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Non-farm employment trends and policy in rural areas of Samarkand region (Uzbekistan)

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DISCUSSION PAPER 2018 #176

Non-farm employment trends and policy in rural areas of Samarkand region (Uzbekistan)

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ABSTRACT

Nonfarm employment plays an important role in absorbing unemployment in rural areas of developing countries. The agricultural transition in Uzbekistan followed by structural transformations in the economy changed the rural economy. Although farm restructuring and farm optimization policies led to agricultural growth, they had a negative impact on rural employment. The government of Uzbekistan promoted many policies to create jobs within the country. A presidential decree launched the State Program on Rural Development and Well-being in 2009, which played a crucial role in developing the economic and social infrastructure of rural areas. Small business and private entrepreneurship were given priority to absorb the rising unemployment, especially in rural areas. Against this background, the paper studies non-farm employment trends in rural areas of Samarkand region. In particular, we explore the main drivers of non-farm business development and its impact on rural employment in the Samarkand region. The main employment trends in rural areas of Samarkand region are described using statistical data. We also explore migration trends in Uzbekistan and Samarkand regions. A survey was conducted with 34 mahallas' (community) chairpersons and representatives to better analyze the intersectoral and international migration of the agricultural workforce. Although remittances are crucial in poverty alleviation of Central Asian countries, including Uzbekistan, the economic crisis in 2008–2009 in Russia cast a shadow on the further prospects of migration. We show how the development of non-agricultural business in the Samarkand region increased the incomes of the rural population. The agro-processing sector plays a vital role in creating clusters based on the agro-industrial complex, which in turn will create more opportunities for employment in rural areas of the country.

KEYWORDS Employment, the Rural Nonfarm Economy (RNFE), Non-Agricultural Business, Rural Area, Samarkand Region

JEL CLASSIFICATIONS P41, J60, J68

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1 \ Introduction

Structural transformations in agriculture of most developing and transition countries are changing employment opportunities in rural areas and governments are trying to address these issues in their policies. Traditionally in economic development, agriculture plays an important role in the national economy of each country. Its primary purpose is to provide sufficient food and manpower to the expanding industrial economy, which is thought to be the dynamic "leading sector" in any overall strategy of economic development. Following W. Arthur Lewis's dual sector model (Lewis, 1954), most development economists agree that structural transformation of an economy is necessary for its growth and development (Barrett, 2010). On the other hand, the role of agriculture in economic development is still important for low-income countries since industrial growth without integrated rural development may cause internal imbalances in the economy such as widespread poverty, inequality, and unemployment (Nair, 2010). The rural economy can be separated into agricultural and nonagricultural sectors. While the agricultural sector is associated with the production of primary agricultural commodities, the rural non-farm economy (RNFE) may include agroprocessing, manufacturing, construction, commerce and other income generating nonagricultural activities that are located in rural areas (Haggblade et al., 2010). The role of RNFE in developing countries is becoming crucial in stimulating rural income growth and poverty reduction while in transforming economies, policy makers see the RNFE as a tool that can absorb unemployed agricultural workers being squeezed out of agriculture (Haggblade et al., 2010). Hence, RNFE can be seen as a potential pathway out of poverty and the way to raise incomes for many rural unemployed poor.

High population pressure, land scarcity and poverty in Central Asian countries are the problems which cannot be solved by agriculture alone and need policies aimed at developing nonfarm employment opportunities in rural areas (Maddock, 2009; Spoor, 2008). Nonfarm employment is widely perceived as the premier solution to disguised unemployment and low labor productivity in Central Asian agriculture. At the same time, rural communities are heavily affected by outmigration. Until recently, labor migration in Central Asian countries had a particular role in diversifying incomes of the population, especially in rural areas; however, the economic crisis in 2008–2009 in Russia made the further prospects of migration uncertain (Asian Development Bank, 2008a; 2008b). In the context of uncertain migration, the rural nonfarm economy can absorb rural labor and thus provide them with an opportunity to earn money (Atamanov and Van den Berg, 2012).

The main objective of our research is to study and analyze the current status of employment in the non-agricultural business sector of the Samarkand region. The study investigates the following research questions:

- Which are the main factors driving non-agricultural employment in rural areas in Samarkand region?
- What are the conditions, costs and opportunities for employment in non-agricultural versus agricultural businesses in Samarkand region?
- Which policy measures were taken by the government and how did they affect rural employment?

With the implementation of gradual economic reforms, Uzbekistan's economy still depends on agriculture (agriculture's share in GDP was 17.6% in 2016) and more than 49% of its population lives in rural areas, while 25% of the national workforce is directly employed in the agricultural sector (UzSTAT, 2016). Individual *(fermer)* farms and households of the country produce the main share of agricultural output. Individual farms mainly produce wheat and cotton, whereas households are engaged in the livestock sector, fruits and vegetable production. After restructuring of agricultural cooperatives *(shirkats)* into individual farms since 2004, they became the major contributors of agricultural output. On the other hand, the emergence of individual farms led to shortening employment opportunities in rural areas due to farm fragmentation, which resulted in discharge of agricultural labor, leading to unemployment and migration. A part of workers who were engaged in large agricultural entities, such as *sovkhozes, kolkhozes* or later in *shirkats* lost their jobs due to the establishment of individual farms. To respond to this, the government of Uzbekistan implemented policies (such as programs aimed to create jobs and provide employment for 2009, 2010) to develop non-agricultural business activities (see Appendix I). Shortly after national independence, parts of the rural population moved to urban areas of Uzbekistan and migrated to neighboring countries, such as Russia and Kazakhstan. Labor migration as one of the ways of income diversification for the rural population was somehow successful; however, after the recession of Russia's economy in the second half of 2014, the migration trends to Russia decreased dramatically (Malyuchenko, 2015). Therefore, new challenges for further income diversification for the rural population of Uzbekistan have been raised.

The rest of the paper is organized as follows: Chapter 2 overviews the social and economic development, main economic activities and their employment shares in urban and rural areas of Samarkand region. Chapter 3 studies main employment trends in rural areas of Samarkand region. Chapter 4 explores recent migration trends. In Chapter 5, the legal and policy framework for non-agricultural employment in Uzbekistan is analysed. Finally, conclusions and recommendations are given and the ways of enhancing the well-being of the rural population are discussed.

2 \ Overview of social-economic development in Samarkand region

Samarkand region is located in the central part of Uzbekistan with borders in the north and the northeast to Djizzak region. The region has borders with Tajikistan on the east, with Kashkadarya region in the south, and with Navoi region in the west and north. The area lies in the intermountain basin of the Zarafshan River. Agriculture of the Samarkand region can be divided into four zones based on weather, water sufficiency, and land use conditions. In the first zone, farms are located in upstream districts with sufficient water resources and cultivate non-cotton crops such as wheat, tomato, potato, tobacco, and fruits. In the second zone, farms are endowed with a good provision of surface and groundwater, plain land areas that are located in north and northeast of Samarkand city. In the third zone, which is in the western part of the region, farm sizes are larger. Here soil salinity is a problem resulting from poor drainage systems (Hasanov and Ahmed, 2011). In this zone, the main focus is on cotton and wheat cultivation based on pump irrigation systems. The fourth zone

in the west of Samarkand region is located downstream of the Zarafshan river; the main crops are wheat and cotton, whereas in the upland areas grapes and safflower are also cultivated (Hasanov and Ahrorov, 2013).

The eastern parts of the region, such as Bulungur, Urgut, Taylak, Jambay, Akdarya and Samarkand districts are considered as areas for cultivating non-cotton crops. Moreover, Urgut district is producing roughly 80% of tobacco in Uzbekistan, and most of its irrigated land is covered by tobacco and wheat, only in higher mountain areas household farms are producing table grapes, nuts etc. The remaining districts are specialized in the production of wheat and cotton (Kim et.al., 2013).

