
G. Jussupova
PhD candidate at the National School of Public Policy
Academy of Public Administration under the President of the Republic of Kazakhstan.

Abstract
The processes of globalization affect many economic and social processes, and the labor market is no exception. The situation in the labor market is always the center of attention for the state, business, and society as a whole. It determines the economic development of the country, social policy, the competitiveness of enterprises, and human capital. This article discusses global challenges such as the fourth industrial revolution, the digital transformation of society and industry, migration processes and informal employment, the problems of identifying social status for the population, and the system of accounting for social benefits. Because the labor market is experiencing the strongest impact of political, economic, social, and demographic processes, it has its own characteristics in each country, and this article discusses the internal problems of the Kazakhstan labor market. In addition, the article provides suggestions for improving social policy issues, employment through the automation of social processes and services, the digitalization of the public and private sectors, and the creation and development of information infrastructure of the labor market.

Keywords: digital technologies, digital government, social policy, social status, employment, labor market, unemployment

Introduction
Currently, according to the International Labor Organization (ILO), more than 192 million people in the world are unemployed, which is 5 million people less than in 2016. The average unemployment rate is 5.6 percent (see Table 1.), and in 2019, this situation will remain unchanged. More than 700 million people in the world live in poverty. This causes severe problems of social insecurity in the population and an increase in labor-based migration. In 2013, international movement amounted to more than 232 million people, of which 89 percent of the working-age population and according to preliminary forecasts will grow. Due to military conflicts, migration has critically affected the labor market in Europe. The lack of employment opportunities for young people under the age of 25 is another severe global problem. The youth unemployment rate in the world is 13 percent, or 3 times higher than that of the adult population (4.3 percent). Due to demographic trends, the labor market is replenished annually by 40 million people, which requires the creation of more than 600 million new jobs in the global economy until 2030. At the same time, this is mainly in the services sector, which today accounts for about 50 percent of all employed people in the world compared with 29 percent in agriculture and 21 percent in industry.

One of the global challenges of the labor market is the fourth industrial revolution (which includes robotics, digital technologies, process automation, nanotechnology, 3D printing, and biotechnology). On the one hand, innovation contributes to improving the productivity and efficiency of enterprises, lowering prices for products, increasing demand, expanding production and creating jobs. On the other hand, it reduces the need for labor resources, causes a reduction in the number of enterprises at enterprises using automation, and, in general, inflicts an increase in the so-called “technological” unemployment. Since 2017, the State Program “Digital Kazakhstan” has been launched in Kazakhstan, within which the digital transformation of the country’s economy, the development, and creation of new modern automated

---

production facilities, the creation of a digital society, and the implementation of the next stage of e-Government - Digital Government are provided.

It is predicted that, on average, about 30 percent of jobs in the world may disappear because of a new wave of automation. This risk is mainly to those with professions with low and medium level qualifications (such as drivers, cashiers, attendants) because they concentrate mostly on the routine work functions.

For example, scientists Karl Frey and Michael Osborne in 2013 determined that 47 percent of the professions in the United States are at high risk of automation for 10–20 years.1 Continuing this study with Citibank, in 2016, the authors extended the findings to more than 50 countries; on average in OECD countries, algorithms will replace people in 57 percent of all occupations.2

World Economic Forum experts (WEF) analyzed 15 developed and developing economies of the world covering 65 percent of the workforce and concluded that about 27 percent of jobs in the world will disappear as a result of a new wave of automation, and by the end of 2020, the number of posts will decrease by 5, 1 million units, two thirds of which are office and administrative.3 At the same time, according to the OECD report, the conclusions on the reduction are somewhat conservative, as only 9 percent of employees can be replaced with algorithmic solutions.4

Globalization and technological changes have contributed to the growth of the transition from “traditional” to non-standard employment (partial, temporary, and self-employment). The number of employed in part-time jobs is increasing by about 11 million per year. This is facilitated by employer initiatives to reduce costs, as well as the very desire of employees to be more mobile and independent freelancers.

In the US, 50 million people (45 percent of the workforce) are employed with the ability to work from home at least from time to time, and 2.9 million people work remotely permanently. For example, at IBM, 128 thousand specialists (29 percent) work remotely worldwide. An employer saves an average of $10,000 per year per employee when transferring an employee to remote work. It is estimated that by 2020, there will be a new freelancer every second in the United States.5

This type of employment is attractive because there is no hard work schedule, the employee can find a “family-work” balance, and he or she can get several sources of income from the implementation of various projects in different countries. However, there is another problem. Temporary workers are less likely to receive training sponsored by the employer, which means their skills are becoming obsolete. Besides, the growth of partial employment calls into question the existing social insurance system, which provides for only two types of work (full-time and unemployed). As a result, freelancers face difficulties in obtaining a loan and are not entitled to social and pension contributions. Therefore, a revision of social policy is now required, taking into account structural shifts like employment to ensure equality of all workers.

In Kazakhstan, this type of employment was not sufficiently widespread. Only less than 5 percent of workers in Kazakhstan are hired based on fixed-term contracts, and only 2.7 percent of employees work less than 30 hours a week, which is the lowest rate compared to OECD countries.6 This is due to the legal regulation of the labor relations of the Republic of Kazakhstan and undeveloped legislation regarding fixed-term contracts and part-time employment.

