Wage indexation as a factor of stable food demand and sustainability of agricultural systems

E G Reshetnikova

Federal State Budgetary Institution of Science Institute of Agrarian Problems of the Russian Academy of Sciences, 94, Moscow Street, Saratov, 410012, Russian Federation

E-mail: elenaresh2708@mail.ru

Abstract. The purpose of the study was to analyze the institutional component of the process of indexation of the population’s income in Russia, substantiating the directions of its improvement using foreign experience in this area. The population’s income is the most important factor in creating effective demand, since 2014 the reduction in real available income has had a negative impact on the level of aggregate demand, including for the products of the agrifood complex. Food consumption is a priority human need, but a reduction in real income leads to a reduction in the volume and structure of nutrition. Wage indexation is a widely used tool in many countries with developed market economies to increase purchasing power, increase living standards, and increase consumer demand. There is no universal model of wage indexation in the world; it can be applied to the entire population, or only to low-income workers. In Russia, the institutional framework for income indexation is criticized by experts for the ambiguity in the interpretation of some of the main provisions, for the difference in approaches to income indexation in budget and commercial organizations. The paper substantiates the key principles of wage indexation, which consist in a combination of state and social partner regulation.

1. Introduction

Representatives of different trends of modern economic theory recognize the important role of institutions in the process of sustainable development of national economic systems and their multi-industry complexes. The institutional hypothesis defines the existence of appropriate effective institutions as an essential condition for economic growth [6]. The sustainable functioning of the agricultural system and the entire agrifood complex as a whole involves the systematization of institutions for managing food demand, and the study of the peculiarities of consumer choice for food. The formation of stable national demand for food involves improving income indexation, reducing wage differentiation, modernizing the tax system, and developing quantitative and qualitative characteristics of the living wage. One of the tools for increasing the real available income of the population and creating a stable aggregate demand for food is the mechanism for indexing wages. Currently, it is advisable to develop institutional regulation of wage indexation by fixing its most important principles in the labor legislation at the national level. Generalization of foreign experience of wage indexation, assessment of the state of population income indexation in Russia allows drawing a conclusion about the importance of scientific justification for the transformation of this tool to maintain the stability of the agrifood system.
2. Materials and methods

The study was based on such general scientific methods of cognition as abstract-logical method, comparison method, monographic method, the use of which allowed identifying the impact of wage indexation on the expansion of consumer demand for food as a condition for sustainable development of the agrifood system.

The indexation of the population’s income is aimed at preserving the purchasing power of the population’s monetary income in the context of inflationary processes. The state establishes a certain algorithm for compensating for the loss of income when consumer prices rise. The main component of the process of income indexation is the indexation of wages.

The main areas of regulation of labor remuneration abroad are the establishment of the minimum wage and its indexation. In countries with developed market economies, there is some experience in indexing the population’s income. This tool has become the most popular since the middle of the twentieth century. There are both centralized and collective-contract approaches to the process of wage indexation abroad. Legal representation of wage indexation is provided in national tripartite agreements, industry agreements, or collective agreements. Some countries are wary of indexation because they fear that it may lead to higher costs and even hyperinflation. However, many years of experience of using this tool in many countries show that when the basic principles are met, indexation does not lead to an increase in inflation. One of these conditions is the time interval between the price increase and the indexation measures. The regulatory legal acts regulating the process of wage indexation reflect the indexation threshold, which is the level of inflation at which measures are taken to index citizens’ incomes. Compensation payments applied in foreign countries may be calculated in proportion to wages, may have a fixed amount that does not depend on the amount of wages, and may also be mixed, combining both of these approaches. For example, in Belgium, the indexation threshold is 2%, and wages are indexed if the price index determined monthly by government agencies over the past four months exceeds the indexation threshold. It should be noted that indexing activities usually relate to all earnings. However, recently there is a certain limit, above which the indexation of wages cannot be carried out. It should be noted that there have been mass strikes in Belgium demanding that the upper limit on wage indexation should not be restricted. However, now there is a certain limit, above which the indexation of wages cannot be carried out. It should be noted that there have been mass strikes in Belgium demanding that the upper limit on wage indexation should not be restricted. In Denmark, the indexation threshold is 3%, and wages are indexed if the price index determined twice a year by statistical agencies exceeds the established indexation threshold. In this case, certain fixed amount of money is added to the salary, which is paid over a period of six months. In Spain, the indexation mechanism operates at the level of industries and firms through the adoption of collective agreements between employers and trade unions, with a price growth threshold of 5-7%.