The volume of the gross regional product of the Samarkand region in current prices was 18319.5 billion UZS in 2017, it increased by 2.5% compared to 2016.[1] The shares of agriculture, industry, construction, and services in the structure of the gross regional product were 32.2%, 18.6%, 5.9%, and 43.3%, respectively Table 1. As it can be seen, the share of services and agriculture are significant in the structure of regional gross product.

Table 1 **Sectoral structure of gross regional product in 2017, %**
Source: The State Committee of the Republic of Uzbekistan on statistics (2017)

	Sectors	%
1	Agriculture	32.2
2	Industry	18.6
3	Construction	5.9
4	Services	43.3

To analyze employment opportunities in rural areas of Uzbekistan, it is necessary to study rural market conditions. Few national scholars tried to study these rural labor market conditions. With an existing surplus of labor supply in rural areas, rural labor market conditions can be described by quantitative and qualitative factors (Salimov and Mustafakulov, 2002; Rasulova, 2009). An existing surplus of labor supply does not always meet the requirements of new emerging jobs in rural areas. According to Khomitov (2009), quantitative factors include the level of agricultural development of economy; the level of technical provision in agriculture; the level of development of economic and social infrastructure; the level of development of rural construction and transportation; increasing wages and other sources of income; the development of households, farms and other forms of private business ownership; the development of the market of goods, services, investments and securities; and finally favorable climatic conditions. As qualitative determinants he counts the following factors: education and qualification; the development of educational institutions in the training of highly qualified personnel in agriculture; gender and age of the employed and unemployed rural population; the level of outwork and other types of employment; and the socio-psychological state of the workers.

1 Using an exchange rate of 7910 UZS/USD.

Samarkand region comprises 3.7% of the national territory and currently more than 11% of the whole population of Uzbekistan is living there. One of the main features of Uzbekistan's economy is a high rate of population growth. Since its independence, in 1991, the population of the country has increased by around 11 million people and in 2016, it reached almost 32 million people. The population density was 213.4 persons per square km in 2016; in 2016, 62% of the population lived in rural areas. The structure of the Samarkand region consists of 14 rural districts and 11 cities, 125 rural communities (qishloq fuqarolar yigini), and 1949 villages (see Appendix II).

From 1991 to 2017, the population of Samarkand region grew by 66% at an annual rate of 1.97%. During the study period, the urban population of the region more than doubled, whereas the rural population increased by 48%; the annual population growth rate of the rural and urban population was 1.51% and 2.87%, respectively Figure 1. A higher growth rate in urban areas occurred mainly due to the migration of rural people to urban areas of the region. Notably, from 2008 to 2009, the share of the urban population of the region significantly increased because the statistical methodology was changed; the number of industrialized rural communities grew, and their population was defined as urban.

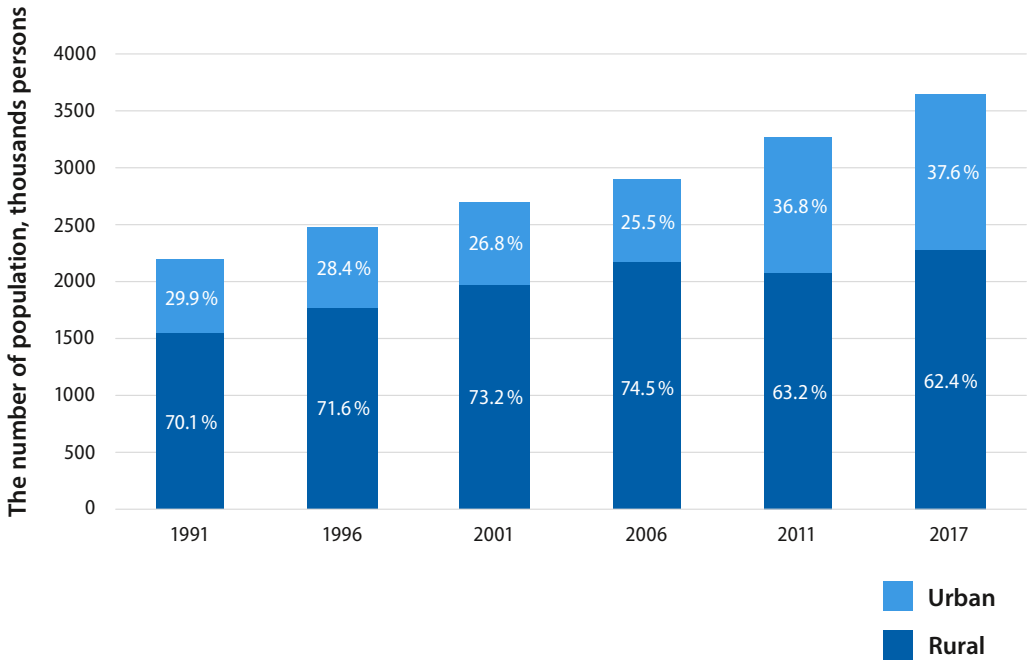

Figure 1 **Structure and dynamics of the rural and urban population of Samarkand region in 1991–2017**
Source: The State Committee of the Republic of Uzbekistan on statistics (2017).

The regional capital is Samarkand city, one of the oldest cities in the world, a center of international tourism. The transport infrastructure of the region is well developed, including an international airport in Samarkand city. The region's economy is more agro-industrial oriented and enjoys a higher rating regarding agricultural development than other regions of Uzbekistan.

3 \ Main employment trends in rural areas of Samarkand region

Analyzing sectoral employment in Samarkand region can better describe the shares of main economic activities and their employment shares. Figure 2 shows the distribution of the workforce by different sectors of the economy in Samarkand region. From 1992 to 2016, employment shares of agriculture and forestry slightly decreased to one-third of total employment, although the share of agriculture of the region is higher among the gross regional product. Industry, trade, public catering and marketing services have significant shares in employment of the region. Employment in education and health care has slightly grown in the last decade. Finding jobs in these two sectors became difficult in rural areas, whereas people in these sectors after work may engage in other jobs, in most cases, they are growing crops, such as fruits and vegetables, and keeping livestock that brings additional income to their families. In addition, some of them provide educational services such as tutorship or engage in home-based works (e.g. sewing, baking bread or producing sweets).

The absolute number of established new jobs in the region increased 1.71 times between 1992 and 2016. However, the shares of employment in non-agricultural production spheres such as housing and communal services, transport and communication, construction were small. Other sectors include finance and credit, and management personnel. It should be noted that among the economic sectors of the region, from 1992 to 2016, employment in trade, public catering and marketing services grew 2.5 times, which was higher than in other industries.

