

# WORKFORCE MARKET RESEARCH: THE CASE OF ŠIAULIAI REGION

**Ligita Šalkauskienė**  
Šiauliai State College  
Lithuania

**Rasa Pocevičienė**  
Šiauliai State College  
Lithuania

## Annotation

*The workforce market is rapidly changing technologically, complex today's economics restructuring and requirements to the labor market are transforming. The issue of matching workforce market supply and demand from a requirements occupational perspective is becoming more important than ever. Workforce is a core value of a company. It is very important to analyze and predict what qualifications will need professionals to have in order to successfully participation in the labor market. This area of research is one of the components that ensure the quality of educational teaching. Quality is ensured by developing appropriate study programs that are in line with current / future labor market challenges. Depending on the projected demand of the labor market, study programs can be oriented towards specialization. The article presents the workforce market research on the example of Siauliai region.*

**Keywords:** workforce, labor market, demand, supply, human resources.

## Introduction

Workforce market forecasting and the goals to it have been transformed along with social and economic challenges. Workforce market analysis performs the functions of assessing the current situation and predicting a possible future scenario. This strengthens the planning of workforce resources policy and creates preconditions for a better match between labor market demand and supply. The results of the specialist needs analysis also serve to reduce information asymmetries in education and the labor market. The spontaneous distribution of the workforce market in the labor market has many shortcomings. Due to the diverse nature of the labor market and pre-determined rigidities, there may be large-scale long-term mismatches in the labor market on both the supply and demand sides (i.e. mismatch between what employers need and what the labor market offers). This situation is characterized by a high level of unemployment among people with a certain level of education and, on the other hand, by the difficulty for companies to find the necessary skilled workers.

**Research problem.** In order to maintain constant success and achieve the set goals in the company, great attention must be paid to the proper attraction of the workforce. Attracting the right workforce to the market helps to respond in a targeted way to economic change. The aim is to attract as many skilled workers as possible to the labor market. It is also important to increase the demand for workforce. There is a rapid development of international economic cooperation, rapid growth of technological progress and, at the same time, growth of workforce needs. Companies that aim to remain competitive are undergoing rapid change. There is also an increasing need for workforce. At the same time, it should be noted that there is a lack of research on the need for different types of specialists and the specifics of their identification. For this reason, the problem analyzed in the article is related to the insufficient analysis of the workforce market in Siauliai region.

The object of the research - the workforce market.

The aim of the research is to analyze the workforce market in Siauliai region.

Research tasks:

1. Define the concept of the workforce market;
2. Identify workforce market sources;
3. To determine the workforce market in Siauliai region.

## Research methodology

*Justification of the research and enforcement procedures.* The need of the workforce market in Šiauliai region is based on the analysis of theoretical (changes in the concept of workforce) and practical discourse: Lithuanian labor market supply and demand forecasts and trends, strategic documents of the Republic of Lithuania, Šiauliai region, During the process of

selection of human resources or identification of the demand for labor, the most popular CV databases were used: [www.cvbankas.lt](http://www.cvbankas.lt), [www.cv.lt](http://www.cv.lt), [www.pvsistemas.lt](http://www.pvsistemas.lt), <https://exemigrantai.lt/> and others. The analysis of the main agencies providing human resources search services in Lithuania and Šiauliai region was used: UAB Personalo valdymo sistemas, UAB Nermeka (Hirelabas), UAB Guarana, Headex Group and others. According to the results of the research of the most necessary professions in Šiauliai and Telšiai companies conducted by Šiauliai Chamber of Commerce, Industry and Crafts (2021).

**Research period.** In order for the study education system to meet the needs of the market and future forecasts, various documents and statistical and research data were analyzed in 2021, in January-March.

**Research methods.** General research methods were used to substantiate the research - analysis and synthesis of scientific literature; document analysis. Data analysis was based on the methodology of V. Žydžiūnaitė (2017). Data analysis was performed by selecting content analysis criteria (structural units). The data of the content analysis are recorded in the tables, the frequency of recurrence of the structural units and their compliance with the selected criteria are highlighted.

### The concept of workforce

In the scientific literature and various sources, the workforce can be named in two ways - as a statistical indicator describing the number of active population and as the ability of people to work (see Table 1).

