ISSN 2345-1424 http://jrtmed.uccm.md E-ISSN 2345-1483

Journal of Research on Trade, Management and Economic Development
VOLUME 6, ISSUE 1(11)/2019

DEVELOPMENT OF PROFESSIONAL COMPETENCIES TRAINING MODEL AND FORECASTING THE NEEDS OF THE NATIONAL ECONOMY IN SPECIALISTS WITH HIGHER ECONOMIC STUDIES

Victoria GANEA, Prof., PhD
Moldova State University
E-mail: ganea.victoria@gmail.com

Valentina TÎRȘU, PhD student
Moldova State University
E-mail: vtirsu@mail.ru

JEL classification: I25

Abstract

Education is an investment in the future of a citizen of his country and is economically beneficial to the state. In the category of key factors that have a huge impact on the supply of labour on the market is also included the human capital, and the educational system is considered as the dominant source of its formation. In this context, we emphasise that employees with higher economic studies have a particular contribution to the economic growth, contributing to its development in an innovative trajectory, because without an adequate improvement of the quality of the labour force it is impossible to increase the productivity of labour and consequently to increase the gross domestic product. On the other hand, the current state of the economy is such that, firstly, it does not need such a large number of such specialists, as it cannot provide an equivalent number of jobs with adequate qualifications. Currently, the imbalance between the number of graduates with higher economic studies and the labour market needs is evident. This is largely due to the insufficiently substantiated planning of the volume and structure of specialists with higher economic studies at the national level. This planning is imperial to be achieved taking into account the forecasting of the needs of the national economy in specialists with higher economic studies.

Keywords*: management, educational market, labour market, professional competencies*

1. Introduction

In the context of globalization, with the prevalence of the global economy's tendency to become a knowledge-based economy, the importance of higher education systems and, above all, the economic higher education grows rapidly, as educational institutions are invited to prepare qualified specialists for all types of economic activities of the country.

However, the functioning and development of economic higher education in our republic is accompanied by a number of problems caused by the correlation of the unified socio-economic development policy with the capacities of higher economic educational institutions, reflecting the need of personnel in the structure and parameters of the educational system in the region, the gaps in coordinating the development of higher economic education at national level, etc.

In order for the economic higher education to play a prominent role in the socio-economic development of the country, it is appropriate that the training of specialists in higher economic education institutions should be carried out taking into account the current and future needs of the

national economy in updating and enriching the highly qualified staff. It is therefore of particular importance to develop a system for forecasting the needs of the national economy in personnel of different economic qualifications, which will enable the formation of an optimum structure for the training of the requested qualified specialists.

2. The investigation degree of the problem, the purpose of the research

The dizzying speed with which the global science is currently evolving is considered the most important feature of the current decade, and information, knowledge, and innovation have become the main value of the nations. The knowledge that society possessed 10-15 years ago, summed up with the desire to streamline their work, led to the emergence of new technologies, which in their turn generated new knowledge and skills. Gradually, the employee's knowledge and intellectual capital became the main strategic resource and the main production factor.

It is appropriate to recognize that in conditions of post-industrial information society, the most important states in the field of intellectual services and high technologies are at the forefront. Their technological superiority has become the most powerful tool of international competition of states. Countries that hold such a high-tech strategic product enjoy a number of multiple advantages and broad future prospects compared to other countries [5].

Currently, the global economic restructuring processes that the Republic of Moldova has undergone in the last two decades have left their mark on the structural changes to which the labour and educational markets have been subjected. This has not only changed the structure of the labour market, but it has also identified new demands on education and qualifications of the workforce. Today, due to the mass migration of labour force outside the country, the republic is constantly confronted with the growing trend of the labour demand, and therefore the increase in employment is required.

Thus, imbalances in the labour market are partly due to the effect of dysfunctions in labour forecasting, which in turn affect the plans for admission to vocational economic education institutions.

In the modern history of the Republic of Moldova, the issue of personnel planning and training of highly skilled specialists was first highlighted by the development and entry into force of the Government Decision on the organisation of continuous professional training [2].