The current state of the labor market in Kazakhstan

Currently, according to the international classification of employment status (ISCE-93), there are two types of employment employees and self-employed. In Kazakhstan, the number of employees increased by 1.8 million people (to 6.6 million),

---

1 Frei C.B., Osborn M.A. (2013). The future of employment: how susceptible are jobs to computerisation?
2 Frei C.B., Osborn M.A., Holmes C. (2016). Technology at Work v2.0.: The future is not What it used to be. Citi GPS: Global Perspectives & Solutions
the number of unemployed decreased by 184 thousand people (to 441 thousand), and the number of self-employed workers increased by 563 thousand people (up to 2.1 million).\(^1\)

In the last 8 years the overall unemployment rate fell in the previous 8 years 1.6 times to 4.9 percent, and youth unemployment (15-24 years) fell 3.1 times to 3.8 percent, which is one of the lowest in the world, with the other statistics being the United States (8.7 percent), Australia (11.8 percent), Canada (11.3 percent), and Sweden (16.4 percent). Over the past eight years, there has been a positive trend in reducing unemployment in Kazakhstan. In the Global Competitiveness Index of the World Economic Forum for the Labor Market Efficiency component, Kazakhstan ranks 35th with an average score of 4.6, ahead of China (38th) and Russia (60th). According to official statistics, over the past eight years, the share of the informally employed population decreased by more than two times, from 37 percent to 16 percent. The related indicators for such developed countries as Finland (18 percent), Germany (16 percent), Austria (16 percent) and France (15 percent).\(^2\)

As of 1 July 2018, 1.2 million people or 14 percent are employed in agriculture, 1.7 million people (20 percent) in industry and construction, and 5.7 million people (66 percent) work in the service sector in Kazakhstan. A similar trend is taking shape all over the world. In the United States, the share of the service sector in the overall structure of employment is 81 percent, as it is in the United Kingdom; in Canada, it is 79 percent, in Finland, 74 percent, and South Korea, 70 percent.\(^3\)

Against the background of global trends, the internal processes of Kazakhstan influence the further development of the Kazakhstan labor market.

First, 28 percent (about 589 thousand people) of self-employed people work “in the shadows”, as they have no official social status. In Kazakhstan, there is no separate legal form for the self-employed, and they automatically receive an "informal" status. Also, accounting for self-employed persons is complicated due to the lack of an information system for identifying the social status of a citizen of Kazakhstan. This is a huge problem, as information changes daily, and statistics are collected only once a year. It does not show a clear operational picture and causes difficulties in calculating social benefits and compensation, which causes the possibility of abuse of public authority and manifestations of corruption violations. It also impedes the introduction of Compulsory Social Health Insurance, more accurate budget planning, and tax reforms of the universal declaration. As a result, these reforms were postponed until 2025.

Secondly, there is a relatively low level of labor productivity in the economy. Insufficient use and development of modern technologies in the economy of the country restrain the growth of labor productivity. Kazakhstan still lags behind developed countries by an average of four times in this indicator.

Thirdly, there is also a low level of competence in labor resources. In the conditions of a new economy and technological revolution, the requirements for skills and qualifications of labor resources are growing. In Kazakhstan, only 11 percent of the country's population is employed in the field of the knowledge economy; in the employment structure of advanced countries, people of such a formation now make up at least 25 percent.

In the annual Global Talent Competitiveness Index (GTCI) in 2018, the position of Kazakhstan compared to 2013 started to deteriorate, the country dropped from 46th to 51st place out of 118 countries. Indicators on global knowledge and skills improved (+28 positions in the ranking). The leading positions in the ranking are occupied by the states of Switzerland and the United States.

The quality of education and the system of personal training do not correspond to the real requirements of the labor market, by inertia, humanitarian specialists produce (over 60 percent), and there is no system for flexible analysis of the labor market and the formation of state order. Grants are allocated according to the old scheme mainly to national and state universities.

---


\(^3\) OECD, (2017). Building Inclusive Labour Markets in Kazakhstan: A focus on Youth, Older Workers and People with disabilities
Besides, there is a very poorly developed system of learning throughout life. Many specialists who graduated from higher educational institutions several years ago are forced to relearn skills since new technologies, and innovative approaches place their demands on employees of organizations. At the same time, it is necessary to strengthen the integration of education, science, and production for the formation of updated educational programs and standards.

With the introduction of new technologies in traditional industries, there are risks of the release of obsolete occupations. There is an evident shortage of specialists with new competencies, such as IT, information security, cloud solutions, and so on.

**Fourth, there is a need for digitization in labor market infrastructure.** The lack of a systematic approach to the development of the labor market, digitalization of this area, and single electronic labor exchange, integrated with all information systems for the provision of vacancies, social benefits, and employment, causes problems of an objective analysis of the labor market. As a result, the majority of citizens are trying to find work independently, employers are experiencing a shortage of qualified specialists, enterprises do not have access to a database of job seekers, and the Ministry of Education does not see a real demand for personnel to form a state order. The measures are taken to modernize the employment services, establish an electronic labor exchange, and involve private employment agencies in the employment process require the involvement of all stakeholders and the development of joint solutions.

