

ISSN 2518-1467 (Online),
ISSN 1991-3494 (Print)

ҚАЗАҚСТАН РЕСПУБЛИКАСЫ
ҰЛТТЫҚ ҒЫЛЫМ АКАДЕМИЯСЫНЫҢ

Х А Б А Р Ш Ы С Ы

ВЕСТНИК

НАЦИОНАЛЬНОЙ АКАДЕМИИ НАУК
РЕСПУБЛИКИ КАЗАХСТАН

THE BULLETIN

THE NATIONAL ACADEMY OF SCIENCES
OF THE REPUBLIC OF KAZAKHSTAN

PUBLISHED SINCE 1944

1

JANUARY – FEBRUARY 2020

ALMATY, NAS RK

NAS RK is pleased to announce that Bulletin of NAS RK scientific journal has been accepted for indexing in the Emerging Sources Citation Index, a new edition of Web of Science. Content in this index is under consideration by Clarivate Analytics to be accepted in the Science Citation Index Expanded, the Social Sciences Citation Index, and the Arts & Humanities Citation Index. The quality and depth of content Web of Science offers to researchers, authors, publishers, and institutions sets it apart from other research databases. The inclusion of Bulletin of NAS RK in the Emerging Sources Citation Index demonstrates our dedication to providing the most relevant and influential multidiscipline content to our community.

Қазақстан Республикасы Ұлттық ғылым академиясы "ҚР ҰҒА Хабаршысы" ғылыми журналының Web of Science-тің жаңаланған нұсқасы Emerging Sources Citation Index-те индекстелуге қабылданғанын хабарлайды. Бұл индекстелу барысында Clarivate Analytics компаниясы журналды одан әрі the Science Citation Index Expanded, the Social Sciences Citation Index және the Arts & Humanities Citation Index-ке қабылдау мәселесін қарастыруда. Web of Science зерттеушілер, авторлар, баспашылар мен мекемелерге контент тереңдігі мен сапасын ұсынады. ҚР ҰҒА Хабаршысының Emerging Sources Citation Index-ке енуі біздің қоғамдастық үшін ең өзекті және беделді мультидисциплинарлы контентке адалдығымызды білдіреді.

НАН РК сообщает, что научный журнал «Вестник НАН РК» был принят для индексирования в Emerging Sources Citation Index, обновленной версии Web of Science. Содержание в этом индексировании находится в стадии рассмотрения компанией Clarivate Analytics для дальнейшего принятия журнала в the Science Citation Index Expanded, the Social Sciences Citation Index и the Arts & Humanities Citation Index. Web of Science предлагает качество и глубину контента для исследователей, авторов, издателей и учреждений. Включение Вестника НАН РК в Emerging Sources Citation Index демонстрирует нашу приверженность к наиболее актуальному и влиятельному мультидисциплинарному контенту для нашего сообщества.

Б а с р е д а к т о р ы

х.ғ.д., проф., ҚР ҰҒА академигі

М.Ж. Жұрынов

Р е д а к ц и я а л қ а с ы:

Абиев Р.Ш. проф. (Ресей)
Абишев М.Е. проф., корр.-мүшесі (Қазақстан)
Аврамов К.В. проф. (Украина)
Аппель Юрген проф. (Германия)
Баймуқанов Д.А. проф., корр.-мүшесі (Қазақстан)
Байтулин И.О. проф., академик (Қазақстан)
Банас Иозеф проф. (Польша)
Берсимбаев Р.И. проф., академик (Қазақстан)
Велесько С. проф. (Германия)
Велихов Е.П. проф., РҒА академигі (Ресей)
Гашимзаде Ф. проф., академик (Әзірбайжан)
Гончарук В.В. проф., академик (Украина)
Давлетов А.Е. проф., корр.-мүшесі (Қазақстан)
Джрбашян Р.Т. проф., академик (Армения)
Қалимолдаев М.Н. проф., академик (Қазақстан), бас ред. орынбасары
Лаверов Н.П. проф., академик РАН (Россия)
Лунашку Ф. проф., корр.-мүшесі (Молдова)
Мохд Хасан Селамат проф. (Малайзия)
Мырхалықов Ж.У. проф., академик (Қазақстан)
Новак Изабелла проф. (Польша)
Огарь Н.П. проф., корр.-мүшесі (Қазақстан)
Полещук О.Х. проф. (Ресей)
Поняев А.И. проф. (Ресей)
Сагиян А.С. проф., академик (Армения)
Сатубалдин С.С. проф., академик (Қазақстан)
Таткеева Г.Г. проф., корр.-мүшесі (Қазақстан)
Умбетаев И. проф., академик (Қазақстан)
Хрипунов Г.С. проф. (Украина)
Юлдашбаев Ю.А. проф., РҒА академигі (Ресей)
Якубова М.М. проф., академик (Тәжікстан)

«Қазақстан Республикасы Ұлттық ғылым академиясының Хабаршысы».

ISSN 2518-1467 (Online),

ISSN 1991-3494 (Print)

Меншіктенуші: «Қазақстан Республикасының Ұлттық ғылым академиясы»РҚБ (Алматы қ.).

Қазақстан республикасының Мәдениет пен ақпарат министрлігінің Ақпарат және мұрағат комитетінде
01.06.2006 ж. берілген №5551-Ж мерзімдік басылым тіркеуіне қойылу туралы куәлік.

Мерзімділігі: жылына 6 рет.

Тиражы: 2000 дана.

Редакцияның мекенжайы: 050010, Алматы қ., Шевченко көш., 28, 219 бөл., 220, тел.: 272-13-19, 272-13-18,
<http://www.bulletin-science.kz/index.php/en/>

© Қазақстан Республикасының Ұлттық ғылым академиясы, 2020

Типографияның мекенжайы: «NurNaz GRACE», Алматы қ., Рысқұлов көш., 103.

Г л а в н ы й р е д а к т о р
д.х.н., проф. академик НАН РК
М.Ж. Журинов

Р е д а к ц и о н н а я к о л л е г и я:

Абиев Р.Ш. проф. (Россия)
Абишев М.Е. проф., член-корр. (Казахстан)
Аврамов К.В. проф. (Украина)
Аппель Юрген проф. (Германия)
Баймуканов Д.А. проф., чл.-корр. (Казахстан)
Байтулин И.О. проф., академик (Казахстан)
Банас Иозеф проф. (Польша)
Берсимбаев Р.И. проф., академик (Казахстан)
Велеско С. проф. (Германия)
Велихов Е.П. проф., академик РАН (Россия)
Гашимзаде Ф. проф., академик (Азербайджан)
Гончарук В.В. проф., академик (Украина)
Давлетов А.Е. проф., чл.-корр. (Казахстан)
Джрбашян Р.Т. проф., академик (Армения)
Калимолдаев М.Н. академик (Казахстан), зам. гл. ред.
Лаверов Н.П. проф., академик РАН (Россия)
Лунашку Ф. проф., чл.-корр. (Молдова)
Мохд Хасан Селамат проф. (Малайзия)
Мырхалыков Ж.У. проф., академик (Казахстан)
Новак Изабелла проф. (Польша)
Огарь Н.П. проф., чл.-корр. (Казахстан)
Полещук О.Х. проф. (Россия)
Поняев А.И. проф. (Россия)
Сагян А.С. проф., академик (Армения)
Сатубалдин С.С. проф., академик (Казахстан)
Таткеева Г.Г. проф., чл.-корр. (Казахстан)
Умбетаев И. проф., академик (Казахстан)
Хрипунов Г.С. проф. (Украина)
Юлдашбаев Ю.А. проф., академик РАН (Россия)
Якубова М.М. проф., академик (Таджикистан)

«Вестник Национальной академии наук Республики Казахстан».

ISSN 2518-1467 (Online),

ISSN 1991-3494 (Print)

Собственник: РОО «Национальная академия наук Республики Казахстан» (г. Алматы).

Свидетельство о постановке на учет периодического печатного издания в Комитете информации и архивов
Министерства культуры и информации Республики Казахстан №5551-Ж, выданное 01.06.2006 г.

Периодичность: 6 раз в год.

Тираж: 2000 экземпляров.

Адрес редакции: 050010, г. Алматы, ул. Шевченко, 28, ком. 219, 220, тел. 272-13-19, 272-13-18.

www: nauka-nanrk.kz, bulletin-science.kz

© Национальная академия наук Республики Казахстан, 2020

Адрес типографии: «NurNazGRACE», г. Алматы, ул. Рыскулова, 103.