Table 1  
Definitions of workforce

Year	Author (source)	Definition
2009	J. Bagdanavičius	The workforce is a group of people who have the opportunity to be employed.
2014	Glossary: Labour force	The workforce or the economically active population is employed (employed and self-employed) and unemployed
2019	Organization for Economic Co-operation and Development (OECD)	The workforce or currently active population consists of all persons who meet the requirements of the employed or unemployed.
2021	Lithuanian Department of Statistics	The workforce is all employed and unemployed
2021	Universal Lithuanian encyclopedia	Workforce is a statistical indicator describing employed or actively looking for a job in the country. According to international standards, the terms workforce and economically active population are synonymous. In this sense, they are used in sample workforce surveys (in Lithuania since 1994).
2021	Glossary of Economic Terms	Workforce is the physical and mental abilities of people that can be used for economic or other socially useful activities.

Source: compiled by the authors of the article according to the sources presented in the table

In many sources, workforce is described as labor supply, and this term includes all employed or willing / able to work (looking for work) residents, regardless of their age. According to J. Bagdanavičius (2009), the workforce consists of people of working age from 14 years of age to retirement, who are considered active employees (working or in search of work). A young person of working age is also included in the workforce. In the Law on the Framework of Youth Policy of the Republic of Lithuania, a young person is a person from 14 years of age. In the context of modern society, young people enter the labor market at an increasingly later age as more emphasis is placed on obtaining higher education. According to R. Brazienė and I. Mikutavičienė (2013), young people are studying longer and longer, therefore the labor market situation is changing, more and more young people tend to live as if in an “extended present”. The workforce does not include children under the age of 14, students, pensioners, workers on parental leave, prisoners and those who do not want to work. However, according to the Law on Employment of the Republic of Lithuania (2021), the list of persons additionally supported in the labor market has been supplemented with three groups of persons. The first group consists of pregnant women, the child's mother (mother-in-law) or father (adoptive parent), the child's guardian, career and persons actually raising a child (adopted) under 8 or a disabled child (adopted) under 18 and persons caring for disabled family members, who are in constant care or supervision. The second group - returning from places of imprisonment, when the period of imprisonment was at least 6 months. The third is addicted to narcotic, psychotropic and other psychoactive substances after completing psychological social and / or vocational rehabilitation programs, if they apply to the Employment Service no later than within 6 months of completing the psychological social and / or vocational rehabilitation program.

The OECD documents (2019) state that the workforce or the currently active population consists of all persons who meet the requirements of the employed or unemployed. In the Law

on Employment of the Republic of Lithuania (2021), the employed are defined as those who work at least one hour a week and receive a certain salary / profit or have a permanent job, but are temporarily not working due to illness, leave or work activities. Unemployed are defined as people who are unemployed but actively looking for work and able to start work at any time. For a person to be considered part of the workforce, he or she must be able to work, want to work, and be in the job search.

In business enterprises, the workforce is recognized as employees / human resources / human capital as a commodity that stands out in the labor market due to certain specific features: the workforce is characterized by deliberate activities, continuous improvement and can improve itself organization, as well as this product itself chooses its buyer t. y. the workplace, taking into account the proposed salary, the microclimate and values of the organization, future career opportunities or professional development, job satisfaction and taking into account the motivational measures available in the organization (see Table 2).

Table 2

Definitions of employee, staff, human resources, human capital

Year	Author	Definition
2010	L. Labanova	Human resources are all the people working in an organization, their skills, abilities, competencies, knowledge and experience, creativity and methods that enable them to do the work required by the organization and which the organization uses and improves.
2010	O M. K. Kagochi, C. M. Jolly	Human capital is a set of specialized skills that is acquired through human learning. A special form of human capital is knowledge.
2012	A. Jakutis, V. Petraškevičius, A. Stepanovas, D. Andriušaitienė	An employee is a person who performs physical and mental work.
2014	I. Lapinskaitė, M. Krikščiūnaitė	Human resources are the physical and mental strength of all people.
2016	A. Kalvionytė, R. Karsokienė	Human resources are not material resources, but human capital.
2017	A. Bortnikas	Human resources are a key asset in a modern and ever-changing world.
2021	Universal Lithuanian encyclopedia	Personnel - employees, members or employees of an institution, company, organization, all of them

When analyzing the concept of workforce, it is important to discuss the factors of workability. The Glossary of Economic Terms (2021) states that the workforce consists of the following factors of workability: the state of human health and available knowledge and skills.