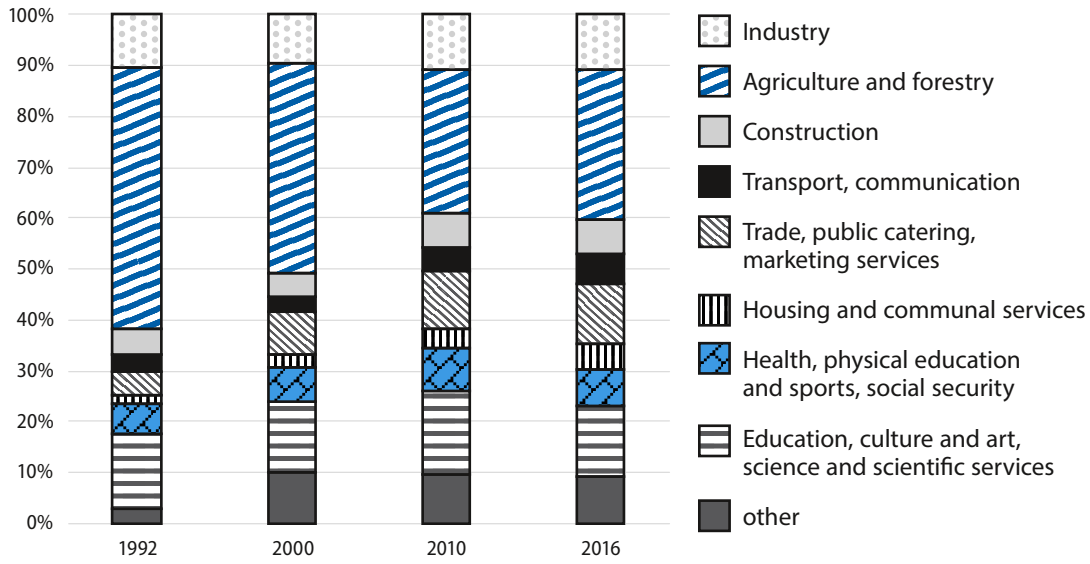

Figure 2 Employment by sectors of economy in Samarkand region, 1992–2016, %
Source: The State Committee of the Republic of Uzbekistan on statistics (2016)

From 1991 to 2016, the number of persons employed in the agricultural sector of Samarkand region first declined until 2007 and then started to increase until 2016 Figure 3. This can be associated with the reforms related to the restructuring of collective and state farms and the land transfer to individual farmers. The latter had a tendency to employ fewer workers than kolkhoz and sovkhoz farms. The increasing trend in labor employment after 2009 can be related to the optimization programs related to farm size, farm specialization and land use.

As it is shown in this chapter, the region's economy tends to be oriented towards the agro-industrial sector. Although the absolute number of established new jobs in the region increased, there were no significant changes in non-agricultural production spheres. While the dismantling of collective and state farms resulted in a decline of agricultural employment, farm optimization policies led to a slight increase in labor employment in the agricultural sector.

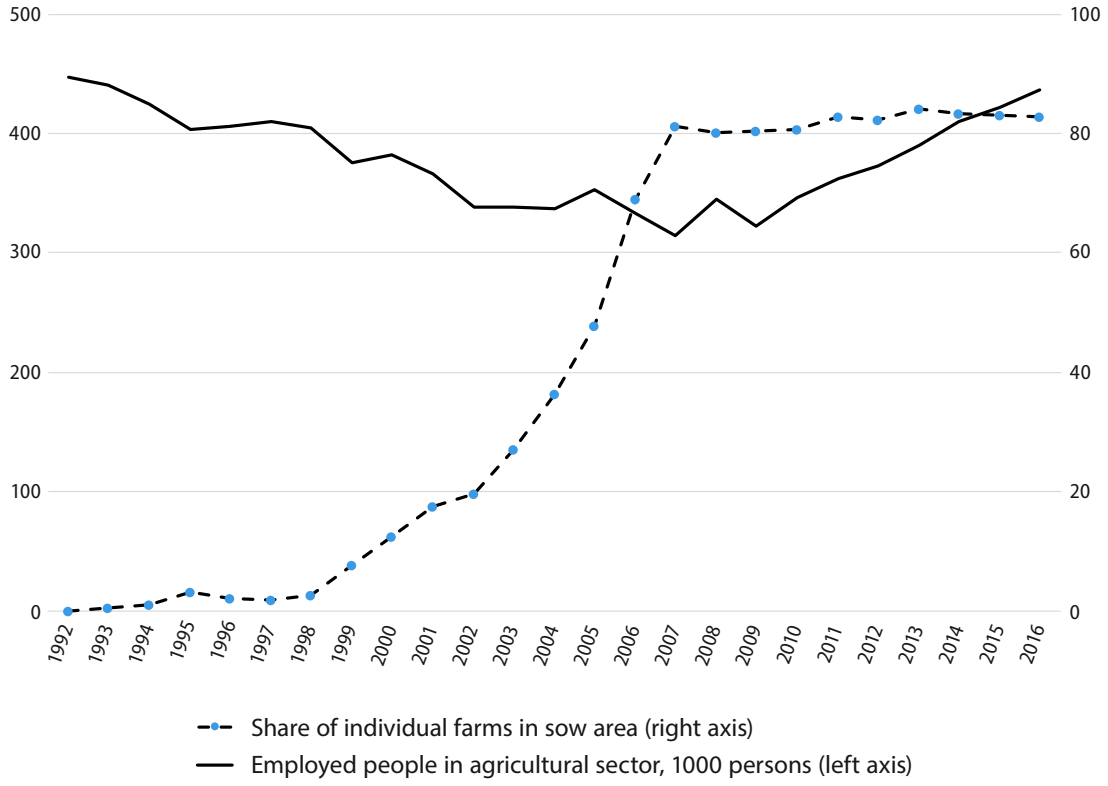

Figure 3 Number of persons employed in the agricultural sector and the progress of farm individualization in Samarkand region
Source: Author's calculations based on UzSTAT of Samarkand region, 2017

However, farm optimization programs alone are not sufficient to supply jobs for the unemployed rural population, and therefore the government of Uzbekistan elaborated many acts and regulations to address these issues. In the next chapter, we will discuss the policy chronicle related to developing non-agricultural jobs in rural areas of Uzbekistan.

The private sector plays an essential role in creating employment opportunities both in urban and rural areas. Table 2 shows the change in the number of employed persons in the economy of the region by type of ownership, where the growth in the number of employed in the private sector was 263%, and at the same time, there was a decrease in the number of people employed in the public sector (-41.9%). An increase of employment in the private sector indicates a positive transformation process.

Table 2 **Population by type of ownership in Samarkand region, 1000 people**
Source: The State Committee of the Republic of Uzbekistan on statistics (2016).

	1992	2000	2005	2010	2017
Employed population, total:	868	921	1050	1230	1523
including by forms of ownership:					
state owned sector	372	208	202	213	216
private sector	497	713	849	1017	1307

Since the share of employment in the agricultural sector of the region during the observed years was considerable, it is worth to analyze it further.

Rural areas in many developing countries face a problem of employment. The labor force in rural areas needs to find extra jobs in agriculture and nonagricultural sectors or has to move to cities in order to find better-paying jobs. The rural labor market offers employment in agricultural and non-agricultural sectors with skilled and unskilled workers based on self-employed and paid work (World Bank 2008). During the last decade, the State Committee of Uzbekistan on Statistics announced official unemployment rates of around 5.5%, where Samarkand region was above the country's average, although we have to mention that hidden unemployment exists (Figure 4). It can be observed that from 2006 to 2007 there was a sudden rise of the unemployment rate, which can be explained by the fact that the official statistics methodology was updated.