Editor in chief

doctor of chemistry, professor, academician of NAS RK

M.Zh. Zhurinov

Editorial board:

Abiyev R.Sh. prof. (Russia)
Abishev M.Ye. prof., corr. member. (Kazakhstan)
Avramov K.V. prof. (Ukraine)
Appel Jurgen, prof. (Germany)
Baimukanov D.A. prof., corr. member. (Kazakhstan)
Baitullin I.O. prof., academician (Kazakhstan)
Joseph Banas, prof. (Poland)
Bersimbayev R.I. prof., academician (Kazakhstan)
Velesco S., prof. (Germany)
Velikhov Ye.P. prof., academician of RAS (Russia)
Gashimzade F. prof., academician (Azerbaijan)
Goncharuk V.V. prof., academician (Ukraine)
Davletov A.Ye. prof., corr. member. (Kazakhstan)
Dzhrbashian R.T. prof., academician (Armenia)
Kalimoldayev M.N. prof., academician (Kazakhstan), deputy editor in chief
Laverov N.P. prof., academician of RAS (Russia)
Lupashku F. prof., corr. member. (Moldova)
Mohd Hassan Selamat, prof. (Malaysia)
Myrkhalykov Zh.U. prof., academician (Kazakhstan)
Nowak Isabella, prof. (Poland)
Ogar N.P. prof., corr. member. (Kazakhstan)
Poleshchuk O.Kh. prof. (Russia)
Ponyaev A.I. prof. (Russia)
Sagiyani A.S. prof., academician (Armenia)
Satubaldin S.S. prof., academician (Kazakhstan)
Tatkeyeva G.G. prof., corr. member. (Kazakhstan)
Umbetayev I. prof., academician (Kazakhstan)
Khripunov G.S. prof. (Ukraine)
Yuldashbayev Y.A., prof., academician of RAS (Russia)
Yakubova M.M. prof., academician (Tadjikistan)

Bulletin of the National Academy of Sciences of the Republic of Kazakhstan.

ISSN 2518-1467 (Online),

ISSN 1991-3494 (Print)

Owner: RPA "National Academy of Sciences of the Republic of Kazakhstan" (Almaty).

The certificate of registration of a periodic printed publication in the Committee of Information and Archives of the Ministry of Culture and Information of the Republic of Kazakhstan N 5551-Ж, issued 01.06.2006.

Periodicity: 6 times a year.

Circulation: 2000 copies.

Editorial address: 28, Shevchenko str., of. 219, 220, Almaty, 050010, tel. 272-13-19, 272-13-18,
<http://nauka-nanrk.kz/>, <http://bulletin-science.kz>

© National Academy of Sciences of the Republic of Kazakhstan, 2020

Address of printing house: «NurNaz GRACE», 103, Ryskulov str, Almaty.

**M. R. Arpentieva¹, I. V. Gorelova², K. G. Kassymova³, S. V. Lavrinenko⁴, K. A. Shumova⁵,
D. M. Malinichev⁶, V. L. Simonov⁶, A. V. Kosov¹, G. V. Garbuzova⁷, O. P. Stepanova⁸**

¹Tsiolkovskiy Kaluga State University, Kaluga, Russia;

²Volgograd Institute of Management (Volgograd Branch of the Russian Presidential Academy of National Economy and Public Administration (RANEPA), Volgograd, Russia;

³Abai Kazakh National Pedagogical University, Satbayev University, Almaty, Kazakhstan, Universitas Negeri Yogyakarta, Indonesia;

⁴National Research Tomsk Polytechnic University, Tomsk, Russia,

⁵Vladimir State University named after A.G. and N. G. Stoletovs, Vladimir, Russia;

⁶Russian State Social University, Moscow, Russia;

⁷Bryansk State Technical University, Bryansk, Russia;

⁸Nosov Magnitogorsk State Technical University, Magnitogorsk, Chelyabinsk region, Russia.

E-mail: mariam_rav@mail.ru, gorelovairina0606@gmail.com, g.kassymova@satbayev.university

HUMAN RESOURCE MANAGEMENT AND DYNAMIC CAPABILITIES OF EDUCATIONAL ENTERPRISES: PSYCHOLOGICAL, SOCIAL AND ECONOMICAL ASPECTS

Abstract. This paper focuses on the dynamic capabilities theory and foresight theory in whole to the problem of the human capital in education and its management. The main channel for building up dynamic abilities and foresight competencies of educational enterprises and specialists, as well as the focus of foresight research in modern science and management practice is working with human resources, with the human capital of firms, communities, and countries. This work also includes work with social and cultural capital, focused on improving the culture of relationships in communities, including the culture of the state, society and business. The orientation of the world social development to increase the innovation component in the economic, social and spiritual spheres of society and in its education, led to the recognition of human capital as a leading and decisive factor in the socio-economic development of systems of various scales and levels. Scientists notes that in modern conditions of globalization of markets and transnationalization of economic relations, as well as a significant level of intellectualization of modern business processes, human capital and education in business and in other spheres is a decisive factor in the competitiveness of national economy on the different levels. This moment is especially noticeable in the studies of the dynamic abilities of educational enterprises and the management of educational enterprises. This moment is also especially noticeable in foresight studies and other reconstructions of the past, present and future development of organizations. Dynamic capabilities are required if the firm is to sustain itself as markets and technologies change, although some firms will be stronger than others in performing some or all of these tasks. Foresight is a system of methods of transformation of priorities in the sphere of economy and production, social and cultural development, and in education. Human resource management in education is an important part of the problem of the dynamic abilities of educational enterprises. The management of selection, training, retraining and personnel development, the formation and enrichment of technologies for managing professional and career development are naturally part of a dynamically and steadily developing enterprise. Foresight of the development of the educational enterprise as a leading aspect includes a general assessment of the professional and career potential of the organization's employees, as well as the dynamic abilities of the organization's manager (his ability and willingness to diversify activities, training and retraining, etc.) and other specialists. The purpose of the study – analysis of foresight competence as a component of dynamic capabilities (competences) of the educational enterprises and specialists of educational enterprises in context of the human capital problems. Foresight involves the use and transformation meta-technology ("routines") of enterprise and innovation in the field of production and relations of production. It is aimed at the allocation and use of markers of change – weak and strong signals of future and probable changes. Active and accurate identification of these markers changes in education, including application and modification of routine or meta-technology of enterprise management, not only allows to predict "unpredictable", but also to intervene in the process flow, correcting them with the least expenditure of forces, material, mental and spiritual resources. In addition, it allows you to influence the

markets themselves and the surrounding enterprise reality in general. Thanks to the foresight competence and ability, the specialist in education and his company productively adapt to changes in environment (market and society), but also participate in changing it.

Keywords: human resource, management, human capital, human capital development management, dynamic capabilities, learning organizations, education, foresight, routine, innovation, meta-technology foresight competence.

Introduction. The orientation of the world social development to increase the innovation component in the economic, social and spiritual spheres of society, led to the recognition of human capital as a leading and decisive factor of the development in the socio-economic development of systems of various scales and levels (Abel, Deitz, 2012; Barney, 1991; Becker, 2009; Huselid, 1995; Molloy, Coff, Lepak, Wright, Delery, and Zenger, 2009; Ployhart, 2004; Wright, Dunford, and Snell, 2001; Crook, Todd, Combs, Woehr, & Ketchen, 2011). Human abilities, professionalism and qualification, formed from a complex of knowledge, competencies and professional experience. They serve as the fundamental basis of the modern economy, and determine not only the value of their carrier, but also create a new impetus to the development of cognitive-creative abilities and competencies, and also multiplier effect in relation to other factors of production, which determines the relevance of the study. The need to identify modern factors of qualitative transformation of human capital in education, as a dynamic strategic resource for the modern development of all spheres of society, implies its study at the main levels of formation, and provides for the integration of knowledge from various fields of science and education (Panichkina, Burova, and Masych, 2016; Panichkina, and Masych, 2016; Panichkina, and Masych, 2017).

Target setting. Human capital, as a concentrated amount of knowledge and competences in society (Abel, Deitz, 2012; Barney, 1991; Becker, 2009; Huselid, 1995; Molloy, Coff, Lepak, Wright, Delery, and Zenger, 2009; Ployhart, 2004; Wright, Dunford, and Snell, 2001; Crook, Todd, Combs, Woehr, & Ketchen, 2011). Analyzing the trends of human capital formation at the different levels, we can see that should be noted that in modern conditions of globalization of markets and transnationalization of economic relations, as well as a significant level of intellectualization of modern business processes is a decisive factor in the competitiveness of national economy. This moment is especially noticeable in the studies of the dynamic abilities of educational enterprises and the management of educational enterprises. This moment is also especially noticeable in foresight studies and other reconstructions of the past, present and future development of organizations. In addition, the level of human capital development is of key importance not only for the country's economy, but also for the successful functioning of its political, social and civil institutions. It is associated with the quality of education, medicine, law enforcement and other areas of human activity. The most important role is played by human capital in the formation and development of cultural capital, that is, the kind of capital that sets the goals and values of human development and humanity, determines its future, sets the framework for reflection of the past and awareness of the present. Human capital in many respects determines the place and role of the country in the system of modern international relations, in the "world table of ranks" It is necessary to emphasize that in turn, the level of human capital development depends on the strategic goals of the state and the development of its state and public institutions. Greater or lesser equality of opportunities for citizens in education, social, economic, medical and law enforcement assistance, state employment policies and other parameters will contribute to the successful transformation of human potential into capital, coupled with economic development processes, performance management of social and political institutions, business organizations, science and education, culture and nature (Abel, Deitz, 2012; Barney, 1991; Becker, 2009; Huselid, 1995; Molloy, Coff, Lepak, Wright, Delery, and Zenger, 2009; Kenzhaliyev, B. K., Gladyshev, S. V., Abdulvaliyev, R. A., Kuldeev, E. I., Beisembekova, K. O., Omarova, S. A., Manapova A. I., 2018; Kenzhaliyev, B. K., Kul'deev, E. I., Luganov, V. A., Bondarenko, I. V., Motovilov, I. Y., & Temirova, S.S., (2019; Zhabbasbayev, U., Ramazanova, G., Kenzhaliyev, B., Sattinova, Z., & Shakhov, S., 2016; Kenzhaliyev, B. K. Surkova, T. Yu. Berkinbayeva, A. N., 2019; Ployhart, 2004; Wright, Dunford, and Snell, 2001; Crook, Todd, Combs, Woehr, & Ketchen, 2011).