A study conducted in 2017 by Moldovan researchers reported: "The education and level of training of young people at the beginning of employment play a very important role and have obvious advantages as the level of education increases. Both finding a stable and satisfactory job and the range of impact from the completion of studies to the first stable job is a longer or shorter process for young people depending on the level of education and level of preparedness they have had" [1, p. 11].

We support the opinion of local researchers who have found that "recent years are marked by a poor correlation between the education system and the labour market, and one of the factors limiting the correlation is the lack of data and studies, their non-updating on the long-term needs of the market" [1, p. 15]. Here we have to fill that in the developed economies, in a row with those mentioned, a decisive role has the forecasting of the needs of the national economy in specialists with higher education as well.

Globally, the measurement of the suitability between the person's workplace and the level of qualification of the individual is achieved by applying the norms of professional competencies categories in the International Standard Classification of Occupations, where the major occupational groups are classified according to the level of appreciated education according to the International Standard Classification of Education [8].

In the Republic of Moldova, the Government is the institution responsible for the educational plans. The registration quotas are calculated, following coordination between the competent ministries, which have in their subordination educational institutions. Several factors are taken into account in determining the calendar of admission:

- the State Budget Law, which regulates the financial resources for education,
- the possibilities/offerings of educational institutions and
- data on supply and demand for work on the market.

It should be noted that the last two components are "deficiencies" by itself. Although vocational education institutions are required to come up with schooling proposals for the next year of study, the recommendations are based on the experience of the previous year of study (if enough candidates were available, if they covered all vacancies, the wishes of the potential candidates for admission, if they planned to organize new specialties and/or the dissolution of others, availability of study buildings, material-didactic base and help for the teachers). Unfortunately, these recommendations are far from taking into account the real needs of the labour market. The main causes of this situation are the financial interests of each educational institution.

In this context, it is important to realise that the system of continuous vocational training (economic, inclusively) meets all requirements regarding the regulations, mechanisms, processes, programmes, and adult training providers that ensure and realise the formation and/or development of professional skills [3].

The forecast of the need for labour force cannot be achieved due to the fact that educational and vocational training institutions do not interact enough with the business environment in the country. Difficulties in the implementation of labour forecasts are due to the fact that there is no appropriate system for evaluating educational and vocational training institutions. The current assessment system is aimed at providing technical and material support to institutions and teachers. At the same time, there are no indicators reflecting the level of employment of graduates in the labour field according to the specializations obtained, the degree of employers' satisfaction with the level of youth training, and the representation of companies in the management of the educational institutions, etc.

Moreover, the majority of graduates/students with economic profile, from the sample of 100 people interviewed by the author in the economic faculties (about 60%), mentioned that there was practically no sporadic cooperation between the institution and the economic agents. Only about 35% of the respondents presented examples of cooperation between the higher education institution and the economic entities.

As a rule, cooperation means the organisation of production practice in enterprises. In this context, around 30% of respondents said that some economic agents subsequently employed graduates of higher economic education institutions, because large companies, for example, mobile phones companies, and some companies from the light industry have agreements with educational

institutions. In this context, we will note that other types of cooperation between vocational training institutions and enterprises have been identified, such as:

- some economic entities organise job fairs in educational institutions, coming closer to students;
- educational institutions invite experts (potential employers) for intensive communication with students;
- some institutions organise study visits to potential employers;
- teachers have their own business (apart from the academic activity) and select potential employees among students.

Thus, in these conditions, we find that the development of a methodology for forecasting the needs of the national economy in specialists with higher economic studies becomes necessary and timely. We emphasize that in foreign practice a certain experience has been achieved in predicting the labour market demand for labour workforce with various economic qualifications. Currently, in developed countries, the most advanced forecasting system exists in the USA, the UK, and Germany. The methodology of forecasting the needs of the economy for specialists with economic qualification is fully reflected in scientific research [4, 6, 7]. The analysis of foreign experience allows us to conclude about the diversity of approaches (such as, expert, statistical and mathematical methods, etc.) to forecasting the labour demand. However, the direct transfer of these Western methods into domestic economic practice is very problematic due to the national specifics of transitional economic development.

