Boosting the relationship between enterprises and universities - important stakeholders in the educational process

Liudmila Stihi, Associate professor, PhD in economy, Academy of Economic Studies of Moldova, BAA Faculty, Management Department, lstihi@gmail.com

Abstract

Currently all areas of activity have a dynamic pace of development and constantly changing. To meet the challenges of the present economic environment businesses need qualified specialists not only in terms of knowledge but also in terms of specific skills and competencies. Currently there are significant discrepancies between the level of training of specialists and the employers' expectations, which negatively influence the employment rate of graduates as well as the performance of enterprises. In order to reduce these disparities, a strong cooperation between the key players of the educational system - universities and enterprises is necessary, including motivating employers to adopt a proactive strategy and involvement in the educational process.

Key words:

Entrepreneurial learning, entrepreneurial competence, business environment**,** education and training methods, business infrastructure, project-based, problem-based learning.

Boosting the relationship between enterprises and universities - important stakeholders in the educational process

Education improves the quality of people's lives in ways that transcend benefits to the individual and the family by contributing to economic prosperity and reducing poverty and deprivation. Countries with low levels of education remain in a trap of technological stagnation, low growth, and low demand for education. Research assessing the link between the quantity of education (in terms of enrolment or average years of schooling) and economic growth has been encouraging but somewhat mixed, perhaps because ultimately what matters for growth is not the years that students spend in school, but what they learn. By measuring education levels based on what students have learned, one influential study estimates that an increase of one standard deviation in student scores on international assessments of literacy and mathematics is associated with a 2 percent increase in annual GDP per capita growth[1].

In order to ensure sustainable economic growth European Commission and the EU countries elaborated in 2008 the SME Policy Index: Eastern Partner Countries"Small Business Act" for Europe (SBA)[2], which provides a comprehensive SME policy framework, promotes entrepreneurship and anchors the "Think Small First" principle in law and policy making to strengthen SMEs' competitiveness.

This strategic document is structured around 10 fundamental principles that ensure implementation of requiredmeasures for improving the regulatory framework, business and administrative environment and support European SMEs. Among them are:1.Entrepreneurial learning and women's entrepreneurship; 2.Bankruptcy and second chance for SMEs; 3.Regulatory frameork for SME policy mking; 4. Operationl environment for SMEs; 5A.

[1]World Bank Group Education Strategy 2020. Learning for All Investing in People's Knowledge and Skills to PromoteDevelopment.page3.http://siteresources.worldbank.org/EDUCATION/Resources/ESSU/Education_Strategy_4_12_2011.pdf

[2]Commission Communication 'Think Small First' - A 'Small Business Act' for Europe, COM(2008)394 final.

Support service for SMEs and start-ups; 5B. Pablic procurment; 6. Sccess to finance for SMEs; 7. Standards and technical regulations; 8A. Enterprise skills; 8B. Innovation; 9.SMEs in a green economy; 10. Internationalisation of SMEs.

Republic of Moldova joined the assessment activity of SBA in 2012.

In this article we analyse the first principle of SBA: ‚Entrepreneurial learning and women's entrepreneurship', which is focused on the continuous development of entrepreneurial skills at all stages of education, providingcitizens the opportunity to integrate more efficiently in various fields of activity.

For the 2016 assessment report of the SBA indicators, Moldova recorded a small progress for Principle 1, increasing from 2.10 to 2.57 points, while the highest score is 5 points. This means that Republic of Moldova demonstrate better engagement and co-operation among the range of stakeholders involved in entrepreneurial learning[3].

At the same time, the 2016 assessment included new indicators on entrepreneurship education achievement particularly related to higher education system: *Good Practice in Entrepreneurial Learning in Higher Education; Higher education cooperation with the world of business;Entrepreneurial Learning in Higher Education.* Most countries, including Republic of Moldova already have a regualtory framework requiring universities to co-operating with business. The impact of this regulation, however, is difficult to assess in the absence of monitoring or evaluation arrangements to determine the impact[4]. Inclusion of these new indicators confirms the importance of engaging multiple stakeholders in

[3]SME Policy Index: Eastern Partner Countries 2016: Assessing the Implementation of the Small Business Act for Europe Entrepreneurial learning and women's entrepreneurship (Dimension 1) in Eastern partner countries. OECD. European Union. EBRD. EFT. OECD Publishing. Paris. 2015 Chapter 1. Page 73

[4] SME Policy Index: Eastern Partner Countries 2016: Assessing the Implementation of the Small Business Act for Europe Entrepreneurial learning and women's entrepreneurship (Dimension 1) in Eastern partner countries. OECD. European Union. EBRD. EFT. OECD Publishing. Paris. http://www.keepeek.com/Digital-Asset-Management/oecd/development/sme-policy-index-eastern-partner-countries-2016/entrepreneurial-learning-and-women-s-entrepreneurship-dimension-1-in-eastern-partner-countries_9789264246249-8-en#.V8QEv9KLQ1.page 70-71.

educational process so that the knowledge and skills acquired by students to be correlated with employers needs. However, there are large reserves on improving educational processes, including to entrepreneurial one, whichas was defined by European Training Fondationis a competence necessary for all people and can be developed throughout entire life.