The purpose and method of the study. The purpose of the study – analysis of foresight competence as a component of dynamic capabilities (competences) of the educational enterprises and specialists of educational enterprises in context of the human capital problems. Research method – theoretical analysis of foresight competence as a component of dynamic capabilities (competences) of the educational enterprises and specialists of educational enterprises in context of the human capital problems.

Literature Review. *Theoretical background: Dynamic capabilities and foresight*

D. J. Teece proposed an elaborated framework consisting of three factors; sensing, seizing, and reconfiguring. Dynamic capabilities can usefully be thought of as belonging to three clusters of activities and adjustments: (1) identification and assessment of an opportunity (sensing); (2) mobilization of resources to address an opportunity and to capture value from doing so (seizing); and (3) continued renewal (transforming) (Arpentieva, 2017; Di Stefano, & Verona, 2010; Teece and Pisano, 1994; Teece, Pisano and Shuen, 1997; Teece, 2007; Winter, 2003). These activities are required if the firm is to sustain itself as markets and technologies change, although some firms will be stronger than others in performing some or all of these tasks. Reconfiguration requires the company to maintain strong leadership, business model redesign and asset-realignment activities. Sensing is the main foresight competence (capability) component. Foresight is a system of methods of transformation of priorities in the sphere of economy and production, social and cultural development. Human resource management is an important part of the problem of the dynamic abilities of educational enterprises. The management of selection, training, retraining and personnel development, the formation and enrichment of technologies for managing professional and career development are naturally part of a dynamically and steadily developing enterprise. Forecasting the development of the enterprise (foresight) as a leading aspect includes a general assessment of the professional and career potential of the organization's employees, as well as the dynamic abilities of the organization's manager (his ability and willingness to diversify activities, training and retraining, etc.) (Arpentieva, 2017; Cordes-Berszinn, 2013; Eisenhardt and Martin, 2000; Heger, and Rohrbeck, 2012; Højland, & Rohrbeck, 2018; Lehr, Lorenz, Willert, and Rohrbeck, 2017; Rohrbeck, 2010; Rohrbeck, 2012; Rohrbeck, and Kallehave, 2012; Rohrbeck, and Kum, 2018; Teece, 2007; Winter, 2003).

Analysis of foresight competence as a component of dynamic capabilities (competences) of the educational enterprises / managers of educational enterprises shows their leading role in the implementation of other dynamic capabilities. It shows the fact that foresight educational enterprises and industries is having a transformative impact on the development of the system, helping to transform and not just to predict the development of the industry or enterprise (Eisenhardt and Martin, 2000; Heger, and Rohrbeck, 2012; Højland, & Rohrbeck, 2018; Lehr, Lorenz, Willert, and Rohrbeck, 2017; Rohrbeck, 2010; Rohrbeck, 2012; Rohrbeck, and Kallehave, 2012; Rohrbeck, and Kum, 2018; Teece, 2007; Winter, 2003). Foresight involves the use and transformation meta-technology ("routines") of enterprise and innovation in the field of production and relations of production. It is aimed at the allocation and use of markers of change – weak and strong signals of future and probable changes. Active and accurate identification of these markers changes, including application and modification of routine or meta-technology of enterprise management, not only allows to predict "unpredictable", but also to intervene in the process flow, correcting them with the least expenditure of forces, material, mental and spiritual resources. In addition, it allows you to influence the markets themselves and the surrounding enterprise reality in General. Thanks to the foresight competence and ability, the specialist and his company productively adapt to changes in environment (market and society), but also participate in changing it (Arpentieva, 2017; Arpentieva, Gorelova, Duvalina, Braitseva, Roznova, 2018; Bykasova, Arpentieva, Gorelova, Bogomolova, 2019). The main channel for building up dynamic abilities and foresight competencies of educational enterprises and specialists, as well as the main focus of foresight research in modern science and management practice is working with human resources in situational problems, (di)stress, innovations and reforms, partial or total distractions, with the human capital of firms, communities, countries (Arpentieva, Kassymova, Lavrinenko, Tyumaseva, Valeeva, Kenzhaliyev, Triyono, Duvalina, Kosov, 2019; Arpentieva, 2015; Kassymova, Stepanova, Stepanova, Menshikov, Arpentieva, Merezchnikov, Kunakovskaya, 2018; Kassymova, Tokar, Tashcheva, Slepukhina, Gridneva, Bazhenova, Shpakovskaya, Arpentieva, 2019; Kassymova, Tyumaseva, Valeeva, Lavrinenko, Arpentieva, Kenzhaliyev, Kosherbayeva, Kosov, Duvalina, 2019; Kassymova, Kosherbayeva, Sangilbayev, Schachl, Cox, 2018; Kassymova, Valeeva, Stepanova, Goroshchenova, Gasanova, Kulakova, Menshikov, Arpentieva, Garbuzova, 2019). This work also includes work with social and cultural capital, focused on improving the culture of relationships in communities, including the culture of the state, society and business and its projections in education.

Theoretical background: human capital in learning organization

Scientists and practitioners allocate various indices of human capital:

- Capacity, which included literacy rates and the proportion of people with primary, secondary, and higher education in different age groups; - Development, including indicators of coverage and quality

obtained: primary education, vocational education, tertiary (higher) education, professional diversity of university graduates; - Deployment, which included the proportion of the employed population, unemployment rate, underemployment and their gender characteristics, - Know-how - uses data on the availability of trained personnel for high-tech industries.

As at the national level, researchers to the development of a lifelong education system attribute the process of transforming human potential into human capital at the level of economic entities aimed at improving the professional qualities of an employee throughout life ("life-long learning"). As evidenced by the results of foreign and domestic studies, continuous professional education and retraining of personnel are one of the most effective ways to form human capital. Today, an employee of the organization requires not only professional competence, but the willingness and ability to learn new knowledge and skills as the basis for its constant growth and development. The task of the organization is to create optimal conditions for continuous professional training and personnel development.

Employee development is an integral element of the human resource management system of a modern organization. The accumulation of human capital at the organizational level is largely determined by the system of professional development of personnel adopted by the company.

Today, there are several types of professional development systems. These types are most widely used in work with the labor potential of an organization in Russia: external, academic, and internal corporate and combined.

External systems include the services of T & D- (Training and Development) providers. As the results of the research show, the most demanded services of T & D providers, most of which are concentrated in Moscow (more than 50%), are short-term training: conducting ready-made trainings; training internal customer coaches; business simulations; master classes; coaching.

The specificity of the so-called academic systems consists in the fact that they are university-based tuition for prolonged educational courses (often the MBA format). For example, MBA programs, including jointly with American and British universities, are being implemented by such major domestic universities as the Financial University under the Government of the Russian Federation, the State Institute of Management, the Russian Academy of National Economy and Public Administration, etc.

Traditionally, the intra-corporate training system remains in demand, the key task of which is the applied development of the necessary competences of employees in the workplace. Finally, combined systems or, as they are also called, corporate universities (CU), are a complex of internal and external staff development tools adapted to the individual needs of a particular organization. According to experts, the last decade has been marked by Russia with an unprecedented increase in the number of corporate universities. The most developed corporate training in the banking sector, manufacturing, insurance. CU Sberbank, CU Alfabank, CU Sibur, Rosatom Corporate Academy, CU Gazpromneft, CU Russian Railways, CU MTS, CU Rostelecom, etc. corporations are among the leaders in corporate education in Russia.

At the same time, research results indicate that the attitude of Russian organizations to personnel training is much differentiated. We identify the following options for staff training strategies in Russia:

1. The complete lack of training / complete removal of the organization from the training of its employees. According to this strategy, an employer attracts personnel who already possess the necessary degree of professional competence. In addition, if the level of knowledge and skills of an employee becomes obsolete, then the responsibility for solving this problem lies on the shoulders of the employee.

2. Lack of training in the organization, but actively encouraging the employee's own efforts to improve their skills and unleash their potential. Since it is impossible to accurately calculate the effectiveness of investments in human capital, the organization refuses to train staff, but it encourages those who invest in themselves (bonus systems, business career development, etc.).

3. Formal learning. The most common strategy in Russia, which is not so much conducive to the real development of personnel, as it creates the appearance of it.

4. Selective learning. This type of strategy is used in organizations that do not have sufficient financial resources to train all categories of personnel who need it. The company invests in the most talented employees, who, after completing the training, are charged with transmitting the knowledge gained to their colleagues in the course of in-house training.

5. Systematic staff training. In this case, the personnel training system is present, but it is often modular in nature, i.e. It is formed from training programs offered by T & D providers or universities.

6. Full internal training of personnel. The principal difference of this approach is in its complex nature, aimed at systematic, consistent development of personnel. Despite the use of third-party training programs, internal components play a priority (strategic) role. It is within the framework of this strategy that corporate universities (CU) are formed.