3. Methods and materials applied

In order to carry out research, we have consulted international and European policy documents, in particular, in the field of training vocational competencies for specialists with higher economic education, as well as the national ones related to the development of this field. Assessment of employment expectations of graduate students in the university system (in particular, we are talking about the Faculty of Economic Sciences of the MSU) was based on the analysis of the "Questionnaire evaluating the degree of satisfaction of graduate students' expectations from higher economic education (Bachelor/Master) for labour market employment" and "Questionnaire on the level of satisfaction of graduates in the framework of higher economic education (Bachelor/Master) in relation to professional and personal development in the first year of employment". We emphasise that all Bachelor/Master students of the final year have been interviewed in these surveys. The study used an extensive methodological tool that included methods of sociological survey, graphical and tabular methods, economic, statistical, synthesis, induction, deduction, comparative analysis and predictive analysis, etc.

4. Results and discussions

4.1. Model of training professional competencies in the economic universities of the country

Taking into account the fact that the Republic of Moldova is labour-intensive, the characteristics of specialists who have graduated from higher educational institutions in the republic must meet the requirements not only in the national labour market but also in the external labour market, since

this applies, in particular, to the economic specialties in which, currently, there is an excess of supply over demand in the internal labour market.

Thus, based on the above, we consider it expedient to offer our republic a model of training professional competencies in higher economic educational institutions which subsequently, being developed, will become the basis for the development of a conceptual model of interaction between universities and labour market subjects in the field of economic orientation to develop a list of the necessary competencies that economic specialists should receive in the learning process.

As a result, the authors, on the basis of thorough consultations with representatives of business structures, offer a set of skills necessary for economic specialties of universities. At the same time, we emphasise that this began with the fact that the acquired competencies should form among graduates not only professionalism, but also the moral norms of the future employee's behaviour.

Consequently, the effective implementation of a skills-based approach in the higher vocational education system implies the active participation not only of academics but also employers, students, and others interested in the final results of the economic educational process.

In order to determine the appropriate content of economic education and the modalities for the training of the necessary skills of graduates of economic faculties, we consider it appropriate to develop a more detailed classification of competencies, depending on their participation in the formation of various skills of students, such as: cultural and general-ideological competencies; personal, interpersonal and communication competencies; general professional competencies; special competencies.

Based on these, when developing new academic curricula, it is advisable to provide:

- the cycle of disciplines that form cultural and general-ideological competencies;
- the cycle of disciplines that form personal, interpersonal and communication competencies;
- the cycle of disciplines that form professional competencies;
- the cycle of disciplines that form special competencies.

The next step, the most time-consuming but also extremely necessary for the introduction of a modern approach to the economic educational process, on the basis of competencies, is the analysis of the content of the studied subjects from the position of their tasks assigned to form specific economic competencies. On the basis of the above, a model of competencies for preparing graduates of higher economic educational institutions has been developed, reflecting a sequence of interrelated actions (Figure 1).

In this situation, we believe that the dilemma that persists for a certain period of time in the universities of the Republic of Moldova that contribute to the formation of specialists in the field of economics, should be solved by:

1. reducing admission of students in the economic field to match the needs of the national labour market.
2. ensuring the competitiveness of graduates of economic profiles, not only in the internal market but also in the external labour market, without reducing their number, by improving the quality of education and their competencies in accordance with the requirements of international standards.

The first direction is easy to achieve, since it does not require additional labour costs and funding for implementation. However, in the conditions of high demand for these specialties, the financial

situation of universities is expected to deteriorate, the number of teachers will decrease, their competitiveness will decrease as well and there will be difficulties in recognising their degrees in international education.



Figure 1. Model of training professional competencies in higher economic educational institutions

Source: elaborated by the authors

The second direction - solving the problem of ensuring the competitiveness of graduates of economic profile, causes obvious difficulties. This requires significant additional financial and labour resources allocated for: developing and improving the efficiency of the technical-material base of universities; enhancing the professional level of teachers, and improving the interaction between universities and labour market actors both within the country and abroad.

