State financial support for agricultural sector in region

A A Kolesnyak¹, E B Naydanova², N M Polyanskaya³ and I A Kolesnyak⁴

¹Krasnoyarsk State Agrarian University, 44I, Eleny Stasovoy str., 660130, Krasnoyarsk, Russia
²East Siberia State University of Technology and Management, 40V, Klyuchevskaya str., 670013, Ulan-Ude, Russia
³Banzarov Buryat State University, 24a, Smolina str., 670000, Ulan-Ude, Russia
⁴Plekhanov Russian University of Economics, 36, Stemyanny pereulok, Moscow, Russia

E-mail: kolesnyak.antonina@yandex.ru

Abstract. The paper addressed the problems related to the state financial support for the agro-industrial complex to ensure the effectiveness of the industry. An example of foreign experience in supporting the agricultural industry is presented. The effectiveness of the implementation of the State Program for the Development of Agriculture and Rural Territories is analyzed on the example of one of the Russian regions; the role of the agro-industrial complex in the region is indicated. It has been defined that since the State Program introduction, for some indicators, the planned level has not been achieved, which to some extent indicates the lack of effectiveness of the industry as a whole. The identified problems of the process of implementing the state support program for the agro-industrial complex make it possible to outline the main directions of development of its mechanism.

In a period of global political, social, environmental and financial instability for the national economy of any state, it is objective to achieve the necessary level of food security, which is an important component of national security. Prerequisites for ensuring food security are created mainly through the priority development of the agricultural sector [1]. In modern Russia, the agro-industrial complex is a very important area of the national economy, since the level of food security and meeting the nutritional needs of the country's population largely depend on its level of development. In Russia, the share of agriculture in the structure of gross added value at the beginning of 2017 was 5.10% (seventh place among industries); while in 2012 this indicator was 4.70% [2]. In many Russian regions, the revival, strengthening and steady development of domestic agriculture, the main branch of the agro-industrial complex, is required.

The nature and pace of agricultural development largely depends on the impact of various factors, including climatic conditions, seasonality, production cycles, the level of technical and technological equipment and development of the industry, etc. At the same time, for most of the domestic agricultural manufacturers, a high degree of deterioration of fixed assets, chronic shortage of working capital, disparity in prices for agricultural products and agricultural products thinking, a high level of production risks, insufficient development of social, trade and supply infrastructure and a number of other problems are a priority. In turn, the state and socio-economic dynamics of agriculture
significantly define the main national macroeconomic proportions, trends and results of economic development of individual regions and the whole country.

Therefore, in the state socio-economic policy, agriculture needs to pay special attention to state regulation and financial support in order to prevent the crisis from aggravating in advance and strategically ensure the comprehensive, harmonious, effective development of this industry and the entire economic system [3].

Obviously, it is impossible to solve all problems by agricultural producers on their own, therefore, as a rule, the state institution acts as the main "assistant" to resolve the issues raised. State financial support for agriculture is currently an important part of the agrarian policy of many Western countries. The state support mechanism includes, subsidy assistance, granting and concessionary credit facilities. Often the costs of the state budget do not fully pay off and cost the state "at a loss." So, in some countries, financing in the agricultural sector is 1.5 - 2 times higher than the cost of the product itself produced by farmers [4].

For example, in Norway, Korea, Switzerland, Iceland, the share of state financial support in the total income of farmers exceeds 50-60%. In such geographically large countries as the USA and Canada, the share of state budget funds in the total income of agrarians is at the level of 10–20%. In Russia, this figure is considerably lower.

Currently, in Russia, support for the agro-industrial complex is provided through the implementation of the State Program for the Development of Agriculture and the Regulation of Agricultural Products, Raw Materials and Food Markets for 2013–2020. Agriculture of the Baikal region, to which the Republic of Buryatia belongs, operates in a zone of risky agriculture with a sharply continental climate [5]. Buryatia is characterized by a relatively low level of agricultural efficiency. However, the role of the agricultural sector for the economy of Buryatia is very significant (Table 1). 40.99% of the total population of the republic lives in rural areas; for the production of agricultural products 7.9% of all land of the republic is used [6].