According to a number of studies, an increasing number of successful domestic companies, implementing their own development strategy, are implementing the concept of a "learning organization" (Fulmer, Keys, 1998; O'Keeffe, 2002; Papa, Daniels, & Spiker, B. 2008; Pedler, Burgogyne, and Boydell, 1997; Santos-Vijande, López-Sánchez, Trespalacios, 2012; Serenko, Bontis, and Hardie, 2007; Senge, Kleiner, Ross, Roth, and Smith, 1999).

The learning organization is constantly in the process of self-improvement, increasing the dynamic qualities that allow it too flexibly and fully adapt to changes in the markets, as well as to shape the changes them as individuals and professionals in the development of the organization, its various structures and parties. It is important to note that in the context of a learning organization, learning is not just the accumulation of knowledge and skills, but also a meaningful development of the ability to use, change, etc.

Learning organizations are the organizations with best chance to succeed and thrive in the future.

Modern research identifies a number of characteristics of the learning organization:

- "Learning" approach to strategy development. The strategy and policy of the company are considered as continuously changing and procedural phenomena. Business plans are constantly changing, improving in the light of emerging factors.

"Participatory" or intersubjective, "evergetical" (Arpentieva, 2017) policy management. Employees of the organization take part in the formulation of the strategy and policy of the company, in the implementation of their decisions. The organization's policy reflects the values of the entire team, not just its top management.

- Informational openness, including openness on the organizational "vertical", dialogical ways of interaction of the organization's substructures. Information from "weak" and "strong voices" is more used to understand what is happening, what happened and anticipate the future in order to make the right decisions, and not as a basis for reward or punishment.

- Audit, accounting and control of the organization. Audit, accounting, budgeting and analysis systems are structured in such a way as to be useful in the process of learning and improving, including analysis of the past, present and future states of the organization. Financiers and other specialists act as consultants on special issues of using information. Financial and other subsystems of the company are built in such a way that everyone feels responsible for the resources that are at his disposal.

- Internal exchange of services and information. Each unit supplies and consumes services. Units, departments, sections have real opportunities to act on their own.

Flexible reward mechanisms. The term "remuneration" is considered broader than just pay. All employees are involved in the process of determining the most optimal forms of remuneration. The main principle of determining remuneration is the employee's contribution to the overall performance of the organization.

- "Creating opportunities" structure. Units and other "boundaries" are considered rather as a temporary structure that can be changed if necessary. Positions and roles are defined in such a way as to create conditions for experimentation and growth. An organization has a set of regulations and procedures, but they are not decisive and can always be changed after relevant discussions.

- Constant "scanning" of the environment, assessment of the immediate and distant prospects for the development of markets, capital, social and other changes, the consequences of our own activities and the activities of competitors, etc. It is the responsibility of each employee to collect information for the organization about what is being done outside of it. Each meeting of employees of the organization includes an overview of what is happening in its business environment.

- Joint projects of the organization and related groups. The organization builds partnerships with suppliers and consumers of services. The organization acts as an initiator in the implementation of joint projects with consumers, suppliers, does not miss the opportunity for joint training.

- Learning climate. The main principle of work for each employee of the organization is to always strive to study and improve what you are doing. Every employee of the organization has the right to make mistakes. Employees of the organization have the time to discuss and analyze the practice, to learn from their own experience.

- Constant self-development of each employee, working with the career prospects of the individual in the professional and educational, family and personal, social and leisure spheres.

In the concept of P. Senge, work with dynamic abilities in the context of the tasks of "educational organization" includes five basic "organizational skills" (Fulmer, Keys, 1998; Senge, 2014). He notes that the educational organization is the "organizations where people continually expand their capacity to create the results they truly desire, where new and expansive patterns of thinking are nurtured, where collective aspiration is set free, and where people are continually learning how to learn together", "Real learning gets to the heart of what it means to be human. Through learning, we re-create ourselves. Through learning, we become able to do something we never were able to do. Through learning, we re-perceive the world and our relationship to it. Through learning, we extend our capacity to create, to be part of the generative process of life. There is within each of us a deep hunger for this type of learning." (Senge, 2006: 5-6; Senge, 2014). The first "skill" is personal mastery in the perfection of the personality. Despite the fact that energetic people come into business, only a few of them remain "on the rise" over time. Most are starting to take care of themselves in order to do something that really warms the soul over the weekend. As a result, a person quickly "loses dedication, a sense of his personal value and inspiration," begins to look for other channels of inspiration and self-realization. However, only a few companies encourage their employees to move forward, and the rest as a result have "unused, wasted resources": "Personal mastery is the discipline of continually clarifying and deepening our personal vision, of focusing our energies, of developing patience, and of seeing reality objectively" (Senge, 2006: 7). The second "skill" is intellectual models. Models or stereotypes in relation to various managerial, professional, career and other situations prevent the introduction of new ideas. They must be sufficiently flexible, conscious and wide, so that new management ideas will be implemented. The third "skill" is a common vision. Unfortunately, many managers do not attach importance to the fact that their personal understanding of the development of an organization is not understood and is not shared by all employees. According to P. Senge, thanks to a common understanding, people learn not because they were told this, but because they want it (Senge, 2014). The fourth "skill" is group learning (team learning) as a free exchange of views in groups - dialogue. It is the dialogue between employees that leads to discoveries and innovations. These innovations may be completely inaccessible to everyone individually: "teams, not individuals, are the fundamental learning unit in modern organizations." (Senge, 2006: 10). The fifth "skill" is a systemic understanding ("systemic thinking"). Without it, all other skills and knowledge will remain "scattered tricks, fashionable innovations in management. We could argue that organizational learning is the 'activity and the process by which organizations eventually reach the ideal of a learning organization' (Finger, and Brand, 1999: 136; Senge, 2014). The systems viewpoint is generally oriented toward the long-term view. That's why delays and feedback loops are so important. In the short term, you can often ignore them; they are inconsequential. They only come back to haunt you in the long term (Senge, 2006: 92).

Learning organizations: provide continuous learning opportunities; use learning to reach their goals; link individual performance with organizational performance; foster inquiry and dialogue, making it safe for people to share openly and take risks; embrace creative tension as a source of energy and renewal.; are continuously aware of and interact with their environment.

There is a "bottom-up" or democratic approaches to organizational learning: Learning organizations are characterized by total employee involvement in a process of collaboratively conducted, collectively accountable change directed towards shared values or principles. (Watkins and Marsick 1992: 118). There is a nondemocratic approaches to organizational learning (as something that are initiated and developed by senior management – they involve a top-down, managerial imposed, vision): Learning Company is an organization that facilitates the learning of all its members and continuously transforms itself (Pedler, Burgoyne, and Boydell, 1996: 1). There is a technical and social approaches to organizational learning: focused on interventions based on such concepts as the "learning curve" and on the process of learning. Learning organizations are organizations where people continually expand their capacity to create the results they truly desire, where new and expansive patterns of thinking are nurtured, where collective aspiration is set free, and where people are continually learning to see the whole together. (Senge 2006: 3). As you know, the key advantages of a learning organization are efficiency and proactivity. The learning organization responds flexibly to the "challenges" of the external and internal organizational environment; moreover, it

is characterized by a proactive approach to understanding the needs for adjusting organizational policies and strategies.

The use of the “learning organization” concept in building a system of continuing professional education for the organization’s personnel, in our opinion, is an important condition for the effectiveness of development and accumulation of human capital.

Distinctive features of the training program when using the concept of "learning organization" in the modern world are as follows:

- concreteness, which is manifested primarily in the presence in the educational process of exclusively those disciplines that are necessary for the development of skills and abilities in specific professional and functional knowledge in a single organization in a specific period of time. In addition, the principle of specificity is reflected in the specifics of the curriculum, formed on the identified needs of a specific organizational structure and built in accordance with the policy and strategy of personnel development of the company;
- active-activity approach, which is implemented in the direct participation of middle managers in planning the career opportunities of the company's employees, in engaging in the decision-making process in matters of political and strategic management of organizational human potential;
- focus on the end result of training, which allows in the process of training and retraining of managerial personnel and company employees to minimize the gap in knowledge, skills and their practical implementation;
- self-management, which is manifested in the initiation by the subject of training of vocational training and retraining programs;
- systematic approach allows companies to move from a fragmented and unrelated learning process to a fundamentally different level - the level of continuity of measures in the field of personnel policy and strategy;
- digitalization of education, professional and managerial activities;
- high speed and flexibility to respond to market needs, foresight studies and foresight competencies (dynamic competencies) of educational enterprises and their employees.

Every year, new developments for both offline training and various online platforms appear on the corporate training market. Distance learning systems (DLS) are becoming more and more popular especially with large companies; there is an active development of online formats due to instant messengers and chat bots]. Today, the most popular and high-tech service is the LMS (Learning Management Systems) online learning platform, which has a number of tangible benefits (Romanenko, Stolbov, Kalachova, 2009; Davis, Carmean, Wagner, 2009; The eLearning Guild, 2018).