In the Republic of Moldova, currently, the involvement of private companies in the educational process at any level is weak. These two important systems, business and education are working independently (Figure 1), registering significant discrepancies between the level of training and skills aquired and actual business requirements.

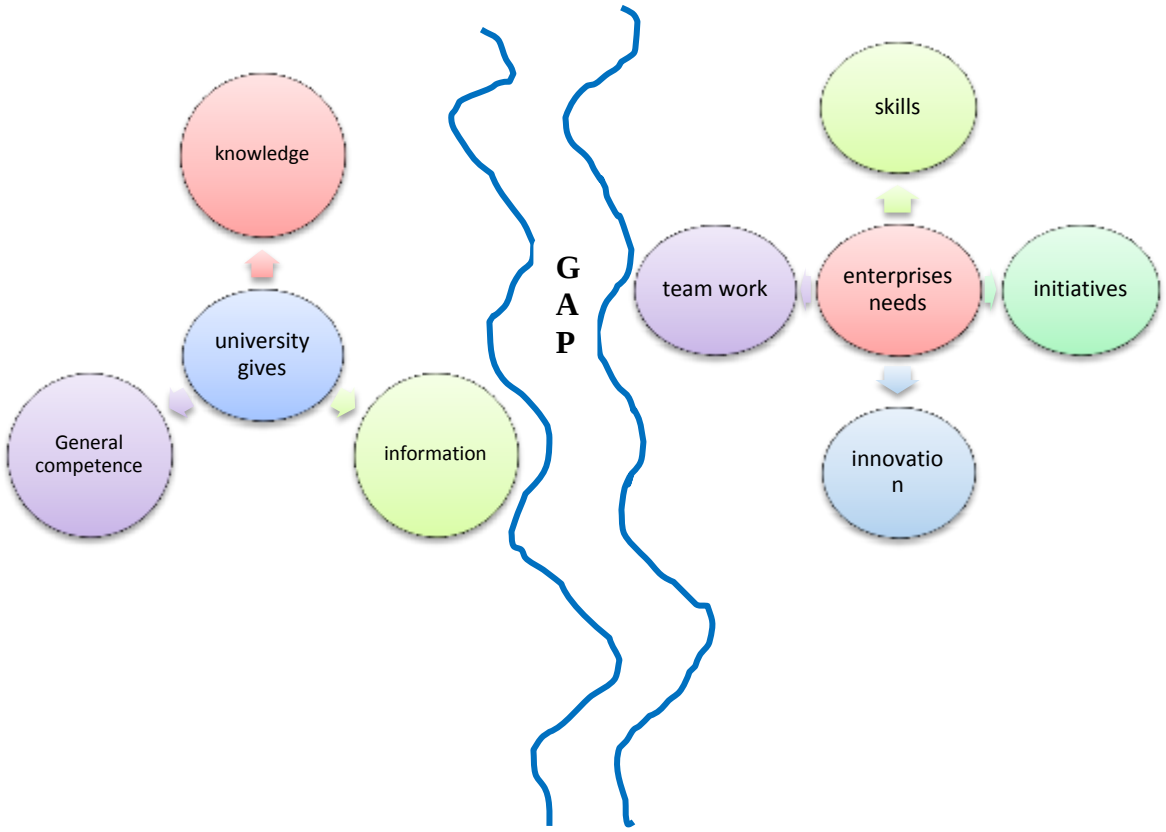

Figure 1. GAP between the competence developed by the higher education and employers needs.

This gap has a negative influence not only on the employment rate of graduates but also on their ability to perform job tasks and to participate in identifying and solving various situations.

However, I'd like to mention that some higher education institutions from Moldova including Academy of Economic Studies of Moldova (ASEM) conducted certain activities to attract businesses to actively participate in the educational process. Thus, in 2014 the Academy of Economic Studies of Moldova conducted focus group activities with business representatives from different fields.

The aim of the focus group was to identify the knowledge required in the study process so that future graduates of the ASEM can be more easily integrated into labour market and meet the job demands.

As a result of this exercise in the curriculum for both 1st and 2nd cycle were introduced new courses that would enable young graduates to obtain new set of knowledge requiredto keep up withactual trends of the development. But, only with the introduction of new courses and without changing the teaching process it is unlikely to achieve goodand satisfying results for employers.