4.2. Forecasting the needs of the national economy in specialists with higher economic education

It is appropriate and very important to note that the upward development of the national economy is increasingly dependent on the level of education of its citizens. Understanding that the growth of a country's economy directly depends on the quality of labour resources and the efficiency of their use, demonstrates that education is a determining factor in personal development, one of the main means of development of the whole country. This has resulted in an increase in professional education worldwide.

In order to assess the potential demand for specialists with higher economic education in the labour market, it is necessary to know the additional annual need of the economy for relevant personnel in the medium and long term, with a high level of detail in economic activity. This problem can be solved with the help of a personnel needs forecasting system, based on the methods of econometric modelling.

Foreign experience in human resources planning is most eloquently represented by the United States Agency for Labour Statistics. Intersectoral balance sheet tables within the "input-output" model have been used in the USA since 1936 to predict the development of the economy. Currently, this model, called "Chase model", is used to predict the needs of the economy's personnel, both at the national and at the state level. [4, pp. 451-467].

Nowadays, most countries use different models and methods to predict human resources, but prevails over the combined approach of achieving the complementary effect between the two methods: the use of surveys carried out by different labour market actors and the 'technological' methodology. This is done to refine the prediction model parameters and increase the level of detail of the final results. Thus, we can consider the final expression for the details of the needs in personnel by the level of education during the forecast period:

$$\Delta N_{e,t}^{P} = O\Delta N_{e,t}^{P} * \Delta N_{e,t} \quad (1),$$

where:

$\Delta N_{e,t}$ - the economic need for personnel with higher economic studies in a given period of time;

$O\Delta N_{e,t}^{P}$ - the structure of the occupation of specialists with higher economic studies in the retrospective period;

P - the professional selected level of education (in our case - higher economic studies).

On the basis of forecasts of the economic need for specialists with higher economic education, it is advisable to draw up tables for the balance of supply and demand. Despite the limitations inherent in any approach, we find that the methodology of macroeconomic forecasting, in one form or another, can be used to plan and manage higher economic education at the national level.

5. Conclusions

Finally, we believe that the choice of the second direction as a basic educational strategy is the most promising one. Despite the complexity of its implementation, it aims and requires universities to raise the quality of the offered studies and to strengthen the practical orientation of higher economic studies, to identify and respond to the changing needs of the labour market actors through specialists from different economic fields, in order to ensure their competitiveness on the national and global educational market.

The analysis of the theoretical approaches, of the foreign and domestic practices related to the forecasting of the needs of the economy in specialists with higher economic studies, shows that the higher education system would be able to solve the most important Government task - to bring supply and demand in line with the volume and professional composition on the labour market. In the "education-labour market-economy" system, the individual is regarded as an impersonal source of work, necessary for the production of goods and services. In this system, education has a managerial impact in managing the economic process and is very important because the entry into the system is only possible through this component.

Thus, under the conditions of the formation of an innovative economy, in order to create high-quality products and provide services at global level that have the capacity to compete in domestic and external markets, the level of professionalism of specialists with higher economic studies should be sufficient to constantly increase the complexity and quality of the rendered work. In order to achieve a sustainable economic growth, the process of training specialists with higher economic studies, especially from the state funding, should be planned as accurate as possible, which will allow the development of a rational personnel policy in the economic sectors.