First, with the help of LMS, you can create a single database of e-courses and educational materials. Secondly, the LMS allows you to manage courses and learners. Thirdly, it is an electronic system, and, therefore, learning with remote access is possible. Fourth, LMS has extensive automation capabilities: validation, statistics collection, report preparation, etc. Finally, the use of an e-learning system can significantly save the budget allocated by organizations for the training and development of personnel, as well as reduce the time spent on training. In recent years, training programs based on virtual and augmented reality (VR/AR solutions) have been actively implemented in the technology of personnel training. According to experts, immersive technologies have enormous potential for increasing the efficiency of production processes. However, despite the weighty advantages of LMS-systems and VR / AR-solutions in the context of the implementation of corporate training, they cannot be assigned all the tasks related to the training and development of staff.

Modern trends in the post-industrial society are connected, in particular, with the intensification of information exchange processes in various spheres of human life and professional activity. These trends form the need for the advanced development of personnel characteristics necessary for effective interaction between people among specialists of any professions. Rapid social changes, intensive increment of information, instability, uncertainty, complexity and ambiguity of the modern world - all these characteristics of the surrounding reality determine the need for interdisciplinary coordination of the activities of a large number of different specialists in various fields of activity. If earlier it was most often discussed developing the capacities for dialogical and the flexible construction of relations between employees and companies with each other with respect to certain collective professions and firms structures, then in modern conditions the problem of developing dynamic abilities of educational enterprises and all employees. Foresight capacities (competencies) is the competencies of the "polyphonic game" on all psychological, social, econo-

mic, technological and other instruments. For example, previously these competencies were significant for professions of the human-human group”, managers of the department of strategic development. Now they turn out to be important for every employee and every department of a company, every organization, including specialists, who have traditionally not been specially engaged in planning and anticipating development paths - neither their own nor other colleges, nor other departments and aspects of organizations.

Thus, the qualitative and quantitative parameters of human capital, focused on continuous and dynamic improvement, largely determine the pace and nature of the evolutionary development of systems of various levels and scales. The task of developing human capital is among the national priorities of modern Russia and many other countries of the world. Human capital is the decisive factor in the competitiveness of the national economy and in many respects determines the place and role of the country in the system of international relations. Unfortunately, in Russia the concept of "human resources" still prevails, considering a person and his work from the point of view of their consumption and reproduction as other "consumables". This significantly reduces the dynamic abilities of educational enterprises and workers who are inclined to accept themselves as an "application" to the enterprise, and not its leading, most significant part. The understanding that human capital needs to be accumulated and created, including transferring potential abilities to actual ones, engaging, thanks to dialogic interaction and intersubjective management of the organization, thanks to regular and joint, taking into account the interests and positions of all subjects of the organization, foresight sessions and foresight, is declining. -audits, and due to the transformation of the organization into a platform of continuous self-education and mutual education, the whole palette of knowledge and skills of the members of the organization (conception of tacit knowledge).

A multi-level approach to the formation of human capital is needed, which takes into account the reflection of its past, the awareness of the present and the design of the future. The analysis of conditions and indicators is important. the productivity and efficiency of the accumulation and development of the human capital of firms, holdings, regions and countries at the macro-, meso- and micro- levels. A systematic analysis of the dynamic capabilities of the employees of the organization and the organization as a whole can be used to develop organizational, regional, federal, etc. programs. They aimed at creating optimal conditions for the formation and development of human capital, in the practice of organizations in building a system of continuous professional education of personnel / population, as well as choosing methods and technologies for training and developing people as individuals and specialists.

Conclusion. Analysis of the processes and results of the transformation of human potential into human capital at the different levels shows that they are directly related to the development of the system of continuing education and the foresight practices. Continuing vocational education and retraining of personnel is one of the most effective ways of building human capital, increasing its dynamic abilities and foresight competencies. The accumulation of human capital at the organizational level is largely determined by the system of professional development of personnel adopted by the company. The condition for the effectiveness of the development and accumulation of human capital at the different levels is the use of the concepts of a “learning organization” in building a system of continuing professional education of the organization’s personnel, as well as the creation of a system of continuous professional education of staff based on corporate training centers. Measures and programs to improve the quality of education and self-education of people in individual regions, countries and the world as a whole are also needed. Analysis of the prospects and global trends, which are reflected in the technologies of corporate training, leads to the conclusion that it is necessary to achieve a balance between online and offline learning formats. Particular attention in the system of personnel development should be paid to the search for effective methods for the development of foresight competence of staff, from managers to ordinary workers, employees, etc. The main channel for building up dynamic abilities and foresight competencies of educational enterprises and specialists, as well as the focus of foresight research in modern science and management practice is working with human resources, with the human capital of firms, communities, and countries.

**М. Р. Арпентьева¹, И. В. Горелова², Г. К. Касымова³, С. В. Лавриненко⁴,
К. А. Шумова⁵, Д. М. Малиничев⁶, В. Л. Симонов⁶, А. В. Косов¹, О. П. Степанова⁷, Г. В. Гарбузова⁸**

¹Циолковский атындағы Калуга мемлекеттік университеті, Калуга, Ресей;

²Волгоград менеджмент институты (РФ Президенттік халық шаруашылығы және мемлекеттік басқару академиясының Волгоград филиалы), Волгоград, Ресей;

³Абай атындағы Қазақ ұлттық педагогикалық университеті, Satbayev University, Алматы, Қазақстан, Ягьякарта мемлекеттік университеті, Индонезия;

⁴Томск ұлттық политехникалық зерттеу университеті, Томск, Ресей;

⁵А.Г. мен Н.Г. Столетовтар атындағы Владимир мемлекеттік университет, Ресей;

⁶Ресей мемлекеттік әлеуметтік техникалық университеті, Мәскеу, Ресей;

⁷Брянск мемлекеттік техникалық университеті, Брянск, Ресей;

⁸Магнитогорск мемлекеттік техникалық университеті Ф.И. Носова, Магнитогорск, Ресей

АДАМИ РЕСУРСТАРДЫ БАСҚАРУ ЖӘНЕ БІЛІМ БЕРУ МЕКЕМЕЛЕРІНІҢ ДИНАМИКАЛЫҚ ҚАБІЛЕТТЕРІ: ПСИХОЛОГИЯЛЫҚ, ӘЛЕУМЕТТІК ЖӘНЕ ЭКОНОМИКАЛЫҚ ӘСЕРЛЕР

Аннотация. Мақала білім беру мен білім беруді басқарудағы адами капиталды жинақтау мен сақтау проблемалары контекстіндегі білім беру ұйымдарының динамикалық мүмкіндіктері теориясы мен жиынтық теориясына арналған. Білім беру ұйымдары мен мамандардың динамикалық қабілеттері мен форсайттық құзыреттерін қалыптастырудың, сонымен қатар қазіргі ғылым мен басқару тәжірибесінде форсайттық зерттеулердің негізгі арнасы адами ресурстармен, фирмалармен, қауымдастықтармен және елдердің адами капиталдарымен жұмыс жасау болып табылады. Бұл жұмыс сонымен қатар қоғамдастықтардағы қарым-қатынас мәдениетін, оның ішінде мемлекет, қоғам және бизнес мәдениетін жақсартуға бағытталған әлеуметтік және мәдени капиталды жұмысты қамтиды. Әлемдік әлеуметтік дамудың қоғамның экономикалық, әлеуметтік және рухани салаларында инновациялық компонентті жоғарылатуға бағдарлануы адам капиталын әртүрлі құндылықтар мен деңгейлер жүйелерінің әлеуметтік-экономикалық дамуындағы жетекші және шешуші фактор ретінде тануға әкелді. Ғалымдар нарықтық жаһандану мен экономикалық қатынастардың трансұлттық жағдайында, сондай-ақ заманауи бизнес-процестердің интеллектуалды деңгейінің, адами капиталдың және бизнестегі және басқа да салалардағы білімнің әр түрлі деңгейлердегі ұлттық экономиканың бәсекеге қабілеттілігінің шешуші факторы болып табылатындығын атап өтті. Бұл мәселе әсіресе оқу орындарының динамикалық қабілеттерін және оларды басқаруды зерттеуде байқалады. Бұл сәт, әсіресе, форсайт зерттеулерінде және білім беру ұйымдарының өткен, қазіргі және болашақтағы қайта құрылуында ерекше байқалады. Егер ұйым өзгеріп жатқан нарықтар мен технологиялар жағдайында өзін қолдауы керек болса, білім беру ұйымының серпінді мүмкіндіктері айрықша маңызды. Олар бәсекелес фирмалар білім беру жүйесінің кез-келген немесе барлық міндеттерін орындауда оған қарағанда күшті болған кезде маңызды. Форсайт - экономика және өндіріс, әлеуметтік-мәдени даму және білім саласындағы басымдықтарды өзгерту тәсілдерінің жүйесі. Білім берудегі адам ресурстарын басқару білім беру кәсіпорындарының динамикалық мүмкіндіктерінің маңызды бөлігі болып табылады. Кадрларды іріктеу, даярлау, қайта даярлау және дамытуды басқару, кәсіби және мансаптық өсуді басқару технологияларын қалыптастыру және байыту динамикалық және тұрақты дамып келе жатқан кәсіпорынның табиғи бөлігі болып табылады. Жетекші аспект ретінде білім беру кәсіпорнын дамытудың болжамына ұйым қызметкерлерінің кәсіби және мансаптық әлеуетін жалпы бағалау, сонымен қатар ұйым басшысының динамикалық қабілеттері (оның қызметін әртараптандыру, оқыту және қайта даярлау қабілеті және т.б.) және басқа мамандар кіреді. Зерттеудің мақсаты - адами капитал проблемалары контекстінде білім беру кәсіпорындары мен мамандарының білім беру ұйымдарының динамикалық қабілеттерінің (құзіреттерінің) құрамдас бөлігі ретінде форсайттық құзіреттіліктерді талдау. Форсайт кәсіпорынның мета-технологияларын («күнделікті») қолдану мен қайта құруды және өндіріс пен өндірістік қатынастар саласындағы инновацияны қамтиды. Ол өзгеріс маркерлерін бөлуге және қолдануға бағытталған - болашақ және ықтимал өзгерістердің әлсіз және күшті белгілері. Білім беру саласындағы өзгерістерді, соның ішінде оқу орнын басқарудың күнделікті немесе мета-технологиясын қолдану мен модификациялауды белсенді және дәл анықтау, «болжанбайтынды» болжауға ғана емес, күш, материалдық, ақыл-ой және рухани ресурстарды аз жұмсау арқылы түзетуге араласуға мүмкіндік береді. Сонымен қатар, бұл сізге білім беру және оған қатысты нарықтар мен тұтастай алғанда оқу орнының айналасындағы шындыққа әсер етуге мүмкіндік береді. Біліктілік пен қабілеттердің алдын-ала болжауының арқасында білім беру саласындағы маман және оның мекемесі қоршаған ортадағы өзгерістерге нәтижелі бейімделеді (нарық пен қоғам), сонымен бірге оны өзгертуге қатысады.