There is a classification of countries depending on the coverage of different population groups by indexation in the scientific literature [1]. The group of countries where almost the entire population is covered by indexation payments includes Belgium, Iceland, and Denmark. In these states there is a well-functioning system of collective agreements as part of a national policy that provides a large share of wage growth, and trade union organizations take an active part in the formation and functioning of this system. For example, in Belgium, this tool is used nationwide. The second group includes countries where income indexation is typical for certain categories of the population (France, USA, Canada, Switzerland), and there is a variety of approaches to conducting income indexation. For example, in France a special legal act prohibits indexation above the living wage. The targeted and partial indexation is practiced there, that is, full indexation is carried out in relation to the minimum wage, and higher incomes are partially indexed. The indexation threshold in France is 2% for two months compared to the previous indexation. In this country, automatic indexation of the minimum wage is practiced. In countries such as Austria, Germany, Japan, and Sweden, this tool is used to a limited extent. In these countries, indexation has not been widely developed due to the prevailing view that automatic indexation reduces the ability of partners to enter into collective agreements. In some countries there are restrictions that limit possibilities of indexation. We are talking about the
introduction of an upper limit on the increase in wages or the maximum coefficient of its increase in the implementation of indexation. For Norway, Finland and the Netherlands there is a frequent change in views on the possibility of applying this income policy tool, for example, in Finland the automatic wage regulation mechanism was not used in 1967 - 1979, and now the indexation clause is again in collective agreements.

In practice, Western countries subject to various forms of wage indexation. The main wage rates defined in the collective agreement are usually indexed, but if the wage allowances are set as a percentage of the main wage rates, then the full earnings of employees are subject to indexation. A differentiated approach to indexation is also applied in countries with developed market economies, depending on the amount of wages. We are talking about the principle of limited indexation, which provides for a high level of compensation payments for small salaries and much less for high incomes. It should be noted that in this case, an upper limit is set for the amount of wages, above which compensation is not provided.

3. Results
The comprehensive analysis of the dynamics of real incomes of the population in the Russian Federation and the sphere of food consumption indicates the relevance in modern conditions of such a tool of state regulation as the indexation of income and wages. As it can be seen from table 1, since 2014 there has been a negative increase in real monetary income of the population: in 2014 the growth rate of real monetary income was 99.3% compared to the previous year, in 2016 – 94.0 %, in 2018 - 99.9 % (table 1) [8].

| Table 1. Dynamics of real monetary income of the population in the Russian Federation in 2014-2018 (in % of the previous period). |
|---------------------------------------------------------------|
| Year | 2013 | 2014 | 2015 | 2016 | 2017 | 2018 |
| Real monetary income | 104.0 | 99.3 | 96.3 | 94.0 | 98.9 | 99.9 |

The calculations show that the level of actual food consumption in the decile income group of the population with minimal incomes lags behind the rational consumption rate and the minimum physiological norm of the subsistence (table 2) [9].

| Table 2. The ratio of actual consumption of basic food products in the income group with minimum incomes to the rational consumption rate and the minimum subsistence level in 2017-2018 (in %). |
|---------------------------------------------------------------|
| Type of food | 2017 | 2018 | 2017 | 2018 |
|----------------|------|------|------|------|
| Vegetables and melons | 48.1 | 50.3 | 58.7 | 61.4 |
| Fruit and berries | 38.8 | 42.0 | 64.7 | 70.0 |
| Meat and meat products | 76.8 | 80.7 | 95.7 | 100.5 |
| Milk and dairy products | 53.4 | 59.8 | 59.8 | 60.4 |
| Eggs | 65.8 | 67.3 | 81.4 | 83.3 |
| Fish and fish products | 61.8 | 64.5 | 73.5 | 76.8 |
| Vegetable oil and other fats | 75.8 | 78.3 | 82.7 | 85.4 |
This indicates the need for a differentiated approach to the implementation of income indexation and revision towards an increase in the amount of the living wage. The study of institutional aspects of income indexation in our country allowed obtaining the following results. The mechanism of indexation in the modern history of Russia was fixed in the Law of October 24, 1991 N 1799-1, which established the threshold for income indexation at the level of 6%. However, this mechanism was not applied in practice, and in 2004 this Law became invalid (Art. 156 of the Federal Law of August 22, 2004 N 122-FZ). Nowadays, institutional regulation in the field of income indexation is carried out in accordance with the Labor Code of the Russian Federation, Article 134 “Ensuring an increase in the level of real wage content” which states that budgetary institutions index wages in accordance with the procedure established by labor legislation, other employers - in accordance with the procedure established by the collective agreement, agreements, local regulations [10]. Thus, in budgetary and commercial organizations, there are different approaches to the issue of wage indexation. Budgetary institutions index wages in accordance with regulatory legal acts that contain labor law norms and are aimed at increasing the level of income when consumer prices rise. Commercial organizations are governed by the local regulations of organization, which must be developed by them. Generalization of foreign experience dictates the need to develop institutional regulation of wage indexation by ensuring greater transparency, especially in relation to commercial organizations. A certain contradiction in implementing the wage indexation mechanism in Russia as an institutional structure is that the norm itself is fixed at the national level, and the procedure for its implementation should be developed at the level of the organization [7]. The implementation of this norm is controlled by a collective agreement between the employer and the trade union organization. As a result, according to experts, the employer ultimately controls how they perform their duties.