Table 1. The share of agriculture in the economy of the region (% end of year) a.

| Indicators       | Years             | 1995 | 2000 | 2005 | 2007 | 2009 | 2011 | 2013 | 2015 | 2017 (for the beginning of the year) |
|------------------|-------------------|------|------|------|------|------|------|------|------|-----------------------------------|
| The proportion of agriculture in: |                   |      |      |      |      |      |      |      |                                  |
| - GRP            | no data           | 13,4 | 9,5  | 8,5  | 7,2  | 5,9  | 5,0  | 6,1  | 5,3  |                                  |
| - number of employees | 15,8              | 21,5 | 14,6 | 13,8 | 14,1 | 14,5 | 14,6 | 8,8  | 8,6  |                                  |
| - fixed investment | 2,2               | 3,1  | 3,0  | 2,4  | 1,2  | 1,2  | 1,1  | 0,8  |                                  |
| - fixed assets   | no data           | 3,4  | 3,3  | 3,1  | 2,5  | 2,2  | 2,2  | 2,7  | 2,7  |                                  |

acompiled by the authors according to Rosstat [6]

Over the period under review, the share of agriculture in GRP has noticeably decreased, which to some extent is a consequence of the agrarian policy in the region. Regrettably, the attractiveness of the
agricultural sector as a place of employment tends to decrease, as evidenced by the indicator of the share of people employed in agriculture. At the same time, the indicator of the share of agriculture in fixed investment is declining in dynamics and is extremely low. This largely affects labor productivity in the industry, since first of all labor productivity and labor intensity depend on the state and level of renewal of fixed capital.

Geographically, Russia is one of the largest states in the world. Each region has accumulated its own experience in using the means and mechanisms of state support, taking into account regional specifics. In the Republic of Buryatia, which since November 2018 has been included in the constituent entities of the Far Eastern Federal District, the Program "Development of the Agro-Industrial Complex and Rural Territories in the Republic of Buryatia" (hereinafter referred to as the Program) has been developed and is being systematically implemented. The program includes subprograms for different periods of their implementation. Funding for the directions of the state program is provided by various sources (figure 1).

![Figure 1. Budget appropriations for the Program in the Republic of Buryatia, million rubles [7].](image-url)

The program provides farmers with 18,124.2 million rubles as financial assistance. As part of the financial support, both state budget funds and extra budgetary resources are involved. Moreover, in the period from 2014 to 2015 (i.e., in the first years after the imposing financial and economic sanctions on Russia), the largest part of the funds was allocated. Extra budgetary sources dominate in the structure of funding sources - 48.39%, the regional budget accounts for 29.00%, the federal budget - 22.42%, and local - 0.19%.

The funds are strictly targeted and allocated specifically for the development of production and infrastructure in the countryside. According to the peculiarities of the development of the regional agro-industrial complex, taking into account social factors, living standards and other conditions, the program includes some target indicators, based on which it is possible to determine the level of effectiveness of the implementation of measures in the region.

In the period from 2017 to 2021, stable dynamics of the labor productivity index, an increase in the indices of agricultural production and food production, a planned increase in the level of profitability of agricultural organizations in the region, as well as a gradual increase in the average monthly salary of agricultural workers are assumed.

By the time the program is completed, a steady increase in the degree of agricultural production efficiency in the region is expected.

The information published by the Ministry of Agriculture and Food of the Republic of Buryatia for 2018 as part of the program implementation makes it possible to evaluate the experience of using the state support mechanism for agricultural production. 53 out of 66 indicators were actually achieved,
which is 80.3% of the total. Table 2 presents a data set on planned indicators and actually executed indicators in Buryatia for the period 2014–2018 taking into account the program adjustment in 2017.