Түйін сөздер: адами ресурстар, менеджмент, адами капитал, адами капиталды дамытуды басқару, динамикалық мүмкіндіктер, білім беру ұйымдары, білім беру, форсайт, жоспарлау, жаңашылдық, мета-технологиялық форсайт, құзіреттілік.

М. Р. Арпентьева¹, И. В. Горелова², Г. К. Касьмова³, С. В. Лавриненко⁴, К. А. Шумова⁵,
Д. М. Малиничев⁶, В. Л. Симонов⁶, А. В. Косов¹, О. П. Степанова⁷, Г. В. Гарбузова⁸

¹Калужский государственный университет им. К. Э. Циолковского, Калуга, Россия;

²Волгоградский институт управления (Волгоградский филиал Российской академии народного хозяйства и государственной службы при Президенте Российской Федерации), Волгоград, Россия;

³Казахский Национальный педагогический университет имени Абая, Satbayev University, Алматы, Казахстан, Джокьякартский государственный университет, Индонезия;

⁴Национальный исследовательский Томский политехнический университет, Томск, Россия;

⁵Владимирский государственный университет им. В. Г. и А. Г. Столетовых, Владимир, Россия;

⁶Российский государственный социальный университет, Москва, Россия;

⁷Брянский государственный технический университет, Брянск, Россия;

⁸Магнитогорский государственный технический университет им. Г. И. Носова, Россия

УПРАВЛЕНИЕ ЧЕЛОВЕЧЕСКИМИ РЕСУРСАМИ И ДИНАМИЧЕСКИЕ СПОСОБНОСТИ ОБРАЗОВАТЕЛЬНЫХ УЧРЕЖДЕНИЙ: ПСИХОЛОГИЧЕСКИЕ, СОЦИАЛЬНЫЕ И ЭКОНОМИЧЕСКИЕ АСПЕКТЫ

Аннотация. Посвящена теории динамических возможностей образовательных учреждений и теории форсайта в контексте проблем накопления и сохранения человеческого капитала в образовании и управлении образованием. Основным каналом формирования динамических способностей и форсайт-компетенций образовательных предприятий и специалистов, а также направлением форсайт-исследований в современной науке и практике управления является работа с человеческими ресурсами, с человеческим капиталом фирм, сообществ и стран. Эта работа также включает работу с социальным и культурным капиталом, направленную на улучшение культуры взаимоотношений в сообществах, включая культуру государства, общества и бизнеса. Ориентация мирового общественного развития на повышение инновационной составляющей в экономической, социальной и духовной сферах общества и в его образовании привела к признанию человеческого капитала как ведущего и решающего фактора социально-экономического развития систем различного значения и уровня. Ученые отмечают, что в современных условиях глобализации рынков и транснационализации экономических отношений, а также значительного уровня интеллектуализации современных бизнес-процессов, человеческого капитала и образования в бизнесе и в других сферах является решающим фактором конкурентоспособности национальной экономики на разных уровнях. Этот момент особенно заметен при изучении динамических способностей образовательных учреждений и управлении ими. Этот момент также особенно заметен в форсайт-исследованиях и других реконструкциях прошлого, настоящего и будущего развития образовательных организаций. Динамические возможности образовательной организации особенно значимы, если организация должна поддерживать себя в условиях изменения рынков и технологий. Они важны, когда фирмы-конкуренты сильнее ее в выполнении отдельных или всех стоящих перед системой образования задач. Форсайт - это система методов трансформации приоритетов в сфере экономики и производства, социально-культурного развития и образования. Управление человеческими ресурсами в образовании является важной частью проблемы динамических способностей образовательных предприятий. Управление отбором, обучением, переподготовкой и развитием персонала, формирование и обогащение технологий управления профессиональным и карьерным развитием являются естественной частью динамично и стабильно развивающегося предприятия. Форсайт развития образовательного предприятия как ведущего аспекта включает общую оценку профессионального и карьерного потенциала сотрудников организации, а также динамических способностей руководителя организации (его способности и желания разнообразить деятельность, обучение и переподготовку, и др.) и другие специалисты. Цель исследования – анализ форсайт-компетенций как компонента динамических способностей (компетенций) образовательных предприятий и специалистов образовательных предприятий в контексте проблем человеческого капитала. Форсайт предполагает использование и преобразование мета-технологий («рутин») предприятия и инноваций в области производства и производственных отношений. Он направлен на выделение и использование маркеров изменений – слабых и сильных сигналов будущих и вероятных изменений. Активное и точное выявление этих маркеров изменений в образовании, включая применение и модификацию рутинной или мета-технологии управления образовательным учреждением, позволяет не только прогнозировать «непредсказуемые», но и вмешиваться в ход процесса, исправляя их с наименьшими затратами силы, материальные, умственные и духовные ресурсы. Кроме того, он позволяет влиять на образовательный и смежные с ним рынки и окружающую действительность учреждения образования в целом. Благодаря предвидению компетентности и способностей, специалист в области образования и его учреждение не только продуктивно адаптируются к изменениям в окружающей среде (рынок и общество), но также участвуют в ее изменении.

Ключевые слова: человеческие ресурсы, управление, человеческий капитал, управление развитием человеческого капитала, динамические возможности, обучающиеся организации, образование, предвидение, рутина, инновация, мета-технологическое предвидение, компетенция.

Information about authors:

Arpentieva M.R., grand doctor (Grand PhD) of psychological Sciences, associate professor, corresponding member of the Russian academy of Natural History (RANS), Academician of the International Academy of Natural History, Academician of the International educational Academy, professor of the department at the development and education psychology, Tsiolkovskiy Kaluga state University, Kaluga, Russia; mariam_rav@mail.ru; <https://orcid.org/0000-0003-3249-4941>

Gorelova I.V., PhD in Economy, Associate Professor, Associate Professor of the Department of Accounting, Analysis and Audit, Volgograd Branch of the Russian Presidential Academy of National Economy and Public Administration, Volgograd, Russia; tonechka0606@yandex.ru; <https://orcid.org/0000-0001-6465-0676>

Kassymova G.K., PhD doctoral candidate, Yogyakarta State University, Indonesia; Senior lecturer at Abai Kazakh National Pedagogical University; Satbayev University in Almaty, the Republic of Kazakhstan; g.kassymova@satbayev.university; <https://orcid.org/0000-0001-7004-3864>

Garbuzova G.V., Candidate (PhD) of Psychological Sciences, Associate Professor of the department of the Engineering Pedagogy and Psychology, Bryansk State Technical University, Bryansk, Russia; garbuzowagalya@yandex.ru; <https://orcid.org/0000-0001-7675-3269>

Kosov A.V., Candidate (PhD) of Psychological Sciences, associate professor, associate professor of the department of the social and organizational psychology, Tsiolkovskiy Kaluga State University, Kaluga, Russia; sanslav@kaluga.net; <https://orcid.org/0000-0002-1691-8487>

Lavrinenko S.V., Senior Lecturer, School of Energy Engineering of the National Research Tomsk Polytechnic University, Russia; serg86@tpu.ru; <https://orcid.org/0000-0002-1471-6152>

Malinichev D.M., Candidate (PhD) of Technical Sciences, Associate Professor of the organization Russian State Social University Moscow, Russia; mmm_63@list.ru; <https://orcid.org/0000-0001-5895-7399>

Shumova K.A., PhD (Law), Associate Professor, Assistant Professor of Civil Law and Procedure Department of M. M. Speranskiy Law Institute of the Vladimir State University, Vladimir, Russia; kristinashumov@yandex.ru; <https://orcid.org/0000-0002-4050-7872>

Simonov V.L., Candidate (PhD) of Technical Sciences, Associate Professor of the organization Russian State Social University Moscow, Russia; v.simonov@rambler.ru; <https://orcid.org/0000-0001-8694-3955>

Stepanova O.P., Candidate (PhD) of Psychological Sciences, Head of the Department of Psychology at the Institute of Humanitarian Education, Nosov Magnitogorsk State Technical University, Magnitogorsk, Chelyabinsk region, Russia; olga.psihea@mail.ru

REFERENCES

[1] Abel, J. R. and Deitz, R. (2012) Do colleges and universities increase their region's human capital? *Journal of Economic Geography*. Vol. 12 (3). P. 667-675.