The Glossary of Economic Terms (2021) describes the workforce market as a market whose object is workforce. The workforce market consists of the main actors - the buyer and the seller. Employers provide employees in the product and service sector, motivate them to work by providing opportunities to improve qualifications, develop competencies, improve as an individual, as well as pay salaries in exchange for quality work that brings profit to the organization. The role of the human factor plays an important role in the labor market. Important human social and psychological characteristics. Employees sell their work to meet their physiological and mental needs.

In the Universal Lithuanian Encyclopedia (2021), the concept of the labor market is described as a system of economic relations of purchase and sale of workforce. The labor market is a kind of system based on economic relations between employees and employers with appropriate mechanisms and norms that ensure the proper use of workforce. According to R. Adamonienė (2004), the labor market is a system of public relations related to labor demand and labor supply, economic (employment) space and a mechanism that ensures compatibility of prices and working conditions between the employer and the employee. Summarizing the author's opinion, the labor market consists of the purchase and sale of labor, as well as the workforce - buyers and sellers, the employment process and the provision of favorable prices and working conditions for both employees and employers. Workforce supply - persons who can and want to work. Labor supply is defined by the ability and willingness of the workforce to work for specific reasons: to meet physiological and psychological needs. Working conditions, wages, working hours and the possibility to work from home are important for employees, as are the microclimate of the organization and the values it cherishes. Competitiveness also varies depending on workforce supply. When workers enter the labor market, they often face competition between employees at their level. Competing for a job / retention, better pay. Thus, the pursuit of a stable income by entering the labor market, regardless of the level of wages and the supply of workforce. Workforce demand is a societal need for labor force. Labor demand is

the most important indicator of workforce capacity and willingness to work. According to researchers, the demand for workforce is the amount of work that employers want and can hire - the state, companies, private individuals. Employers employ workforce taking into account the following factors: wages, prevailing market prices of goods / services, trade union activities. The demand for workforce depends on the growing consumer consumption of society, the scale of production of goods, the innovativeness of production technologies, as well as wages.

Summarizing the results of the study, it can be stated that the workforce is all employed and actively looking for a job in the country. The workforce is closely related to the concepts of human resources and human capital. The workforce market is defined as a market whose object is labor force. The workforce market is a system based on economic relations between employees and employers. The workforce market is further recognized as labor market supply and demand, which can be identified and predicted from a variety of sources.

### **Sources of labor force market identification**

According to E. Jančiauskas (2006), changes are constantly taking place in the labor market: some workers become unemployed, voluntarily stop working (i.e. become a passive part of the workforce), others - return to active work, third - graduates, mothers who have raised children until a certain age, - enter the labor market (for the first time or return to it) and, in the fourth, cease to work for the various reasons mentioned. The labor market is dominated by constant changes in the workforce, and the demand and supply of workforce is changing rapidly.

Economists note that the workforce decreases during economic downturns, in emergencies, as people tend to have a negative view of their employability during such periods. Redundancies or low pay can completely deter people from looking for work. So, even if people want to work, some stop looking for work and deliberately leave the workforce. Given the aging population and the rapid gap with the younger generations, with declining workforce participation and declining population growth rates, the workforce is expected to grow more slowly in the future than in recent decades.

The Lithuanian Classification of Occupations LPK 2012 (prepared according to the International Standard Classification of Occupations ISCO-08) is used to collect workforce market research and collect various data on occupations. It reflects changes in the structure of the labor market. The classification contains codes, names and descriptions of occupations and their groups using a certain unified structure. The classifier is used to assess the employment of the Lithuanian workforce by occupation. According to the Lithuanian Classification of Occupations LPK 2012, the workforce consists of the following professions: managers, specialists, technicians and junior specialists, civil servants, service sector employees and salesmen, skilled agricultural, forestry and fisheries workers, skilled workers and craftsmen, plant and machine operators and assemblers, unskilled workers, armed forces professions. These occupations are classified by code, title, main subgroups, groups, subgroups and occupations.

Existing competencies and skills are used to perform qualified work, as well as higher / higher education and participation in trainings. There are no special requirements for qualification skills or professional abilities for unskilled work. According to the classification of occupations, unskilled workers perform simple and repetitive tasks, which usually require manual tools and physical strength. The main requirements for unskilled workers are often primary education or training in a certain field.