REFERENCES

1. BUCIUCEANU-VRABIE, M., GAGAUZ, O. Tinerii pe piața muncii din Republica Moldova: competențe și aspirații./ Young People On The Labour Market Of The Republic of Moldova: Skills And Aspirations. - Chișinău: Editura INCE, UNDP, 2017. 36 p. ISBN 978-9975-89-078-6.
2. HOTĂRÂREA de Guvern „Cu privire la organizarea formării profesionale continue", nr. 1224 din 09.11.2004, publicat în Monitorul Oficial Nr. 208-211 la 19 noiembrie 2004./ Government Decision "On the Organization of Continuing Professional Training", no. 1224 of 09.11.2004, published in the Official Gazette no. 208-211 on November 19, 2004.
3. REGULAMENTUL cu privire la formarea continuă a adulților aprobat prin Hotărârea de Guvern nr. 193 din 24.03.2017, publicat la 31.03.2017 în Monitorul Oficial Nr. 92-102./ The Regulation On Continuing Education of Adults approved by Government Decision no. 193 of 24.03.2017, published in the Official Gazette no. 92-102 on 31.03.2017.
4. SWENSETH, S. R., OLSON, D. L. Simulation model of professional service personnel inventory. In: International Journal of Services and Operations Management Vol. 19, No. 4, 2014, p. 451-467. Available: https://pdfs.semanticscholar.org/6b60/d5d74c5a2998e31547d57b834c201e3acb1e.pdf
5. WINTER, R. The problem with education level. Available: http://www.richardwinter.net/node/19 (visited on April 3, 2019).
6. ПОПКОВА, И. С. Занятость населения. In: Экономика и менеджмент инновационных технологий. № 11, 2016./ Employment. In: Economics and Management of Innovative Technologies http://ekonomika.snauka.ru/2016/11/12971. (Accessed on April 9, 2019).
7. САЛЬНИКОВА, Л. Ю. Концепция управления конкурентоспособностью выпускников вузов на рынке труда./ The Concept of Managing the Competitiveness of Graduates in the Labor Market In: Fundamental Research, № 12 (часть 4), 2011. стр. 805-808. Available: http://www.fundamental-research.ru/ru/article/view?id=29484
8. https://www.ilo.org/public/english/bureau/stat/isco/isco08/index.htm (Accessed on May 15, 2019).

Rezumat

Educația este o investiție în viitorul unui cetățean al țării sale și este benefică din punct de vedere economic pentru stat. În categoria factorilor principali care au un imens impact asupra ofertei de forță de muncă pe piață este inclus și capitalul uman, iar sistemul educațional este considerat drept sursa dominantă a formării sale. În acest context subliniem faptul că angajații cu studii superioare economice au o contribuție aparte la creșterea economică, contribuind la dezvoltarea sa în traiectorie inovativă, deoarece fără o îmbunătățire adecvată a calității forței de muncă este imposibil să crească productivitatea muncii și, în consecință, să crească produsul intern brut. Pe de altă parte, starea actuală a economiei este de așa natură încât, în primul rând, nu are nevoie de un număr atât de mare de astfel de specialiști, deoarece nu poate oferi un număr echivalent de locuri de muncă cu calificări adecvate. Actualmente este evident dezechilibrul dintre numărul de absolvenți cu studii superioare economice și nevoile pieții muncii. Acest lucru se datorează în mare parte planificării insuficient fundamentate a volumului și structurii specialiștilor cu studii superioare economice la nivel național. Această planificare este imperial să fie realizată ținând cont de prognozarea nevoilor economiei naționale în specialiști cu studii superioare economice.

***Cuvinte-cheie**: management, piața educațională, piața muncii, competențe profesionale, prognoză*

Аннотация

Образование выражает инвестицию в будущее гражданина его страны и является экономически выгодным для государства. В число основных факторов, оказывающих огромное влияние по предложению на

рынке труда, относят человеческий капитал, а система образования считается основным источником его формирования. В этом контексте мы подчеркиваем, что работники с высшим экономическим образованием вносят особый вклад в экономический рост страны, способствуя его развитию на инновационном пути, поскольку без адекватного повышения качества рабочей силы невозможно увеличить производительность труда и, следовательно, внутренний валовой продукт. С другой стороны, текущее состояние нашей экономики таково, что, существует переизбыток специалистов и не возможно для них обеспечить эквивалентное количество рабочих мест с соответствующей квалификацией. В настоящее время очевиден дисбаланс между количеством выпускников с высшим экономическим образованием и потребностями рынка труда. Во многом это связано с ненадлежащим планированием объема и структуры национальных специалистов в сфере высшего образования. Такое планирование необходимо осуществлять с учетом прогнозирования потребностей народного хозяйства в специалистах с высшим экономическим образованием.

Ключевые слова: *менеджмент (управление), рынок образовательных услуг, рынок труда, профессиональные навыки, прогноз*

Received 16.05.2019
Accepted 27.05.2019
Published 01.07.2019