[2] Arpentieva M. R., Kassymova G. K., Lavrinenko S. V., Tyumaseva Z. I., Valeeva G. V., Kenzhaliyev O. B., Triyono M. B., Duvalina O.N., Kosov A. V. (2019) Environmental education in the system of global and additional education. *Bulletin of National Academy of Sciences of the Republic of Kazakhstan*. Vol. 3, (379). P. 11–18. <https://doi.org/10.32014/2019.2518-1467.45>

[3] Arpentieva M.R. (2015) Academic socio-psychological counseling and teaching of psychology. Kaluga: K.E. Tsiolkovskiy KSU publ. 670 p.

[4] Arpentieva, M.R. (2017.) Forsayt i dinamicheskiye sposobnosti predpriyatii [Foresight and dynamic abilities of educational enterprises]. *European Journal of Management Issues*. Dnipro, Ukraine, Vol. 25 (1) Special Issue Dynamic Capabilities of Firms; 10-17. DOI: 10.15421/191702

[5] Arpentieva, M.R., Gorelova, I.V., Duvalina, O.N., Braitseva, S.V., Roznova, A.V. (2018) Applying the competence-based approach to management in the aerospace industry. In: V. Borikov, S. Uchaikin, P. Baranov, V. Ivanova, A. Dolgih, I. Minin and O. Minin (Eds.). 6th International Forum for Young Scientists "Space Engineering" MATEC Web Conference 17-19 April 2018. [Electronic Edition]. Tomsk: National Instruments Russia Corporation, Vol. 158 (01003). P. 1-5. DOI: <https://doi.org/10.1051/mateconf/201815801003>

[6] Barney, J. B. (1991) Firm Resources and Sustained Competitive Advantage. *Journal of Management*. Vol. 17(1). P. 99–120.

[7] Becker, G.S. (2009) *Human Capital. A Theoretical and Empirical Analysis, with Special Reference to Education*. Chicago: University of Chicago Press.

[8] Bykasova, L.V., Arpentieva, M.R., Gorelova, I.V., Bogomolova, E.A. (2019). Fractal approach to the development strategies of educational enterprises. In: Solovev D. (eds) *Smart Technologies and Innovations in Design for Control of Technological Processes and Objects: Economy and Production*. FarEastCon 2018. Smart Innovation, Systems and Technologies (book series) (SIST). Switzerland AG: Springer, Cham, 2019, Vol. 139. P. 212-219. https://doi.org/10.1007/978-3-030-18553-4_27.

[9] Cordes-Berszinn Ph. (2013). *Dynamic Capabilities How Organizational Structures Affect Knowledge Processes*. London EC: Macmillan Publishers Limited. P. 1-340.

[10] Crook, T.R., Todd, S.Y., Combs, J.G., Woehr, D.J., & Ketchen, D.J. (2011). Does human capital matter? A meta-analysis of the relationship between human capital and firm performance. *Journal of Applied Psychology*. Vol. 96(3). P. 443–456.

[11] Davis, B., Carmean, C., Wagner, E. D. (2009) *The Evolution of the LMS: From Management to Learning*. Deep Analysis of Trends Shaping the Future of e-Learning [Electronic resource]. Educause. Santa Rosa, CA. 24 p. URL: <http://www.blackboard.com/resources/proed/guild-lmsreport.pdf> (access: 08.01.2019)

- [12] Di Stefano G., & Verona G., (2010) Dynamic Capabilities Deconstructed: A Bibliographic Investigation into the Origins, Development, and Future Directions of the research domain. *Industrial and Corporate Change*. Vol. 19(4). P. 1187-1204.
- [13] Eisenhardt K. M. and J. Martin (2000), 'Dynamic capabilities: What are they?' *Strategic Management Journal*. Vol. 21(10-11). P. 1105-1121.
- [14] Finger, M. and Brand, S.B. (1999) 'The concept of the "learning organization" applied to the transformation of the public sector' in M. Easterby-Smith, L. Araujo and J. Burgoyne (eds.) *Organizational Learning and the Learning Organization*, London: Sage. P. 130-145.
- [15] Fulmer, R.M., Keys, J.B. (1998). A Conversation with P. Senge: New Developments in Organizational Learning. *Organizational Dynamics*, 27 (2), 33-42.
- [16] Heger, T., and Rohrbeck, R. (2012) Strategic Foresight for Collaborative Exploration of New Business Fields. *Technological Forecasting and Social Change*. Vol. 79(5), P. 819-831.
- [17] Højland, J. & R. Rohrbeck (2018) The role of corporate foresight in exploring new markets: evidence from 3 case studies in the BOP markets. *Technology Analysis & Strategic Management*. Vol. 30(06). P. 734-746.
- [18] Huselid, M. A. (1995) The Impact of Human Resource Management Practices on Turnover, Productivity, and Corporate Financial Performance. *Academy of Management Journal*. Vol. 38.3. P. 635-672. DOI: 10.2307/256741
- [19] Kassymova G.K., Stepanova G.A., Stepanova O.P., Menshikov P.V., Arpentieva M.R., Merezhnikov A.P., Kuna-kovskaya L.A. (2018) Self-development management in educational globalization. *International journal of education and information technologies*. Vol. 12 (12). P. 171-176.
- [20] Kassymova G.K., Tokar O.V., Tashcheva A.I., Slepukhina G.V., Gridneva S.V., Bazhenova N.G., Shpakovskaya E.Yu., Arpentieva M. R. (2019) Impact of stress on creative human resources and psychological counseling in crises. *International journal of education and information technologies*. Vol.13 (1). P. 26-32.
- [21] Kassymova K.G., Tyumaseva Z.I., Valeeva G.V., Lavrinenko S.V, Arpentieva M.R., Kenzhaliyev B.K, Kosherbayeva A.N., Kosov A.V., Duvalina O.N. (2019) Integrative model of student and teacher stress coping: the correction of relations in educational, professional and personal interaction. *Bulletin of National Academy of Sciences of the Republic of Kazakhstan*. Vol. 3, (379). P. 2-11 <https://doi.org/10.32014/2019.2518-1467.53>
- [22] Kassymova K. G., Valeeva G. V., Stepanova O.P., Goroshchenova O.A., Gasanova R.R., Kulakova A. A., Menshikov P.V., Arpentieva M. R., Garbuzova G.V. (2019). Stress of the innovation and innovations in education. *Bulletin of National Academy of Sciences of the Republic of Kazakhstan*. Vol. 6. P.278-289.
- [23] Kassymova, G.K., Kosherbayeva, A.N., Sangilbayev, O.S., Schachl, H., Cox, N. (2018). Stress management techniques for students. *Advances in Social Science Education and Humanities Research или European Proceedings of Social and Behavioural Sciences (ASSEHR)*. Paris, France, Amsterdam, Netherlands: AtlantisPress, 2018. Vol. 198. Proceedings of the International Conference on the Theory and Practice of Personality Formation in Modern Society (ICTPPFMS 2018). <https://doi.org/10.2991/ictppfms-18.2018.10>
- [24] Kenzhaliyev, B.K., Gladyshev, S.V., Abdulvaliyev, R.A., Kuldeev, E.I., Beisembekova, K.O., Omarova, S.A., Manapova A.I. (2018). Development of technology for chromite concentrate from the slurry tailings of enrichment. *News of the national academy of sciences of the Rep. of Kaz. Series of geology and technical sciences* Vol. 3, N 429 (2018), 182-188
- [25] Kenzhaliyev, B.K., Kul'deev, E.I., Luganov, V.A., Bondarenko, I.V., Motovilov, I.Y., & Temirova, S.S. (2019). Production of Very Fine, Spherical, Particles of Ferriferous Pigments from the Diatomaceous Raw Material of Kazakhstan. *Glass and Ceramics*, 76(5-6), 194-198. <https://doi.org/10.1007/s10717-019-00163-w>
- [26] Kenzhaliyev, B. K. (2019). Innovative technologies providing enhancement of non-ferrous, precious, rare and rare earth metals extraction. *Complex Use of Mineral Resources (Kompleksnoe Ispol'zovanie Mineral'nogo Syr'a)*. 3(310), 64-75. <https://doi.org/10.31643/2019/6445.30>
- [27] Kenzhaliyev, B.K. Surkova, T.Yu. Berkinbayeva, A.N. (2019) To the question of the intensification of the processes of uranium extraction from refractory raw materials. *Metalurgija*, Vol. 58. P. 75-78.
- [28] Lehr, T., U. Lorenz, M. Willert, & R. Rohrbeck (2017) Scenario-based strategising: Advancing the applicability in strategists' teams. *Technological Forecasting and Social Change*. Vol. 124. P. 214-224.
- [29] Molloy, J., Coff, R., Lepak, D., Wright, P., Delery, J., and Zenger, T. (2009) Formation of a Multidisciplinary Interest Group on Human Capital and Firm Performance. Proposal to Strategic Management Society, Board of Directors. Chicago: Strategic Management Society Archives, Strategic Management Society Executive Office.
- [30] O'Keefe, T. (2002). *Organizational Learning: a new perspective*. *Journal of European Industrial Training*. Vol. 26 (2). P. 130-141.
- [31] Panichkina, M.V., and Masych, M.A. (2016). Razvitiye mekhanizmov adaptatsii sub"yektov malogo i srednego predprinimatel'stva v usloviyakh neopredelennosti i povyshennogo riska [Development of adaptation mechanisms for small and medium-sized businesses in the context of uncertainty and increased risk]. *Fundamental research*. Vol. 2-3. P. 678-682.