In 2016, the Centre for Placement of ASEM conducted a survey on major employers concerning the skills expected from young economists. The study found that the vast majority of employers focus fully on another set of skills as opposed to those currently practiced within the university. Among the most required competencies mentioned by most employers are:

- On the first place - communication skills
- Second place – adaptation skills and capacity for action in new environments
- Third place - team work abilities
- Fourth place–self-training, problem analysis and solving skills
- Fifth place - creativity and innovation
- Sixth place–theoretical knowledge from the area of activity.

Based on these findings, we can say with certainty that employers focus on the skills that are common for every person, develop in longer periods of time and are also more difficult to change, rather than on theoretical knowledge from a particular field. In the environment so dynamic and changing of our century,the preparation process of the future generation of specialists it is more importantly to focus on developing practical skills, stimulating creativity and analytical skillsthan on loading information which cannot be applied in practice and that quickly loses its actuality.

In this context it is certain that new forms of education and training methods need to be implemented, among which is Problem Base Learning. As identified in the early 70s of the twentieth century, this method of training allows students to development specific skills based on real situations, without imposing any standard solutions.

According to Tan Oon Seng "Problem-based Learning (PBL) is an active-learning and learner-centered approach where unstructured problems are used as the starting point and anchor for the inquiry and learning process. PBL is not just about problem-solving processes; it is a pedagogy based on constructivism in which realistic problems are used in conjunction with the design of a learning environment where inquiry activities, self-directed learning, information mining, dialogue, and collaborative problem-solving are incorporated. In recent years, PBL has gained new momentum as a result of several developments such as increasing demand for bridging the gap between theory and practice, information accessibility and knowledge explosion, new possibilities in the use of multidisciplinary problems, emphasis on real-world competencies, and developments in learning, psychology, and pedagogy."[5]

Any discussion of project-based or problem-based learning is quickly complicated by the use of specific terms that have a variety of definitions and understandings in the broader

[5]Tan Oon Seng.Problem-based learning: the future frontiers. National Institute of Education, Nanyang Technological University, Singapore. PROBLEM-BASED LEARNING: THE FUTURE FRONTIERS.http://www.tp.edu.sg/staticfiles/TP/files/centres/pbl/pbl._tan_oon_seng.pdf

literature. The following terms are defined for the purposes of clarifying their use in the Principles of Problem and Project Based Learning[6].

Problem: A problem can be theoretical, practical, social, technical, symbolic-cultural and/or scientific and grows out of students' wondering within different disciplines and professional environments. The problem is the starting point directing the students' learning process and situates the learning in a context. A chosen problem has to be exemplary. The problem may involve an interdisciplinary approach in both the analysis and solving phases.

Project: A project is a complex effort that necessitates an analysis of the target (problem analysis) and that must be planned and managed, because of desired changes that are to be carried out in people's surroundings, organization, knowledge, and attitude to life; it involves a new, complex task or problem; it extends beyond traditional organizations and knowledge; it must be completed at a point in time determined in advance. Projects are necessarily diverse with regard to scope and specific definition. No one specific template or standard exists to define "sufficiency" but rather, these determinations are made within each programme.

Exemplarity: Exemplarity is a principle of selecting relevant specific learning outcomes and content / scientific knowledge that is exemplary to overall learning outcomes. That is, a problem needs to refer back to a particular practical, scientific and/or technical domain. The problem should stand as one specific example or manifestation of more general learning outcomes related to knowledge and/ or modes of inquiry.[7]

To implement this method in higher educational system of the Republic of Moldova, I consider that there should be solved two major problems concerning: 1. the process of teaching, which unfortunately in most higher education institutions is reduced to two or three

[6] Principles of Problem and Project Based Learning The Aalborg PBL Model. Page 7. September 2010. http://www.aau.dk/digitalAssets/62/62747_pbl_aalborg_modellen.pdf

[7]Problem-based Learning in the Classroom.accesed August 28 2016. https://cirt.gcu.edu/teaching3/tips/pbl

forms, focusing primarily on transmission of information rather that skills training; and 2. involvement of private sector/businesses for identifying real situations or problems that may be offered to students as case studies in order todevelop practical skills required by employers.

Both problems are difficult to solve and require joint efforts from academia as well as from businesses that are direct consumers of universities` products - qualified specialists.

Further, I would like to focus on the second issue, namely stimulating business involvement in the educational system.

In the Republic of Moldova, private sector is predominantly represented by SMEs, which own approximately 97.4% of total enterprises. Within this sector currently operates 50.3% of total employees, the remaining being employed in large enterprises and public institutions. These companies have a quite small turnover to allow spending money for additional training of young specialists. Moreover, vast majority of job offers require minimum two years of work experience, which young people find difficult to accumulate. As a result, it forms a vicious circle where are launched accusations on the quality of educational system, instead of finding practical solutions.

What would be the steps?