Consideration of unemployment and employment are based on the system of identification of the social status of a citizen of Kazakhstan. Unfortunately, the leading economic and social indicators are based on statistical data, preferably collected manually and on analytical reporting forms of enterprises and organizations. Moreover, the frequency of collecting such data is carried out once a year. Due to the lack of information systems, the digitization of this sector, the change of social status from the category of workers to the unemployed is done manually, without cross-checking data, and this generally distorts the overall picture of this problem. This causes the ambiguity of the appointment of social benefits and the possibility of corruption violations. As a result, the lack of targeted social assistance to the population, the inefficient use of public funds, the provision of inaccurate information about social policy in the country. For example, the number of self-employed people, according to official statistics, is about 2.1 million people, and in fact, over 3 million people have an indefinite social status. This problem is resolved by the complete digitalization and implementation of Digital Government in this sector, the creation of information systems, and social status identification databases with the provision of adequate access to all labor market stakeholders (employees, employers, social services, employment agencies, etc.).

**Conclusion**

An essential condition for the development of human capital is training, taking into account the real needs of the labor market, not only for the current moment but also for the future.

To obtain the real needs of the labor market and conduct high-quality planning for the future needs of the economy, it is necessary to continue working on the creation of the National Labor Market Forecasting System of Kazakhstan, which will be integrated with all information systems in the sphere of employment, a single labor exchange. This system will make it possible to form a likely need for the number and composition of the required labor resources in the medium and long term. It should take into account migration and demographic processes, market conditions, and global trends. It is necessary to unite the efforts of state employment centers for private recruitment agencies to ensure the effectiveness and efficiency of the development of the labor market.

The second prerequisite is the creation of an information system for identifying the social status of each citizen, with providing access to this system to employers, social services, and employment agencies. This opportunity will allow for a clear identification of social status, implementation in the targeting of social benefits, and the registration of self-employed and informally employed workers. This system will become the basis for the provision of social services in an automated mode, implement proactive public services, and implement social reforms, such as Mandatory Social Medical Insurance and per capita financing.

In order to ensure a balance between supply and demand of working places, work should be intensified on the development of the National Qualifications System, which should take into account the real requirements for labor resources, their qualifications, and quality, and the education system will provide training for relevant specialists to carry out advanced training systems. In order to provide targeted support to the least productive and low-skilled categories of citizens, it is necessary to continue implementing and improving state employment assistance programs, including tools for short-term
training, developing entrepreneurial initiatives, and stimulating the migration of labor required of the population from densely populated regions of the country.

Thus, for the active development of the labor market, it is necessary to take into account the impact of all factors and to involve all stakeholders in solving this issue, providing a systematic solution to this issue. Concurrently, a set of incentive and awareness-raising measures with the population of the country must be carried out. The new systematic approach in the field of employment will increase the percentage of jobs and the competitiveness of the country and its citizens.

References


Table 1. The dynamics of the main indicators of unemployment in Kazakhstan for the period 2010-01 July 2018

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Unemployed population Thousand people</td>
<td>496,5</td>
<td>473,0</td>
<td>474,8</td>
<td>470,7</td>
<td>451,9</td>
<td>454,2</td>
<td>445,5</td>
<td>442,0</td>
<td>441,4</td>
</tr>
<tr>
<td>Unemployment rate, %</td>
<td>5,8</td>
<td>5,4</td>
<td>5,3</td>
<td>5,2</td>
<td>5,0</td>
<td>5,1</td>
<td>5,0</td>
<td>4,9</td>
<td>4,9</td>
</tr>
<tr>
<td>Female unemployment rate,%</td>
<td>6,6</td>
<td>6,2</td>
<td>6,5</td>
<td>5,9</td>
<td>5,8</td>
<td>5,6</td>
<td>5,5</td>
<td>5,4</td>
<td>5,3</td>
</tr>
<tr>
<td>Youth unemployment rate (15-24 years),%</td>
<td>5,2</td>
<td>4,6</td>
<td>3,9</td>
<td>3,9</td>
<td>3,8</td>
<td>4,2</td>
<td>3,8</td>
<td>3,8</td>
<td>3,8</td>
</tr>
<tr>
<td>Youth unemployment rate (15-28 years),%</td>
<td>6,6</td>
<td>6,1</td>
<td>5,4</td>
<td>5,5</td>
<td>4,2</td>
<td>4,4</td>
<td>4,1</td>
<td>3,9</td>
<td>3,9</td>
</tr>
<tr>
<td>The level of long-term unemployment,%</td>
<td>2,2</td>
<td>2,1</td>
<td>2,5</td>
<td>2,5</td>
<td>2,4</td>
<td>2,5</td>
<td>2,2</td>
<td>2,2</td>
<td>2,2</td>
</tr>
</tbody>
</table>

Resource: Committee on statistics. Ministry of National Economy of the Republic of Kazakhstan