According to L. Šalkauskienė, R. Pocevičienė and Radzevičienė (2017), the demand for workforce can also be confirmed by the strategic documents of the Republic of Lithuania (data of the Lithuanian Department of Statistics, the Government of the Republic of Lithuania "Lithuania 2030", Strategic Action Plan of the Ministry of Agriculture of the Republic of Lithuania for 2021-2023, Siauliai City Municipality Employment Increase Program for 2021–2023, Siauliai Region Development Plan for 2014–2020, Siauliai City Strategic Development Plan for 2015–2024, Council of the European Union Recommendation on the establishment of the Youth Guarantee Initiative 2013, Youth Employment Centers Employment Programs, etc.) which clearly identify the need for professional development, the aim to develop deeper entrepreneurial skills by developing business in the national and international market.

There are youth work centers in the customer service departments of the Employment Service, located in the largest cities of Lithuania (Vilnius, Kaunas, Klaipėda, Siauliai, Panevėžys). Youth Work Centers (JDCs) are a place where young people can get advice from professionals who know their job, as well as training, creative workshops and meetings with potential employers. It takes into account the needs of the young person, provides youth-oriented services, counseling and training that help to make informed decisions about future careers.

In Lithuania, the demand for workforce is also based on the data of the Employment Service (former Lithuanian Labor Exchange). The Employment Service conducts annual activity reports on employment mediation services provided to natural persons. The Employment Service monitors the labor market on a monthly and quarterly basis, forecasting possible changes in the labor market on an annual basis. Information on changes in the labor market situation is published at the beginning of the month, an overview of trends at the end of the quarter, and a forecast for the coming year in December. According to the reports of the Employment Service, it can be noticed which workforce demand is the highest in Lithuania. The annual reports reveal key information: the age of the workforce, according to which persons are divided into certain age groups (<29, 30-49, 50>), as well as gender, position held and the country to which the person was employed. From 2020 In January, another column was added - the nationality of the employed person. Reports published by the Employment Service regularly update information on labor shortages, as well as reveal workforce trends for the coming years. It becomes clear which specialties are in most demand.

The Employment Service has prepared a "Map of Professions". It is a career guidance tool. The Map of Professions presents the situation of supply and demand of the most relevant professions for the Lithuanian labor market in Lithuanian municipalities.

Proper job search requires a lot of effort. High-quality recruitment often involves employment agencies that know their job and focus on the human resources selection process. By working with employment service agencies, employers save a lot of time and can focus more on their company's operations, leaving the process of finding the missing workforce in the hands of their qualified professionals. There are two types of employment agencies: private and public. Private employment agencies are for-profit organizations. They provide recruitment services through an intermediary between the employer and the jobseeker. Private and public employment service organizations differ in that private ones work for employers (clients) and public ones for jobseekers. The main agencies providing human resources search services in Siauliai region are JSC Personalo valdymo sistemos, JSC Nermeka (Hirelabas), JSC Guarana, JSC Darbinteria, JSC Jurgvita, Headex Group, Viatera.

When performing the human resources selection process or identifying the demand for workforce, the most popular CV databases are used: [www.cvbankas.lt](http://www.cvbankas.lt), [www.cv.lt](http://www.cv.lt), [www.cvonline.lt](http://www.cvonline.lt), [www.uzt.lt](http://www.uzt.lt), [www.cvmarket.lt](http://www.cvmarket.lt), [www.pvsistemos .lt](http://www.pvsistemos.lt), [www.dirbu.laikas.lt](http://www.dirbu.laikas.lt), [www.dirba.lt](http://www.dirba.lt), <https://exemigrantai.lt/> and others. These portals host job advertisements for companies that reflect the need for workforce shortages. These portals are used both by staff responsible for human resources search in companies and by employment services agencies. This facilitates the recruitment process by reducing the time and effort resources involved in selecting staff.

### **Research results**

Analyzing the workforce market in 2021 forecasts in Lithuania, according to the data of the Employment Service under the Ministry of Social Security and Labor of the Republic of Lithuania (Employment Service), 2021, 16.4% was registered on 1 February. It means there were 282 thousands unemployed. 20.7 thousands job offers were registered in the information system of the Employment Service. During the COVID-19 pandemic wave, the situation in the Lithuanian workforce market remains uneven. The emergency situation and quarantine valid throughout the country resulted in the loss of jobs to the Employment Service in 2020. 1.3 times more people of working age applied than in 2019.