- [32] Panichkina, M.V., and Masych, M.A. (2017). Tendentsii i zakonomernosti sotsial'no-ekonomicheskogo razvitiya Rossii i zarubezhnykh stran s pozitsii proizvoditel'nosti truda [Trends and patterns of socio-economic development of Russia and foreign countries from the standpoint of labor productivity]. *Nauchno-tehnicheskiye vedomosti Sankt-Peterburgskogo gosudarstvennogo pedagogicheskogo universiteta. Ekonomicheskkiye nauki* [Scientific and technical statements of the St. Petersburg State Pedagogical University. Economics]. Vol. 6. P. 50-63.
- [33] Panichkina, M.V., Burova, I.V., and Masych, M.A. (2016) Adaptatsionnyye mekhanizmy rynka truda v krizisnykh usloviyakh: mezhdunarodnyy aspekt [Adaptation mechanisms of the labor market in crisis conditions: the international aspect]. *Fundamental research*. Vol. 7-1. P. 162-166.
- [34] Papa, M.J., Daniels, T.D., & Spiker, B. K. (2008). *Organizational Communication: Perspectives and Trends*. Thousand Oaks: Sage Publications, p. 1-200.
- [35] Pedler, M., Burgoyne, J. and Boydell, T. (1997). *The Learning Company: A strategy for sustainable development*. London; McGraw-Hill Publ.
- [36] Pedler, M., Burgoyne, J. and Boydell, T. (1996) *The Learning Company. A strategy for sustainable development*, London: McGraw-Hill Publ.. P. 1-25.
- [37] Ployhart, R. E. (2004) *Organizational Staffing: A Multilevel Review, Synthesis, and Model*. In *Research In J.J. Martocchio (ed.) Personnel and Human Resources Management*. Oxford: Elsevier. Vol. 23. P. 121–176.
- [38] Rohrbeck, R. (2010). *Corporate Foresight: Towards a Maturity Model for the Future Orientation of a Firm*. Heidelberg and New York: Physica-Verlag, Springer.
- [39] Rohrbeck, R. (2012) Exploring Value Creation from Corporate-Foresight Activities. *Futures*. Vol. 44(5). P. 440-452.
- [40] Rohrbeck, R. and Kallehave, P. (2012) The Role of Corporate Foresight in Promoting Sustainability. In: *UN Global Compact International Yearbook, United Nations Publ.*, June. P. 184-188.
- [41] Rohrbeck, R. & Kum M. E. (2018) Corporate foresight and its impact on firm performance: A longitudinal analysis. *Technological Forecasting and Social Change*, Vol. 129. P. 105-116.
- [42] Romanenko, I., Stolbov, V., Kalachova, V (2009). The way of organization of knowledge control in Distance Learning Systems. *The progressive information technology*. Vol. 2. P. 127 – 130.
- [43] Santos-Vijande, M.L.; López-Sánchez, J. Á.; Trespalacios, J. A. (2012). How organizational learning affects a firm's flexibility, competitive strategy, and performance. *Journal of Business Research*. Vol. 65 (8). P. 1079–1089.
- [44] Senge P. (2006) *The Art and Practice of the Learning Organization*. New York: Bantam Doubleday Dell Publishing Group, 1-455.
- [45] Senge P. (2014) *The Dance of Change: The challenges to sustaining momentum in a learning organization*. New York: Crown Business. P. 1-610.
- [46] Senge, P., Kleiner, A., Ross, R., Roth, G., Smith, B. (1999). *The Dance of Change*. New York: Currency Doubleday Publ.
- [47] Serenko, A., Bontis, N. and Hardie, T. (2007). Organizational size and knowledge flow: A proposed theoretical link. *Journal of Intellectual Capital*. Vol. 8 (4), 610-627.
- [48] Teece D.J. and G. Pisano (1994). The dynamic capabilities of firms: An introduction. *Industrial and Corporate Change*. Vol. 3(3). P. 537-556.
- [49] Teece D.J., G. Pisano and A. Shuen (1997). Dynamic capabilities and strategic management. *Strategic Management Journal*. Vol. 18(7). P. 509-533.
- [50] Teece, D.J. (2007) Explicating dynamic capabilities: The nature and micro foundations of (sustainable) enterprise performance, *Strategic Management Journal*. Vol. 28 (13), P. 1319-1350.
- [51] The eLearning Guild (2018) 2019 Predictions for eLearning. *Community & Resources for eLearning Professionals*. [Electronic Edition]. *Community & Resources for eLearning Professionals: The eLearning Guild*, December, 30. URL: <https://www.elearningguild.com/publications/128/2019-predictions-for-elearning/> (access: 08.01.2019)
- [52] Zhabasbayev, U., Ramazanova, G., Kenzhaliev, B., Sattinova, Z., & Shakhov, S. (2016). Experimental and calculated data of the beryllium oxide slurry solidification. *Applied Thermal Engineering*, 96, 593–599. <https://doi.org/10.1016/j.applthermaleng.2015.11.114>
- [53] Watkins, K. and Marsick, V. (1992) Building the learning organization: a new role for human resource developers. *Studies in Continuing Education*. Vol. 14(2). P. 115-129.
- [54] Winter, S.G. (2003). Understanding Dynamic Capabilities. *Strategic Management Journal*. Vol. 33 (2). P. 91-101.
- [55] Wright, P.M., Dunford, B.B., and Snell, S.A. (2001) Human Resources and the Resource-Based View of the Firm. *Journal of Management*. Vol. 27(6). P. 701–721.

Publication Ethics and Publication Malpractice in the journals of the National Academy of Sciences of the Republic of Kazakhstan

For information on Ethics in publishing and Ethical guidelines for journal publication see <http://www.elsevier.com/publishingethics> and <http://www.elsevier.com/journal-authors/ethics>.

Submission of an article to the National Academy of Sciences of the Republic of Kazakhstan implies that the described work has not been published previously (except in the form of an abstract or as part of a published lecture or academic thesis or as an electronic preprint, see <http://www.elsevier.com/postingpolicy>), that it is not under consideration for publication elsewhere, that its publication is approved by all authors and tacitly or explicitly by the responsible authorities where the work was carried out, and that, if accepted, it will not be published elsewhere in the same form, in English or in any other language, including electronically without the written consent of the copyright-holder. In particular, translations into English of papers already published in another language are not accepted.

No other forms of scientific misconduct are allowed, such as plagiarism, falsification, fraudulent data, incorrect interpretation of other works, incorrect citations, etc. The National Academy of Sciences of the Republic of Kazakhstan follows the Code of Conduct of the Committee on Publication Ethics (COPE), and follows the COPE Flowcharts for Resolving Cases of Suspected Misconduct (http://publicationethics.org/files/u2/New_Code.pdf). To verify originality, your article may be checked by the Cross Check originality detection service <http://www.elsevier.com/editors/plagdetect>.

The authors are obliged to participate in peer review process and be ready to provide corrections, clarifications, retractions and apologies when needed. All authors of a paper should have significantly contributed to the research.

The reviewers should provide objective judgments and should point out relevant published works which are not yet cited. Reviewed articles should be treated confidentially. The reviewers will be chosen in such a way that there is no conflict of interests with respect to the research, the authors and/or the research funders.

The editors have complete responsibility and authority to reject or accept a paper, and they will only accept a paper when reasonably certain. They will preserve anonymity of reviewers and promote publication of corrections, clarifications, retractions and apologies when needed. The acceptance of a paper automatically implies the copyright transfer to the National Academy of Sciences of the Republic of Kazakhstan.

The Editorial Board of the National Academy of Sciences of the Republic of Kazakhstan will monitor and safeguard publishing ethics.

Правила оформления статьи для публикации в журнале смотреть на сайте:

www.nauka-nanrk.kz

ISSN 2518-1467 (Online), ISSN 1991-3494 (Print)

<http://www.bulletin-science.kz/index.php/en/>

Редакторы *М. С. Ахметова, Т. А. Апендиев, Д. С. Аленов*
Верстка на компьютере *Д. А. Абдрахимовой*

Подписано в печать 10.02.2020.
Формат 60x881/8. Бумага офсетная. Печать – ризограф.
19,5 п.л. Тираж 500. Заказ 1.