other higher education system in Europe. The changes in the higher education system should be focused on the emphasis of the use of innovative principles and approaches to teaching and learning, the strengthening of resources

allocation and methodological support of education, the upgrade and improvement of the technical base, the use of information technologies, among other issues. In this framework, FOSTERC project supports the process of convergence focusing, in this case, on learning outcomes, one of the most important aspects to develop in order to increase the quality of the system, the management of teaching and learning processes and eventually the connection with the social and economic demands.

The added value of FOSTERC is that it provides to Belarusian universities critical tools for reaching Belarusian priorities, such as: training university staff how to define and validate learning outcomes; promoting cultural changes among academics and stakeholders; providing some economic incentives to start up the first initiatives for implementation and evaluation of student-centred teaching models based on competencies development. Along with, FOSTERC will make possible the modernization of Belarusian public universities (and hopefully the modernization of the rest of HEIs) through one of the most powerful tools for changing universities: the shift towards using traditional input/content to output/outcomes approaches in Belarusian HEIs (i.e. opening up ivory towers to social demands).

FOSTERC project is being viewed as producing innovations in a public good sense. FOSTERC not just develop and apply a methodology for own purposes. The methods will be documented and codified to facilitate their potential use by others in the future. These include the overall conceptual, empirical and evaluation framework, the specific quantitative (graduates and teachers questionnaires) and qualitative (employers interviews) analysis, the training material of workshops and EU visits, the design of a student-centred teaching model based on competencies development and its implementation through a pilot activity in Belarusian participating universities, the definition of some Belarusian HE learning outcomes and the development of an integrated «Management Information System», and the learning process for policy makers through different events proposed in the project and the Policy Recommendation Guide. Moreover, members of the consortium are actively involved in several international networks that will enable efficient and thorough exchange of the FOSTERC findings with the results of other relevant projects.

The main aim of FOSTERC project will be to strengthen the use of innovative principles and approaches to teaching and learning in the Belarusian Higher Education Institutions (HEIs) for the improvement of graduates' learning outcomes. FOSTERC will examine the curricular development focusing on graduates' competencies (knowledge, skills and attitudes). It will foster competencies development for matching the social and economic demands and improve the overall quality of HE. Implementing these reforms, it will support the modernization of governance, management and functioning of Belarusian HEIs, and the upgrade and improvement of teaching and learning methodologies. It will provide trainings, methodological tools and indicators for conceptualization of learning outcomes, and integrate good practices and new methods into daily activities. It will also provide the necessary information and tools to facilitate the implementation of internal and external quality assurance assessments, supporting, at the end, the modernisation of Belarusian participating universities and hopefully the modernisation of the rest of Belarusian HEIs.

Specifically, FOSTERC project supports the modernisation of governance, management and functioning of Belarusian HEIs through the following objectives: providing indicators for conceptualizing Belarusian HE learning outcomes in terms of competencies development; upgrading and improving innovative teaching methods and the development of pedagogical creativity; strengthening student's assessment and education management information systems for the improvement of the quality of Belarusian HEIs and matching the social and economic demands; equipment of Belarusian participating HEIs with the necessary information tools to facilitate the implementation of internal and external quality assurance assessments; modernizing systems and practices of data collection and analysis in the Belarusian HE system through the development of an integrated Management Information System improving HEIs management in teaching and learning activities.

All these objectives will positively change the situation set out previously and will improve the overall quality of Belarusian universities.

FOSTERC project is quite intensive in human resources. Belarusian participating universities are responsible for conducting HE graduates and teachers surveys, and interviewing employers to know the current situation of teaching approaches, learning outcomes and labour market demands in Belarus. In addition, there are many training seminars in Belarus and EU visits and they require the cooperation of many people. Moreover, the definition of the student-centred teaching model based on competencies development, their establishment, implementation and validation in the Belarusian participating universities (these activities correspond to implies an inter- and intra-institutional cooperation among education and training practitioners, institutional managers and policy-makers on the relevance of using learning outcomes for defining standards, curriculum development and assessment/validation. Furthermore, activities of the project require involving national and international external experts giving support to Belarusian teams and improving project quality results.

To maximize cost effectiveness and to ensure that the project is manageable, numerous measures have been taken: 1. Staff costs are estimated according to number and volume of activities.

2. Type of task is used as indicator of the daily salary rate. 3. Training for Belarusian staff will be held mostly in Belarus. 4. When traveling, the duration of visits is planned in regard to activities. Travel costs have been reduced as much as possible. 5. Reasonable prices are estimated for equipment. 6. To reduce costs for printing and publishing, apart from institutional reports and a publication on major results, dissemination will be mainly done via project website.

7. Translation services from Russian and Belarusian to English have also be considered for reports, seminars, training EU visits and Final Conference. 8. A financial expert in EU projects is be in charge of the management of the project. Financial administration for the project will be centralised in order to reduce costs both for book-keeping staff and international external experts collaborations, and for financial transactions. Detailed record will be kept for financial reporting and audits.

The expected impact of the project can be divided into three levels:

**LOCALLY:** FOSTERC is aimed at promoting the modernisation and internalisation of Belarusian HEIs. In concrete terms, this can be achieved by providing: a comprehensive picture of the current situation of teaching and learning approaches of the Belarusian HEIs and the process of moving towards the implementation of the Bologna process; a better understanding of the curricular development focusing on learning outcomes; a better matching of the Belarusian HE with the social and economic demands; an increasing use of learning outcomes when describing and defining qualifications, and curricula; quality assurance assessments tools for Belarusian HEIs enhancing its relevance for the labour market and society.