Data on the structure of the employed by occupation show that in 2020, in comparing to 2019, the number of specialists (3.4%), technicians and junior specialists (2.2%) and employees of institutions (0.6%) increased. The number of skilled agricultural, forestry and fisheries workers decreased by one sixth (16.6%).

At the end of 2020 the registered unemployment rate for men (50.1%) was 0.1% point lower than women. Registered female unemployment accounted for 49.9% during the analyzed period, 40.6 thousands of 16-29 years old young people were unemployed. This is 9.1% of population of the same age group in the country. Registered youth unemployment, compared to 2019, grew by 4.1%. The growing registered unemployment of women and young people is mainly due to the fact that the majority of these groups usually work in the most affected trade, services and services sectors of COVID-19, which were partially or completely closed during the quarantine period.

According to the data of the Ministry of Social Security and Labor of the Republic of Lithuania (2021), it is important to mention the main causes of youth unemployment in Lithuania: not acquired or acquired insufficient professional qualification; mismatch of acquired qualifications with the needs of the labor market; lack of practical experience; lack of job search

skills for young people; lack of motivation and social competences of young people; the quality of jobs and the high expectations of young people.

In order to promote youth employment, in 2013 The Council of the European Union has issued a recommendation on the establishment of a Youth Guarantee initiative. The main aim of this initiative is to mobilize young people in the shortest possible time: by staying in touch with the labor market or by providing access to further education. The aim is to reduce youth unemployment and improve the situation of young people who are not in employment or education. It aims to ensure that all young people aged 15-29, whether registered with the Employment Service or not, receive a specific offer of employment or further training, including an apprenticeship, traineeship or internship, within 4 months of leaving school or losing their job.

With the increase in the number of unemployed and the maintenance of a similar number of new job vacancies, it is becoming more and more difficult for young people to find employment, not only for the long-term unemployed. Almost every fifth (19.5%) unemployed person registered with the Employment Service is a long-term unemployed person. It is noted that two out of five registered unemployed are between the age of 30 and 49 years old, a slightly smaller proportion are over 50 years of age, almost one in five people under the age of 30. The majority of the unemployed have a secondary education. Every third has no professional training.

Compared to previous periods, the demand for administrative and executive secretaries, postmen, builders-installers, drivers of heavy trucks and lorries grew the most. There was a decrease in job offers for primary and secondary education teachers, salesmen, unskilled workers (shelf loaders, unskilled civil engineering workers, kitchen helpers). Compared to 2019, workforce supply increased by 27.1%. Every third (33.1%) registered unemployed person is younger than 30 years of age. Older than 50 years of age persons make up 28.8%. One in three (33%) registered unemployed people live in rural areas.

Due to the situation in the country after the declaration of an emergency situation and quarantine, when many businesses were forced to partially or completely suspend their activities, the registered unemployment rates also increased in the regions of Lithuania. The highest - 6.1% - growth was recorded in Panevėžys and Ukmergė. Registered unemployment also grew rapidly in Vilkaviškis (5.9%), Druskininkai (5.8%), Lazdijai (5.6%) municipalities. The declaration of quarantine and emergency had the least impact in Neringa (0.8%), Raseiniai (1.7%), Molėtai (1.9%) municipalities. Areas of highest unemployment remain the same as in previous years. These are mostly border areas, far from the country's major cities, where economic development is faster and the need for workforce and employment opportunities are higher. Meanwhile, in the areas of the highest unemployment, the economic development is slow, the number of operating economic entities is small, there are no larger employers creating more jobs. The lowest unemployment remains: in Neringa (3.5%), Klaipėda district (6.7%) and Kretinga (7.7%). Of the five largest cities in the country, the lowest number of unemployed was in Šiauliai (9.6%). Assessing the labor market indicators by regions, it was noticed that 57088 thousand people were registered in Šiauliai region as the jobseekers of working age. Unemployment of 15.9% was registered in Šiauliai region.