**Table 2.** Implementation of the main target indicators of the program for 2014–2018.

| Name of target indicators | Years | 2014 | 2015 | 2016 | 2017 | 2018 |
|---------------------------|-------|------|------|------|------|------|
| Gross agricultural output, billion rubles: | | | | | | |
| - plan                    | 14.6  | 15.4 | 18.2 | -    | -    | -    |
| - fact                    | 16.7  | 17.8 | 17.3 | -    | -    | -    |
| Agricultural production index in farms of all categories (in comparable prices) | | | | | | |
| - plan                    | -     | -    | -    | 1.011| 1.007| -    |
| - fact                    | -     | -    | -    | 0.952| 1.069| -    |
| Food production index, including drinks (in comparable prices) | | | | | | |
| - plan                    | -     | -    | -    | 1.010| 1.010| -    |
| - fact                    | -     | -    | -    | 1.049| no data| -    |
| Labor productivity index  | | | | | | |
| - plan                    | -     | -    | -    | 1.020| 1.020| -    |
| - fact                    | -     | -    | -    | 1.017| no data| -    |
| Profitability of agricultural organizations (including subsidies), % | | | | | | |
| - plan                    | 15.2  | 15.5 | 15.5 | 14.8 | 15.0 | -    |
| - fact                    | 15.0  | 14.7 | 10.2 | 8.4  | no data| -    |
| The average monthly salary of agricultural workers (excluding small businesses), thousand rubles | | | | | | |
| - plan                    | 10.80 | 12.50| 12.90| 18.80| 22.00| -    |
| - fact                    | 10.95 | 12.86| 13.25| 22.69| 28.10| -    |

State financial assistance to the development of the agricultural sector is essential support to increase the level of profitability of production, to create new jobs due to the development of peasant farms and consumer cooperatives. During the program period, the situation in the villages has changed significantly, since there is comprehensive support for young families as part of the subprogram on sustainable development of rural areas.

Now, the potential of agriculture in the region does not yet allow to fully activate the activities of regional producers to increase production volumes, expand the scale of management and saturate the domestic market with food and raw materials for industry, since there is no corresponding material, technical and technological base, the state policy is not oriented towards fully to create the necessary conditions. In addition, management technologies in enterprises of the industry are still significantly behind the challenges of the time and cannot provide efficient and effective development in crisis conditions [8].

It should be noted that in the region, in order to increase the level of food supply and fully satisfy the needs of the population for food, along with the provision of state financial support, farmers need institutional assistance from the state, in particular, the formation and development of a specialized structure for food supply management in the region, which will include state, market and public institutions that perform different functions of intersectoral, intrasectoral, interterritorial and intraterritorial coordination and integration of the process [9].

Thus, the agrarian sector of the region needs targeted government real investments, effective subsidy programs, activation of public-private partnership mechanisms, and the development of other formats for the full involvement of the state in the development of such a strategically important sector of the national economy as agriculture.
References

[1] Naidanova E B and Polyanskaya N M 2017 Provision of food security of a region based on the example of the Republic of Buryatia Studies on Russian Economic Development 28(1) 52-9

[2] 2018 Regions of Russia: Socio-economic indicators (Moscow: Rosstat) p 1162

[3] Dareev G E 2018 The system of strategic planning of agriculture of the Republic of Buryatia: formation and new priorities Scientific support for the development of agriculture and rural areas of the Baikal region: Materials of a scient.and pract.conf. dedicated to the Day of Russian Science pp 207–14

[4] Golovach O 2017 The experience of state regulation and support of the agricultural sector of the economy abroad Agricultural economy 12 (271) 56-60

[5] Dareev G E 2018 Trends, conditions and current problems of agricultural development in the Baikal region Bull. of the Buryat Scientific Center of the Siberian Branch of the Russian Academy of Sciences 3 (31) 118–21

[6] 2017 Regions of Russia: Socio-economic indicators (Moscow: Rosstat) p 1402

[7] 2013 Decree of the Government of the Republic of Belarus dated 10.12.2013 No. 644 “On approval of the State Program “Development of the agro-industrial complex and rural territories in the Republic of Buryatia” (Buryatia)

[8] Bagaynikov M L 2015 Development of the resource potential of the agri-food complex of the Baikal region: geo-economic approach (Irkutsk: BGUEP) p 182

[9] Kolesnyak A A, Polyanskaya N M and Kolesnyak I A 2019 Improving food security: a regional dimension National interests: priorities and security vol 15 1 (370) 64-81