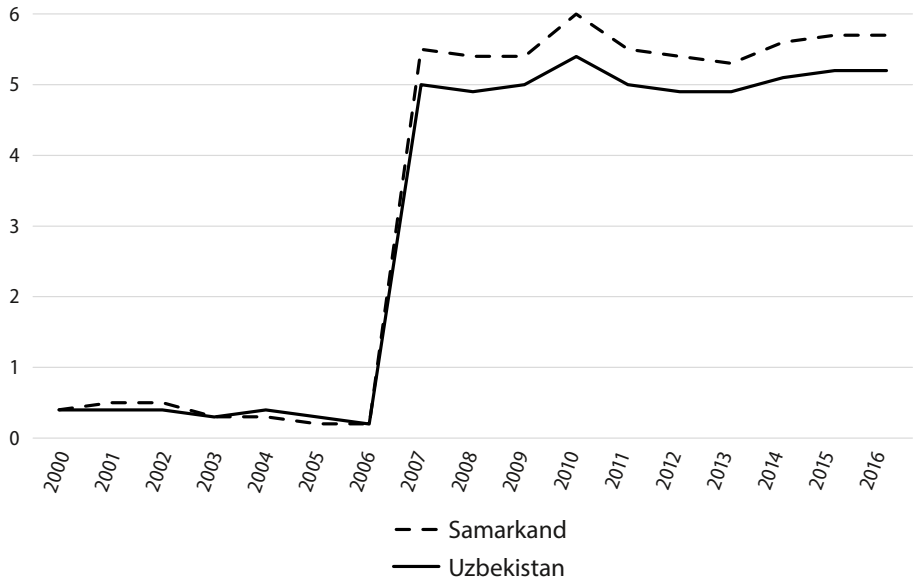

Figure 4 **Unemployment rate in Uzbekistan and Samarkand region between 2000 and 2016, %**
Source: The State Committee of the Republic of Uzbekistan on Statistics, 2017 (www.stat.uz)

Most unemployed people live in rural areas and are linked to agricultural production. Agricultural advances alone will not meet the challenges of rural employment. The rural nonfarm economy should also be a key source of new jobs (World Bank 2008). Therefore, policies aimed to create jobs in rural areas should take into consideration the diversity of activities in rural areas, which can lead to a corresponding diversification in income sources. It is difficult to estimate the share of the rural non-farm economy and its contribution to GDP in Uzbekistan. Although various attempts at estimation have been made in post-socialistic countries that have a similarity to Uzbekistan, there is no common agreement on methodology (Davis, 2006). It should be mentioned that it is relatively hard to obtain detailed data on employment in the rural non-farm economy in Uzbekistan because non-farm income is not recorded in the statistics. In most cases, while conducting surveys among households, respondents are often unwilling to provide information on their incomes.

Agro-processing and services dominate the rural non-farm economy in Uzbekistan. Agro-processing mainly involves large processors many of which are located close to Tashkent, although fruit and vegetable processors are also concentrated in the Fergana Valley (Kim and Hasanov, 2013). It is the case also for Samarkand region, where subsectors of agriculture such as high-value crops and livestock sectors are labor intensive with good potential for employment growth. The production of fruits and vegetables has a huge potential to improve the income of agricultural producers and rural inhabitants in the country. Almost all kinds of fruits and vegetables grown in Uzbekistan are found in the Samarkand region. About 60% of the area under fruits and vegetables belongs to *dehkan* farms (households), which produce more than 75% of the total production in the region. The proportion of land area under commercial farms is expanding and increasingly substituting cotton and grain areas, although the productivity is still low.

4 \ External and internal migration

Labor migration has both positive and negative consequences. Positive consequences of migration include an improving socio-economic situation in rural areas due to reduced levels of unemployment, encouraged market relations and raising living standards. In most cases, migration has a positive effect on the family income in rural areas: the average income from a labor migrant in such families is 5–10 times higher than other sources of household earnings (Welfare Improvement Strategy of Uzbekistan, 2007). People who lost their jobs due to the restructuring of agricultural enterprises or urban unemployed benefited from the temporary internal migration of rural inhabitants and external migration to neighboring countries. According to the data from the Central Bank of the Russian Federation, money transfers from Russia to Uzbekistan were 6.689 billion USD in 2013 (which equates to 11% of GDP at current rates) (Malychenko, 2015).

As of 2017, the Russian Federation and Kazakhstan hosted 72% of reported migrants from Uzbekistan (Figure 5).

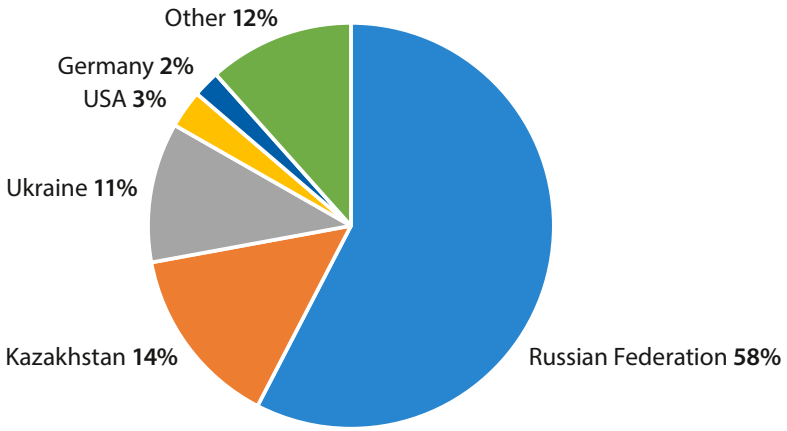

Figure 5 **Leading migration destination countries for Uzbek migrants (2017)**

Source: United Nations, Department of Economic and Social Affairs. Population Division (2017). Trends in International Migrant Stock: The 2017 revision (United Nations database, POP/DB/MIG/Stock/Rev.2017).

Due to the latest tendencies in the Russian economy, the number of migrants leaving to Russia decreased. According to the United Nations' Department of Economic and Social Affairs' data, the number of labor migrants leaving from Uzbekistan to Russia in 2017 amounted to 1147.6 thousand people, the number of incoming migrants from Russia to Uzbekistan to 399.4 thousand people. Thus, the balance of migration was 748,145 persons. The volume of remittances received by Uzbekistan increased between 2006 and 2013, but declined after crisis events in Russia (Figure 6). After 2013, the Russian government introduced quotas and work permissions with regard to labor migration to Russia. After a political agreement between the two countries, quotas were increased in 2017.

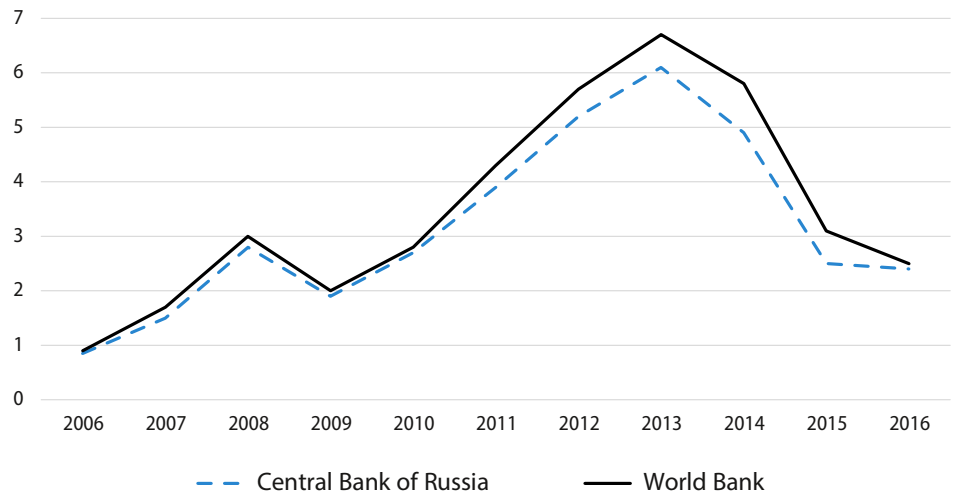

Figure 6 **Remittance inflow in Uzbekistan, 2006–2016 years (bln. USD)**
Source: Based on World Bank Migration and Remittances Data, and Central Bank of Russia, 2017

The problem of internal labor migration in Uzbekistan remains understudied. Unfortunately, at the national level, research and media focus on international labor migration issues, while internal processes have somehow receded into the background. Internal labor migration, its scale and trends, territorial features and outstanding problems are of great importance as they are most closely related to the formation of labor markets, and thus employment opportunities and living standards of the population in the provinces. The search for temporary employment often leads to migration, including migration within the country. In spite of active employment policies of the government, the population still faces considerable unemployment and low incomes, particularly in rural areas.