First of all, we need to change the paradigm of perceiving the educational system of businesses side, from one based on consumption - where institutions prepare professionals and businesses are only consumers of the final product, to one based on involvement - where business is part of the educational system and actively contribute to the training of future specialists, including by making investments.

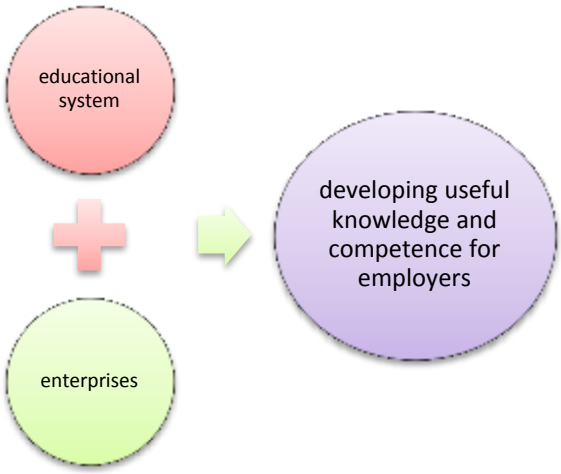

Figure 2. New paradigm based on involvment

Implementing new paradigm involves creating sustainable partnerships between universities and enterprises, including establishing practice centers for both teachers and students.

Secondly, to facilitate business involvement in the learning process and creating sustainable partnerships can be used the existing business infrastructure in Moldova, namely: business incubators platforms, including virtual ones; industrial parks; free economic zones; producers associations; employers and sectoral committees. For instance, from 2007 with the support of the Norwegian Government and Local Public Authorities in Moldova were opened nine business incubators, which are managed and developed by the Organization for SME sector development (ODIMM). The aim of these incubators is to help create a favorable business environment for newly established enterprises in rural areas; to promote and develop entrepreneurship; to enhance business competitiveness and to create qualitative jobs. Thus, during this period, within all incubators are activating 155 businesses that have created over 630 jobs. By the field of activity, 24 enterprises are operating in industry and 127 in the provision of services. In addition, 45% of enterprises are start-ups. Certainly, universities can establish reliable partnerships with business incubators to ensure implementation of innovative trainings focused on the development of relevant business skills. Also all forms of business association can contributeat identifying the common competencies of a particular

sector as well as at elaboration of case studies that will further be integrated in the learning process.

Based on these platforms can be developed joint creativity, innovation and practice centers, for teachers and students. Moreover, scientific centers hosted by universities can initiate fundamental or specialized research for enterprises, with student involvement in the process.

On the other hand, the enterprises benefits would be quite obvious, namely: lower costs for creating centers of practice and training new specialists, individualized and innovative solutions to the problems identified, young specialists skilled in accordancewith employers needs.

In conclusion I would like to mention that the education reform recognizes employers as key stakeholders in education and regards nonformal skills training as part of a continuum of learning opportunities for acquiring key knowledge and skills.

References

World Bank Group Education Strategy 2020. Learning for All Investing in People's Knowledge and Skills To PromoteDevelopment.page3. Accesed August 28 2016. http://siteresources.worldbank.org/EDUCATION/Resources/ESSU/Education_Strategy_4_12_2011.pdf

Commission Communication 'Think Small First' - A 'Small Business Act' for Europe, COM(2008)394 final.

SME Policy Index: Eastern Partner Countries 2016: Assessing the Implementation of the Small Business Act for Europe Entrepreneurial learning and women's entrepreneurship (Dimension 1) in Eastern partner countries. OECD. European Union. EBRD. EFT. OECD Publishing. Paris. Chapter 1.http://www.keepeek.com/Digital-Asset-Management/oecd/development/sme-policy-index-eastern-partner-countries-2016/entrepreneurial-learning-and-women-s-entrepreneurship-dimension-1-in-eastern-partner-countries_9789264246249-8-en#.V8QEv9KLQ1g#page 69.

SME Policy Index: Eastern Partner Countries 2016: Assessing the Implementation of the Small Business Act for Europe Entrepreneurial learning and women's entrepreneurship (Dimension 1) in Eastern partner countries. OECD. European Union. EBRD. EFT. OECD Publishing. Paris.2015. Page 312

Tan Oon Seng. Problem-based learning: the future frontiers. National Institute of Education, Nanyang Technological University, Singapore. PROBLEM-BASED LEARNING: THE FUTURE FRONTIERS.
http://www.tp.edu.sg/staticfiles/TP/files/centres/pbl/pbl._tan_oon_seng.pdf

Principles of Problem and Project Based Learning The Aalborg PBL Model.. September 2010. Page 7
http://www.aau.dk/digitalAssets/62/62747_pbl_aalborg_modellen.pdf
Problem-based Learning in the Classroom.accesed August 28 2016. https://cirt.gcu.edu/teaching3/tips/pbl