According to the Employment Service, in 2020 employers registered 12.8% fewer job vacancies than in 2019. The largest share (59.4%) of registered vacancies was in the service sector. More than a fifth (20.8%) is in industry. According to qualifications, fewer vacancies were registered for skilled workers and workers in the service sector. The largest number of vacancies by occupational group is registered for drivers of heavy trucks and lorries, loaders, cleaners of offices, hotels and other establishments, maids and helpers, drivers of cars, taxis and vans, shop assistants, chefs, advertising and marketing specialists, forestry workers, plumbers and plumbers, builders, painters, carpenters and joiners. The number of registered jobs decreased the most for office, hotel and other office cleaners, maids and helpers, stevedores, shop assistants and chefs.

According to the Employment Service, in 2020 there is a mismatch between workforce supply and demand in the labor market: a surplus of unskilled workforce and a shortage of skilled workforce. The supply of specialists and skilled workers was more than 16% lower than demand, while those wishing to work unskilled work - 16% more than the need for such workforce.

Examining the compatibility of workforce supply and demand by Lithuanian counties, it is observed that the distribution of professions with labor shortages by regions is uneven.

The validity and necessity of the need for specialists in the labor market of Šiauliai region is revealed by the search for employees ([www.uzt.lt](http://www.uzt.lt), [www.cv.lt](http://www.cv.lt), [www.cvmarket.lt](http://www.cvmarket.lt), [www.cvonline.lt](http://www.cvonline.lt), [www.cvbankas.lt](http://www.cvbankas.lt), [www.pvsistemas.lt](http://www.pvsistemas.lt), [www.dirba.lt](http://www.dirba.lt), [www.ldb.lt/TDB/Siauliai](http://www.ldb.lt/TDB/Siauliai), etc.) And data on the workforce employed by the Šiauliai Region Employment Agency in 2015-

2020. According to the employment agency, it has employed the following professions over the last five years: managers, specialists, technicians and junior professionals, civil servants, service sector workers and salesmen, skilled workers and craftsmen, plant and machine operators and assemblers, and unskilled workers. During the analyzed period, the company never employed qualified agricultural, forestry and fisheries workers and persons belonging to the professions of the armed forces.

According to the survey data of Šiauliai Chamber of Industry and Crafts (2021), sales and marketing and production managers will be mostly sought in the next three years. According to the results of the survey, specialties in the field of engineering were singled out, such as production engineers, technologists, designers, mechanical engineers, etc. Developers of online and social networking services will be in high demand in the region. Other high-class specialists included production masters, warehousekeepers, export managers, transport logistics, economists, financial analysts, and others. Also unskilled workers in various fields.

The highest demand for workforce in 2015-2020 emerged in the category of technicians and young professionals. Summarizing the results of the survey, the employment agency in 2020, in comparing to 2015, 37.5% more managers were employed in Siauliai region, as well as 6.3% more specialists, 43.3% more technicians and junior professionals, as well as twice as many 50% employees, 66.7% more skilled workers and craftsmen, plant and machine operators and assemblers were employed 100%, and unskilled workers were employed as much as 71.4% more. The total number of employed workforce in Siauliai region increased by 39%.

The forecast of employment opportunities in Siauliai region for 2021 (see Table 1) shows the possible need for specialists by professions in Siauliai County and the Republic of Lithuania.

Table 3

Forecasts of employment opportunities by professions in Lithuania and Siauliai region for 2021

Region	Professions
Siauliai region	<p><i>Specialists and managers:</i> sales and production managers, production foremen, production engineers, technologists, designers, mechanical engineers, advertising and marketing specialists (marketing managers), administrators, economists, financial analysts accountants, accountants, warehousekeepers, export managers, transport logisticians, social workers.</p> <p><i>Employees and skilled workers in the service sector:</i> developers of online and social network services, drivers, salespeople, builders, cooks, welders, mechanics, electromechanics, electricians, painters.</p> <p><i>Unskilled workers in various fields:</i> cleaners, packers, kitchen workers.</p>
Lithuania	<p>Specialists and management staff: advertising and marketing specialists, warehousing staff, administration, personnel, accounting, nursing specialists, construction managers, mechanical engineers, etc.</p> <p>Service sector workers and skilled workers: industrial mechanics, production workers in various fields, welders, painters, drivers, etc.</p> <p>Unskilled workers in various fields.</p>