Internal labor migration in Uzbekistan often has an informal character, while labor migrants seek employment opportunities in Tashkent and other major cities. Internal labor migration in Uzbekistan is widely spread and in some regions its scale is comparable to that of external migration. According to a survey held by the United Nations Population Fund (UNFPA) in 2006, the internal labor migration flows form the informal labor markets (*"mardikor-bazaars"*) in provincial centres, cities and the capital of the country. Tashkent accounts for 70–80% of all citizens of the country seeking temporary and low-qualified jobs *(mardikors)* outside their permanent residence (Abdullaev, 2008).

In order to analyze external and internal labor migration problems in Samarkand region, we conducted expert interviews with chairpersons or representatives of 34 local communities *(mahallas)* in December 2016 and January 2017. The objectives were to identify the main factors driving these processes and to learn about the problems of rural settlements. According to these interviews, the main reason for migration is the unfavourable situation in rural labor markets as compared to urban areas. In addition, economic sanctions against Russia that resulted in the sharp decline in the value of Russian rouble since the beginning of 2014 have caused the return of many Uzbek migrants. This

led to the growth of already existing unemployment in the country, especially in rural areas, as the majority of migrants originated from rural areas. Hence, the excess labor supply has increased.

The interview partners argued that people often become migrants for such reasons as a forthcoming wedding ceremony, building a house, or to pay tuitions for higher education. As a rule, villagers who have to save a lot of money within a short period of time try to go to other countries where their labor will be better paid. However, it is necessary to have sufficient money to go abroad; therefore, less affluent people become internal labor migrants.

Tashkent, Samarkand city and Navoiy represent the key destinations of labor migrants from rural areas of Samarkand region. The decision to earn money in these cities needs to be backed up with financial means, as it is necessary to rent a rather expensive apartment and cover living expenses until a job is found. Sometimes jobs are already guaranteed upon arrival, but this does not happen often. The major constraining factors for people willing to come to these cities, mostly to Tashkent, to earn money, are the rigid passport regime and the registration rules. According to legislation, if a person moves from one place to another place to work, he or she has to register with the local community office or police department. Our interview respondents say that this has been the underlying cause for a reduction in labor migration from regions to Tashkent in recent years. Moreover, restrictions on working in Tashkent may be considered as the factor stimulating external migration of the population. Therefore, internal labor migrants prefer to find jobs in the informal labor market of Samarkand city. However, the Decree of the President of Uzbekistan on 22.01.2018 No: PF-5308 "On the State Program for the Implementation of Action Strategy on the five priority areas of the Republic of Uzbekistan in 2017–2021 in the Year of supporting of active entrepreneurship, innovative ideas and technologies", highlights several priorities for employment. As it is mentioned in the 10th paragraph of the Decree, the ban on the employment of citizens who do not have a temporary or permanent residence permit should be abolished. This decree thus simplifies the rules of internal migrant movement and gives the employer the option to select the best candidates without checking their passport registration. It helps smoothening the movement of citizens, especially from rural settlements to urban areas, such as to Tashkent, Samarkand or other big cities.

5 \ Rural employment policy

In many other cases, actions aimed at economic growth in rural areas will have agriculture at their core, but the emphasis on broader economic development in rural areas will also be crucial, as worldwide experiences show that agricultural growth alone is not sufficient for a significant increase in income of the rural population. This is because rural incomes are mainly received by those who have access to key factors of production (land and water), and because the links between agricultural growth and incomes in the rural sector, as a rule, are weak. As a result, stimulating non-agricultural sources of income is essential for rural development (Hasanov and Ahrorov, 2013). In order to solve the problem of unemployment, the Government of Uzbekistan took steps to create jobs for its population. The current employment policy model in Uzbekistan was developed during the first stage of reforms in the 1990s, reflecting the government's efforts to prevent mass unemployment in the

context of rapid growth in working-age population and economic growth based on fuel and energy sectors with limited capacity to create jobs. This model includes a large unincorporated industry without taking into account the quality of work (stability, profitability, and productivity). This approach has now reached the limits of its effectiveness. From 1991 to 2016, the level of the employed population in Samarkand region decreased relative to the employable population. If in 1991 this ratio was 82.6%, then in 2000 it dropped to 70.9%, by the end of 2011 it was 66.7%, and in 2016, it was 72.2% (Table 3).

Table 3 **The ratio of employed population to employable population in Samarkand region, 1000 people**
Source: The State Committee of the Republic of Uzbekistan on statistics (2016).

	1991	2000	2011	2016
Labor resources	1016.8	1299.9	1902.6	2058.2
Employed population	839.8	921.0	1269.8	1485.1
Ratio of employed population to labor resources	82.6	70.9	66.7	72.2

The collapse of the Soviet Union led to a significant decrease of state benefits and nonfarm employment funded by the state. Kandiyoti (2003) states that "the deterioration of these important nonfarm livelihood opportunities triggered a process of "reagrarianization," whereby rural households became increasingly dependent on agricultural production." Agriculture in Uzbekistan, as in all other Soviet republics, was traditionally organized in a dual system, in which large-scale collective and state farms co-existed in a symbiotic relationship with quasi-private individual farming on subsidiary household plots (Lerman, 2005). According to Djanibekov et al. (2012), agricultural reforms of Uzbekistan can be divided into four stages: the first stage includes the period 1992–1997, where state-owned most large farms such as *sovkhozes* and *kolhozes* were restructured into collective farms and household (*dekhan)* farms. The second stage, which covers the period of 1998–2004, included a process of transformation of *kolhozes* into *shirkats*, and later on, the partial fragmentation of *shirkats* into private farms. According to State law, three types of farming organisations were formed: large farms – *shirkats,* middle-sized farms – individual private farms *(fermer)*, and small households or family farms which were engaged in agricultural production in their backyards. During the third stage (2004–2007), large farms were fully reorganized as medium-size farms. As a result of policies in agriculture, *shirkats* almost disappeared, and individual farms and *dekhans* became the main agricultural producers (Veldwisch and Spoor, 2008). During the fourth stage, in which we include the period from 2008 until 2016, the state initiated land consolidation reforms, through readjusting farm sizes in 2008, 2010 and partially in 2015.

Since the launch of the "Development strategy for 2017–2021" crucial changes have been ongoing in the economy of the country and in the agricultural sector since 2017, where priority is given to the diversification of crops at the expense of cotton and wheat areas.[2] Also, instead of increasing

2 The Third Section of the Five-Area Development Strategy for 2017–2021 is entitled "Priority areas of economic development and liberalization" which includes issues realted to Modernization and intensive development of agriculture. http://strategy.gov.uz/en

food crops, new types of comercial-industrialized crops are being introduced and the state is encouraging developing agro-based clusters mostly in the cotton sector. The stages mentioned above characterize the government's strategy towards the transition from planned to market economy in the agricultural sector. Policies were implemented with the aim of achieving self-sufficiency in wheat production, and agricultural industrialization resulted in a gradual decrease of agricultural sector's contribution to GDP (17.6% in 2016). Nevertheless, the emergence of individual farms led to fewer employment opportunities in rural areas. Creating new jobs for the rural population is not an easy task; the solution of the problem depends on many factors such as economic growth of a country, the structure of the rural population, and the state of development of other economic sectors.