All information and data collected throughout the project helps for better understanding and elaboration of that.

**NATIONALLY:** FOSTERC advances our knowledge in how fostering competencies development in Belarus. Our proposed mixed methods approach reflects the objectives of our study and of the call, consisting of qualitative and quantitative analysis, questionnaire surveys, training workshops and EU visits, defining student-centred teaching models based on competencies, implementing full pedagogical models in some study programmes of Belarusian HEIs, updating and integrating teaching methodologies, and improving quality assessment of Belarusian HE throughout the recognition and validation of competencies. These approaches are be conducted for each Belarusian participating university. As FOSTERC covers 8 Belarusian HEIs from different geographical areas with a broad view of cultural diversity and representing well the Belarusian context, each analysis of project activities will produce important results in its own right, but will also provide input to both participating and non-participating Belarusian HEIs. Therefore, the impact of the project is expected to be the desired one increasing synergies and complementarities among all Belarusian HEIs.

**EUROPEAN LEVEL:** FOSTERC will deliver large scale evidence of the provision and assessment of basic and transversal skills, highlighting those related to entrepreneurship, social civic, intercultural competencies, critical thinking, etc. Conducting HE graduates and teachers surveys, and employers interviews, their analysis and the integration of evidence into policy making process and

the use of the learning process approach for the policy makers and practitioners, will help for a better understanding of which are the key competencies linked to professional profiles (teaching, training, youth work, etc.) in both EU programme partners and Belarusian partners. Moreover, the exchange of experiences and good practices among partners will increase capacities of all participating institutions and other stakeholders interested in the modernisation and internationalisation of HE (e.g. other Belarusian and EU nonparticipating HEIs). The project aims, through the planned collecting and data analysis from surveys, the planned study visits, the information collected about good practices cases in defining learning outcomes, the way of the transition shift from using traditional input/content to output/outcomes approaches in Belarusian participating universities, the implementation of student-centred teaching models, the updating and integrating teaching methodologies and changes in HEIs management, and the recognition and validation of competencies, will be not only used in Belarus participating universities, but will also be further disseminated at public events (dissemination events of the project).

Different strategies and dissemination actions of FOSTERC project results are used to achieve the expected impact and giving continuity to the project towards other HEIs, both in EU programmes countries and regions where there is a potential that such know-how could be used, especially towards 'Convergence' regions in Central Europe which aspire to promote the modernisation and internalization of their HE improving quality of their institutions. The project focuses on key target groups at different levels:

**INTERNAL LEVEL**, where is envisaged that the partners disseminate findings to other colleagues, their regional and national contacts (e.g. public authorities, project partners, etc.) (also in national languages), highlighting the contribution of the FOSTERC project to society.

**REGIONAL and LOCAL LEVEL**, where partners of the FOSTERC project are committed to reach efficiency and effectiveness in communication, by using all the opportunities linked to the project's field of action and to communicate the project results in their own language (e.g. regional and local institutions, media, associations, civil society, private sector actors), raising awareness of the topic, informing a wide public, engaging different stakeholders and promoting the project as a good practice.

**EUROPEAN and INTERNATIONAL LEVEL**, where the impact of the project takes the form of networking with other relevant countries. FOSTERC partners are actively involved in international networks that will enable efficient and thorough exchange of FOSTERC findings with the results of other relevant projects.

Each of these groups (e.g. European Institutions, Organizations, Associations, Foundations, etc.) contribute to a social learning process in which the sharing of experiences and knowledge jointly contributes to a shared understanding.

## V. CONCLUSION

FOSTERC project is intrinsically sustainable because it is appropriate within its broad overall objective, addressing national priorities and the evolving needs within the participating stakeholders, providing solutions that will be replicable across other Belarusian non-participating HEIs and other non-partner countries. The consortium covers HEIs from 4 EU countries (Spain, Lithuania, Poland and Finland) and 8 Belarusian HEIs from different geographical areas representing well the Belarusian context. Structural barriers (political, economic, social, cultural) could restrict the occurrence and impacts of the FOSTERC project. However, the wide coverage of the consortium will mitigate these barriers. Moreover, the project has as a full partner the Ministry of Education and the National Institute for HE, both will encourage more for a discussion of a broad range of policy makers and other stakeholders in the policy making process integrating FOSTERC's evidence into policy and reducing possible barriers.

Staff of Belarusian partners will attend training activities at home and EU visits. These capacity building processes will have a long-term impact on the skills of academic and administrative staff. Moreover, the support and follow-up of the EU partners to Belarusian participating universities in the way of description of learning outcomes from the beginning will guarantee that at the end of the

project, Belarusian participating HEIs will be able to develop full pedagogical models based on competencies. These approaches could be replicated in any other non-partner HEI and it is quite likely that the culture of learning outcomes based on competencies development expands for the whole Belarusian HE system.

Finally, the FOSTERC consortium will interact with worldwide research groups and forums to set up cross-fertilization of ideas and concepts and together give continuity and extent the scope of the project and to establish a permanent network of FOSTERC.

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