The need for the analyzed specialists (see Table 1) is also confirmed by the analysis of the strategic documents of the Republic of Lithuania, which clearly identify the need to develop deeper entrepreneurial and information management skills in developing business in the domestic and international market. E.g. Priority VI "Smart Economy" of the State Development defined in the State Progress Strategy "Lithuania 2030" emphasizes "a flexible and competitive world [openness], a high value-added economy based on knowledge, innovation, entrepreneurship [creativity] and social responsibility; Green growth [responsibility] ". Lithuania's Progress Strategy "Lithuania 2030" is a public agreement aimed at creating a modern, vigorous, open state that fosters its national identity. According to this strategy, the aim is to become an integral, successful, politically and economically strengthened part of the Nordic-Baltic region, which would include five Nordic and three Baltic States. The aim is also to change the Lithuanian economy. Lithuania is expected to be a flexible and competitive world, a high value-added economy based on knowledge, innovation, entrepreneurship and social responsibility.

In the programme of Government of the Republic of Lithuania "Employment Increase 2014–2020" in 3 chapter 3 the reasons for drawing up the program are presented: the aim of reducing unemployment caused by the economic downturn, structural and long-term unemployment, youth unemployment and regulating the impact of emigration processes on the labor market.

In Ministry of Agriculture of the Republic of Lithuania 2021-2023 The strategic goal set in the strategic action plan is to ensure long-term competitive and sustainable development of agriculture, food and rural areas by promoting employment in regions and rural areas.

In strategic development plans of Siauliai county district municipalities in 2014-2020 and Siauliai region in 2015–2024, in Youth employment center employment programs there are indicated the developmental directions related to the development of economic activities or business. E.g. Priority 2 “Business Environment and Entrepreneurship Development” of Siauliai District Strategic Development Plan, Activity Priority 1 “Competitive Business Environment” of Siauliai City Strategic Development Plan emphasizes the importance of innovative engineering industry and logistics services that create high added value and attract local and foreign investments. Also, the creation of new jobs in Siauliai region and the development of industrial activities are envisaged from the indicated goals.

Akmenė and Siauliai Free Economic Zones have been established in Siauliai region, the aim of which is to increase the industrial attractiveness of Akmenė and Siauliai and to create more favorable conditions for attracting investments, development of high technologies and creation of new jobs. The region has also intensified the activities of industrial, transport, trade and service companies, which generate the highest gross value, added. These factors will make it possible to set up new businesses and create jobs for professionals in various fields.

The goal of Siauliai City Municipality's employment increase program for 2021–2023 is to increase employment and integration into the labor market. It has the following tasks: to develop the social and work skills of the unemployed.

Thus, the compatibility of workforce market supply and demand is confirmed by the strategic documents of the Republic of Lithuania, which show the need to increase overall workforce employment, encourage young people to enter the Lithuanian labor market faster and easier, increase economic growth and develop an innovative society capable of adapting to employers labor market conditions.

### Conclusions

The results of the empirical research allowed to achieve the goal of the research and to formulate the following main aspects of the need for specialists in Siauliai region:

- The workforce is all employed and actively looking for a job in the country. The workforce is closely related to the concepts of employee, personnel, human resources and human capital. The workforce market is defined as a market whose object is workforce. The labor market is a system based on economic relations between employees and employers. The workforce market is otherwise recognized as labor market supply and demand.

- The main sources of workforce market identification are the strategic documents of the Republic of Lithuania - the Government of the Republic of Lithuania „Employment Growth Program 2014–2020“ (current wording), Lithuania Progress Strategy „Lithuania 2030“, the Ministry of Agriculture of the Republic of Lithuania Strategic Action Plan 2021-2023, Siauliai City Municipality Employment Increase Program for 2021–2023, Siauliai Region Development Plan for 2014–2020 (current wording), Siauliai City Strategic Development Plan for 2015–2024, Recommendation for the Establishment of the Youth Guarantee Initiative of the Council of the European Union 2013. Also sources of workforce identification are data of the Lithuanian Department of Statistics, Youth Work Centers, the Employment Service and employment agencies are stored.

- The following professions are forecasted in Siauliai region: Specialists and managers: sales and production managers, production foremen, production engineers, technologists, designers, mechanical engineers, advertising and marketing specialists (marketing managers), administrators, economists, financial analysts, accountants, warehousekeepers, export managers, transport logistics, social workers. *Employees and skilled workers in the service sector*: developers of online and social network services, drivers, salespeople, builders, cooks, welders, mechanics, electromechanics, electricians, painters. *Unskilled workers in various fields*: cleaners, packers, kitchen workers.

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