According to CER (2013), the instability of work is growing: the number of lost jobs per year is 30% of the number of new jobs. Because of accelerated urbanization, the pressure on urban labor markets is increasing. The growth of informal employment decreased tax revenues and contributed to a disbalance of the currency exchange rate. Moreover, it may deteriorate job quality due to a lack of formal labor contracts. Employment policy has proven ineffective in stimulating the growth of labor productivity and the shift of labor to sectors that can become new growth points. People engaged in science and high-tech industries (information services, engineering, and microbiology) comprise less than 1.5% of the total number of employees. Based on the existing employment structure and priorities in investment policies, Uzbekistan will need about 15 years to double labor productivity, which makes it difficult to narrow the gap with industrialized countries (CER, 2013).

Uzbekistan's employment policy can be divided into two categories: the first is an active policy aimed at reducing unemployment; the second is a passive policy focused on the financial support of the unemployed population.

Uzbekistan has adopted an extensive legal framework governing the employment regulation Appendix I. In accordance with the Constitution of the Republic of Uzbekistan, "Everyone shall have the right to work, including the right to choose their occupation. Every citizen shall be entitled to fair conditions of labor and protection against unemployment in accordance with the procedure prescribed by law" (art. 37). "The state shall guarantee freedom of economic activity, entrepreneurship and labor with due regard for the priority of consumers' rights, as well as equality and legal protection of all forms of ownership" (art. 53).

The Labor Code (1995), the laws "On Labor Protection", "On social protection of persons with disabilities" and other acts were adopted to guarantee employment of socially vulnerable categories of the population. Parliament ratified the Convention of the International Labor Organization "On employment policy", "On protection of the rights of workers' representatives in the company and provided them opportunities", "Equal Remuneration for Men and Women Workers for Work" and other international agreements and instruments in the field of employment and labor (CER, 2013).

In Uzbekistan, the year 2009 was announced as "The Year of Rural Development and Well-being" and the government issued a special program for enhancing the infrastructure of rural areas. One of the main tasks of the state program was to create new jobs in rural areas, especially in the non-agricultural sector. As it was mentioned in the state program, the tasks were aimed at "…industrial

development and acceleration of constructions in rural areas, establishing companies for processing of fruits, vegetables and dairy products, development of social infrastructure and services, towards on a creating new jobs which would consequently lead to enhance of incomes of rural population" (Lex.uz). Issuing this state program was crucial since a big share of the potential workforce in Uzbekistan still lives in rural areas. Another aspect of the problem is that the majority of the workforce is unskilled, and it needs to be trained before it can be employed in the non-agricultural sector.

Moreover, another Presidential Resolution (PR #640) was issued on "Additional measures to stir up development of service sector in Uzbekistan within the period till 2010" (21 May 2007). According to this document, much active work had been done for the creation of information service infrastructure in rural areas. This resolution allowed reducing taxes on licenses for IT & communications activities by small rural businesses.

The employment policy is primarily implemented through the Program for creating jobs and ensuring employment of population, which was approved by the Government and the Parliament in 2013 (No. PS-344-II). Conditions are developed by the Ministry of Labor and Social Protection in cooperation with the Ministry of Economy, the executive authorities, business associations, ministries and agencies in the chain of "business-economic (sectoral) association" for entities subordinated to sectors; and for entities subordinated to regions, including small businesses and private entrepreneurship on the basis of "district (city)-region-republic" principle. The annual approval of programs by Parliament aimed to create jobs and employment is a feature of the implementation of employment policy in Uzbekistan. The program consists of such sections as tasks for reaching targets of new job places for coming years; reporting the results of the Program implementation in the actual year; potential options to create new jobs in the next year; monitoring of the implementation of the job creation Program.

Over the last decade, 270–300 thousand new sustainable jobs (i.e. that do not disappear within a year) were created annually (CER, 2013). However, they are characterized by poor quality, and most of the new jobs created in the private sector did not have a legal status. The new jobs are not sufficient to absorb the annual growth of labor, even taking into account the fact that some young people after finishing their studies at secondary specialized educational institutions (Lyceums and colleges) are enrolled at universities (about 60 thousand people annually) or enroll to compulsory military service. The trend of employment growth in the informal sector increased in the second half of the 2000s, particularly during the period of high economic growth, when it would seem, increasing the demand for labor was to stimulate the growth of employment in the corporate sector. In developed countries, 10–15% of new jobs are created annually (in percentage of total employment), whereas in Uzbekistan it was less than 3% (CER, 2013). Employment in the form of home-based work, domestic security, transport services, etc. do not require high qualifications. Through being employed in these fields, graduates of higher and secondary specialized education institutions will quickly lose their obtained knowledge. As a result, there will be lower returns on significant costs for development of the state higher and professional education.

It should be mentioned that peculiarities of the transition period and the demographic situation influenced the model of employment policy in Uzbekistan – a model that assumed the prompt

response to the high level of labor supply. To reduce tension on the labor market, the state annually develops and implements programs to create jobs and employment. However, the administrative nature of their creation, which is expressed in the creation of "gross" jobs "at any cost", without proper attention to their sustainability, as well as the lack of specific mechanisms for providing incentives, subsidies, funding sources for the creation of jobs leads to a non-systemic solution of the employment problem. Therefore, reforms should elaborate measures to ensure job stability, the diversification of jobs, they should encourage business sectors in remote areas, the establishment of industrial zones at provincial levels, enhance the quality of education at universities, and increase of practical teaching methods in applied sciences.

In 2010, the government of Uzbekistan developed a program to create jobs and provide employment which is updated each year. Through implementation of these programs, new jobs are created in each region. In 2010 and 2015, as a result of these development programs, in Samarkand region, 92,390 and 95,011 new jobs were created, respectively, in various sectors of the economy (Figure 7). As it can be seen, new jobs were created in small business and private entrepreneurship, followed by establishing poultry and livestock farms, where rural settlement received preferential credits up to 100 minimum wages, domestic work (sewing, knitting, etc.) and jobs related to social infrastructure (barbershops, bakeries, etc.). The main purpose of creating new jobs was to keep population employed in rural areas and to develop economic and social infrastructure in rural areas. More than half of these new jobs accounted for rural areas (UzSTAT).

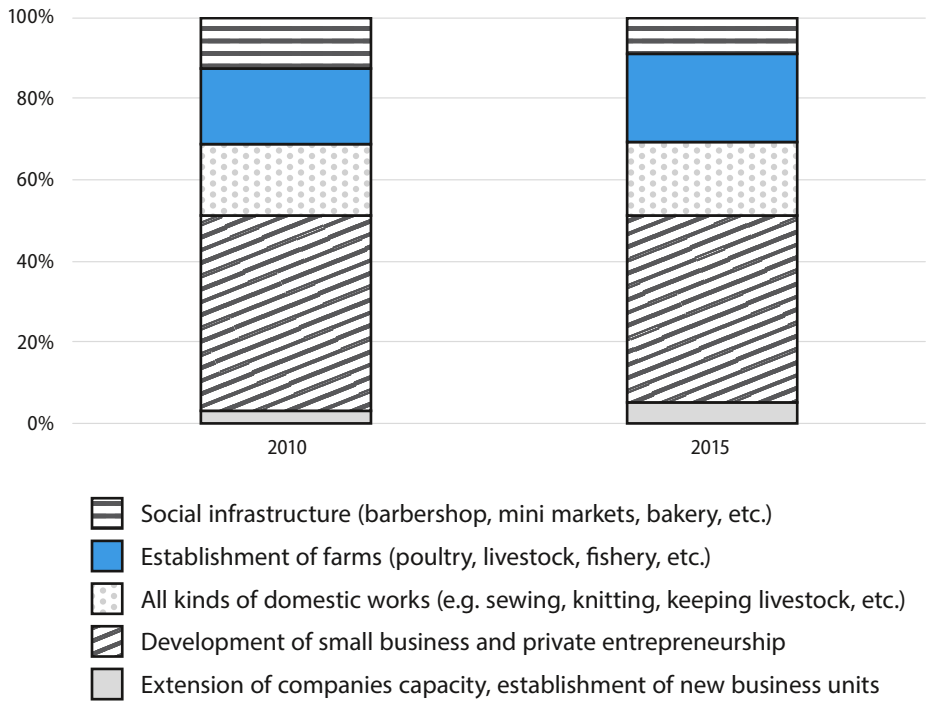

Figure 7 New jobs created by government measures in Samarkand region
Source: Authors' calculations based on UzSTAT of Samarkand region, 2016

However, these newly created job places were unstable; therefore most of them disappeared very quickly. After coming to power in 2016, the new President of the Republic of Uzbekistan Shavkat Mirziyoyev ordered to elaborate a new development program to create jobs and provide employment for 2018. The program is focusing on target sectors, i.e. the realisation of new production lines in agriculture, industry, and service sectors, according to "road maps" and investment projects, construction of housing in rural areas, improvement of social infrastructure, as well as small and medium entrepreneurship, especially handicrafts. As a new strategy, public works are supposed to be offered to unemployed persons, mostly in construction works: residential housing, landscape of settlements, irrigation and melioration facilities, historical objects, and nature reserve facilities; moreover in seasonal agricultural work, as well as collecting and processing of secondary raw materials and wastes.

According to the new program, new jobs were projected for each region in 2018. In the Samarkand region, it was expected to create 29,830 permanent jobs; 31,614 jobs as a temporary employment of the population; 2,412 jobs due to the implementation of "roadmaps" and investment projects; 17,765 jobs by attracting the unoccupied population to public works; and 9.385 jobs due to the development of small business and private entrepreneurship. In this way, a total of 91,006 new jobs was supposed to be created in the Samarkand region (Figure 8). Although the total number of projected jobs in 2018 did not change significantly compared to previous years, the program aimed to provide more feasable jobs for each region based on its capacity.

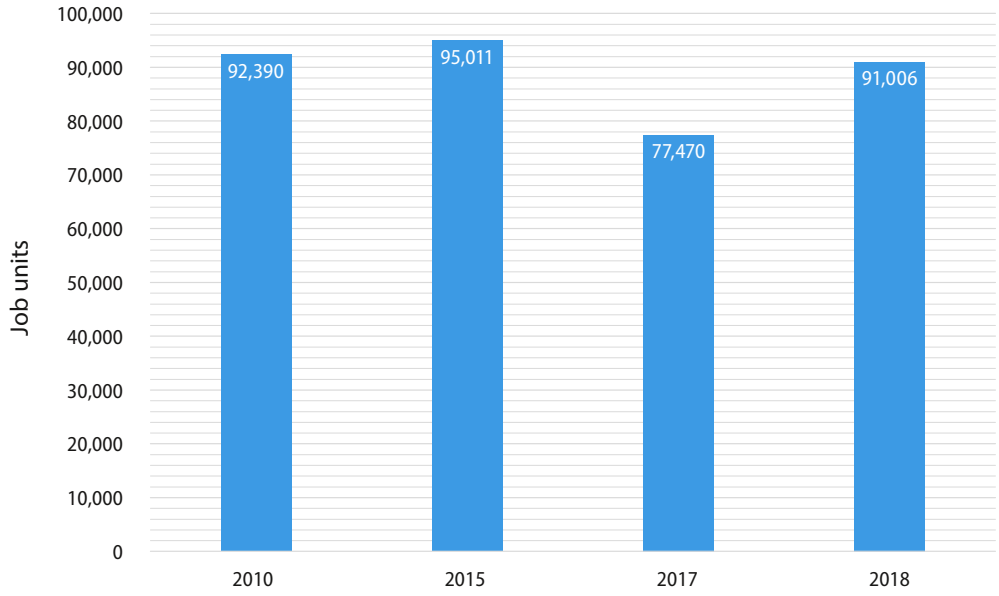

Figure 8 Number of targeted new jobs created by state program in Samarkand region

Source: Authors' calculations based on UzSTAT of Samarkand region and State Program at 02.02.2018 # 3506 (Resolution of President of Uzbekistan No. 3506 "On measures to implement the State Program to Promote Employment of Population for 2018")

Since its independence, Uzbekistan elaborated a number of legislative documents related to the restructuring of the farming system, and currently, individual farms and dekhans are considered as main producers. While the country achieved self-sufficiency in wheat production, and as a result of industrialization the agricultural sector's contribution to GDP declined to 17.2% in 2014, the emergence of individual farms led to fewer employment opportunities in rural areas.

With the aim of preventing mass unemployment, the government elaborated an extensive legal framework governing the employment regulation; however, the number of created jobs was not enough to solve the problem of unemployment in the country. The nature of the state annual programs aimed at creating jobs was administrative and lacked incentives, subsidies, and funding.

6 \ Conclusions

Problems of socio-economic development in Samarkand in recent years have acquired particular importance for Uzbekistan. The share of agriculture in the economy of the region is significant. Although the number of jobs increased by 1.71 times since independence, the shares of non-agricultural production were small. Agricultural policy reforms related to farm restructuring had an impact on rural employment. In particular, farm optimization programs tended to employ fewer workers than it was during kolkhoz and sovkhoz farms. Recent reforms in agriculture aimed at a diversification of crops and reduced cotton and wheat areas through the introduction of commercial-industrial crops that are creating greater employment opportunities for agro-processing clusters. Given the high production potential of fruits and vegetables in Samarkand region, agricultural industrialization has a huge potential for creating jobs in rural areas.

In order to solve the problem of unemployment, since independence, the government of Uzbekistan adopted many policies related to creating jobs within the country. In this study, we reviewed the main policies related to non-agricultural employment in Uzbekistan. Among these policies, a presidential decree issued in 2009 related to the State Program on Rural Development and Well-being plays a crucial role. This program helped to develop the economic and social infrastructure of rural areas; modern agricultural processing plants for deep processing of agricultural commodities were established through the program.

In this study, we also reviewed migration trends in Uzbekistan and in the Samarkand region. The role of migration and remittances are very important in poverty alleviation of Central Asian countries, including Uzbekistan. However, the economic crisis in 2008–2009 in Russia called the further prospects of migration into question. We think that although international migration can be a driving force of economic growth, it is threatened by external economic shocks and sometimes by its informal character, and therefore cannot be considered as a stable policy for decreasing unemployment.

According to experts' opinion, economic sanctions against Russia have resulted in a sharp decline in the value of the Russian rouble since the beginning of 2014 and led to the return of many Uzbek migrants. This led to the increase of already existing unemployment in the country, especially in rural

areas, since the majority of migrants were from rural areas. Hence, oversupply in labor markets for internal migrants has increased. The interview respondents claim that cash demands for wedding ceremonies, residential construction work, or university tuitions are among the main factors that drive rural inhabitants to migrate externally and internally.

The development of small business and private entrepreneurship is given high priority in the government programs targeted to create new jobs in Samarkand region. Although several development programs were adopted, the nature of the state annual programs aimed at creating jobs was administrative and therefore, the new government ruled by President Shavkat Mirziyoyev is critically reviewing these programs and trying to attract national and international experts for analyzing all sectors of the economy. Hence, the 2018 Program has been changed by focusing on target sectors, such as the realization of new production lines in agriculture, industry, and service sectors, according to "Road maps" and investment projects, construction of housing in rural areas, improvement of social infrastructure objects, and small and medium entrepreneurship, especially handicrafts.

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www.samarkand.uz
website of Samarkand regional government

www.stat.uz
UzSTAT- The State Committee of the Republic of Uzbekistan on statistics,

www.mehnat.uz
Official web-page of Ministry of Employment and Labor Relations of the Republic of Uzbekistan

APPENDIX I: POLICY CHRONICLE ON NON-AGRICULTURAL EMPLOYMENT IN UZBEKISTAN

Table A1 Policy chronicle on non-agricultural employment in Uzbekistan

Date of issue	Policy measure	Objectives	Foreseen activities
May 1, 1998	Law "On Employment" (updating previous version, January 13, 1992)	Guarantees the right to work, employment, training and qualification, social support for the unemployed population; participation of bodies of state administration, employers and trade unions in the implementation of state employment policy.	Ensured legal base of employment, regulation of employment, social security of employees.
January 26, 2009	Presidential resolution PP-1046 "On the State program 'The Year of Rural Development and Well-being'"	Enhance social and economic infrastructure in rural areas, create basis for building new houses during 2009–2015 years. Attract bank loans and private investments for rural settlements, establish new jobs in the non-agricultural sector, such as services, IT, small and medium enterprises. Provide clean water, establish construction companies using local building materials, improve the meliorative condition of irrigated land resources.	Further develop of the economic and social infrastructure of rural areas; establish modern agricultural processing plants for deep processing of agricultural commodities; issue legislative frameworks to increase incomes and quality of life of rural residents; build houses in accordance with standard projects; provide rural settlements with transport communications, clean drinking water, increase the coverage of telecommunications networks, especially in remote rural areas; expand the production of domestic building materials, especially local, and introduce industrial and pre-fabricated technologies for construction in rural areas; increase soil fertility and improve land reclamation measures; improve the health care of the rural population, the level and quality of the system of general and vocational education, reconstruct schools and professional colleges in rural areas.
December 5, 2012	Resolution of the Senate of the Oliy Majlis (parliament) of the Republic of Uzbekistan No. PS-344-II "On the Program of job creation and provision of employment for the population for 2013"	Ensure employment of the population in various sectors of the economy to create jobs, promote the rational use of labor resources, and to encourage entrepreneurial initiatives of the population.	Stimulate job creation in different sectors of the economy, target professional retraining and social protection of unemployed people in rural areas, especially youth, women, disabled people, pay more attention to small business, home-based work and family entrepreneurship activities.
December 22, 2017	Resolution of the Cabinet of Ministers of Uzbekistan No.1011 "On improving the methodology for determining the number of people who need employment, including methods of household surveys, developing a balance of labor resources and employment of the population"	Develop an algorithm to balance labor resources and employment, including a data collection and forecasting scheme.	Implement a balance sheet of labor resources and employment of the population of Uzbekistan, develop measures of data collection for accounting the labor balance in the country, issue methods of calculating the labor balance, unemployment rate and different categories of employment.

Table A1 (continued) Policy chronicle on non-agricultural employment in Uzbekistan

Date of issue	Policy measure	Objectives	Foreseen activities
June 20, 2017	Resolution of the Cabinet of Ministers of Uzbekistan No. 394 "On the program of the measures of complex development of the Samarkand region in 2017–2018 years"	Develop all sectors of the economy, attract potential investors to the region, prepare local target development plans for each district, promote uninterrupted electricity supply in remote areas, determine exact number of jobs in entire Samarkand region, provide priviliged bank loans to all sectors of economy.	Implement 398 industrial development projects in 2017 and 187 in 2018 by attracting bank loans and private investments, create 22580 target jobs in 2017 and 15700 in 2018, as well as 594 targeted investment projects in rural areas in 2017 and 340 in 2018, with estimated 4237 and 1402 jobs respectively.
July 27, 2017	Resolution of the President of Uzbekistan No. 3151 "On measures for the further expansion of participation of economic sectors in improving the quality of training specialists with higher education"	Approves the Program for the Comprehensive Development of the Higher Education System for the period 2017–2021 on the qualitative and cardinal improvement of the level of higher education, the strengthening of infrastructure in Higher Education Institutions (HEI), the provision of modern educational and scientific laboratories and IT facilities. Assure the preparation of highly qualified specialists with the ability to meet modern requirements for the socio-economic development of the regions, taking into account the needs of businesses.	Establish a quality control department under the Cabinet of Ministers and open its branches in all HEI and provide a rating of each HEI. Increase the responsibility of ministries to relevant HEI and set up quotas whereas local state authorities have to report the demand for specialists in their region, promote teaching in English language, increase integration of education with science and industries and introduce on-the-job trainee programs for students.
February 02, 2018	Resolution of the President of Uzbekistan No. 3506 "On measures to implement the State Program to Promote Employment of the Population for 2018"	Create jobs through the introduction of new production capacities. The creation of jobs will be provided through the implementation of investment projects and "Road Maps" for the development of previously privatized enterprises; construction of affordable housing in rural areas, road engineering infrastructure, development of small business and private entrepreneurship.	Create 168.2 thousand permanent new jobs in industry, agriculture, and services in the framework of investment projects; Organize 19,900 new jobs through the implementation of "Road Maps" and investment projects for the establishment of new production facilities on the basis of obsolete, privatized objects of state property; Create 46,6 thousand jobs due to the construction of affordable housing in rural areas, apartment buildings, transport and utility infrastructure; Create 101.3 thousand jobs and establish a favorable business environment, stimulating the development of small businesses and private entrepreneurship, granting them tax breaks, introduce a 2-year moratorium to conduct inspections, provide preferential microcredits.

APPENDIX II: POPULATION AND SETTLEMENTS OF THE SAMARKAND REGION (01.01.2016)

Table A2 Population and settlements of the Samarkand region (01.01.2016)
Source: The State Committee of the Republic of Uzbekistan on statistics

Names of cities and districts	Permanent residents, thousands	Including:		Area of the territory, km2	The number of administrative-territorial units						
		Urban	Rural		Number of cities under national administration	Number of districts	Number of cities belonging to districts	Number of urban settlements	Rural communities	Number of villages	Number of mahallah
Total in Samarkand region	3584,6	1355,2	2229,4	16,8	2	14	9	12	125	1949	1029
Samarkand city	519,7	519,7		0,12	1			3			194
Kattakurgan city	84,7	84,7		0,01	1			1			38
Districts											
Akdarya	146,8	59,0	87,8	0,39		1		2	6	126	32
Bulungur	171,9	39,0	132,9	0,76		1	1		7	144	47
Jambay	155,5	35,6	119,9	0,55		1	1		8	150	34
Ishtikhan	232,4	65,4	167,0	0,72		1		1	9	198	52
Kattakurgan	251,7	48,9	202,8	1,39		1		2	11	184	64
Koshrabat	120,5	12,1	108,4	2,16		1			7	145	32
Payarik	229,5	68,8	160,7	1,29		1	2		11	183	62
Pastdargom	325,3	87,5	237,8	0,87		1	1	1	13	166	91
Pakhtachi	134,3	26,6	107,7	1,38		1		1	8	96	47
Samarkand	232,4	14,0	218,4	0,43		1			8	97	108
Narpay	197,8	60,9	136,9	0,44		1	1	1	9	122	47
Nurabad	138,5	16,4	122,1	4,86		1	1		7	94	32
Taylak	183,9	22,3	161,6	0,28		1			9	99	51
Urgut	459,7	194.3	265,4	1,12		1	1		12	145	98

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