The scientific literature contains an opinion, which is difficult to agree with, about the possibility of ambiguous interpretation by employers of Article 134 of the Labor Code of the Russian Federation [2]. In our opinion, this article of the Labor Code implies that the employer must develop and reflect in the collective agreement, agreement, and local regulatory act the indexing mechanism in their organization. Otherwise, he risks being brought to administrative responsibility on the basis of Article 5.27 of the Administrative Offences Code of the Russian Federation [4]. The mechanism for wage indexation is prescribed with the participation of the employer, at the same time, as analysts rightly note, it has no incentives for its implementation [5]. Therefore, we should support the idea that under the existing approach, the employer has the ability to comply with this norm formally. One way to avoid real wage indexation is to reduce the bonus fund or change the pay system before indexation, which results in maintaining the amount of the wage fund [7]. Using such strategies makes it possible for the employer not to lose funds for indexation. Another possible way to avoid real indexation of wages may be to reflect in the collective agreement the provision that indexation is carried out on the condition of financial capabilities of the enterprise. If the indexation mechanism is precisely specified in the collective agreement, then this norm is fulfilled by the employer. It should be noted that in the collective agreement the possibility of a clear wording of a compensation payment mechanism that reflects the interests of all employees may be due to a number of factors: the level of competition in the labor market, the strength of the trade union organization, the profitability of the enterprise, and a number of other factors. In industry tariff agreements there are significantly different approaches to the wage indexation and in some of them indexation taking into account a price index for consumer goods is reflected, in other - indexation on the basis of the minimum subsistence level in the region, etc. Some industry tariff agreements consider only the frequency of indexation, and all other issues, such as the procedure and timing of indexation, are left to the organization to decide on their own on the basis of collective agreements, if financial resources are available. The scientific literature suggests a combination of different methods of institutional regulation of indexation: centralized state, social partnership (through agreements) regulation and regulation based on collective agreements [3]. In order to show the state nature of such social guarantees as wage indexation, it is advisable to disclose the essence of wage indexation in the Labor Code as an increase in the employer’s salary in accordance with the increase in prices for consumer goods and services for full or partial
compensation for employee’s losses as a result of inflation, and also to prescribe the most important points of wage indexation (the frequency of wage indexation, the principles of its calculation), which are common for all budgetary and commercial organizations. Specific features of an enterprise can be taken into account at signing a collective agreement.

4. Summary
Income indexation is an increase in the monetary income of the population (wages, pensions, scholarships) as the prices of consumer goods and services increase in inflation over a certain period. Income indexation is a tool for maintaining real incomes of the population and ensuring stable demand for consumer goods, including food products. Wage indexation to the state, playing an important role in ensuring stable demand for products of the agrifood complex, contributes to maintaining the stability of the agricultural system. Foreign experience in the application of wage indexation shows the variety of its forms and methods, it shows that indexation using a differentiated approach is effective. Improving the mechanism for wage indexation in Russia should follow the path of approving the basic principles of indexation at the federal level and increasing the transparency of this process in commercial organizations.

5. References
[1] Borisov S M 1996 The world monetary situation in the mirror of statistics (Money and credit) 5 27 - 35
[2] Ivanova T S 2007 Wage indexation (Labour dispute) 6 15-18
[3] Ivanyan I G 2010 Legal problems of wage indexation (Actual problems of Russian law) 3  222-228
[4] Administrative Offenses Code of the Russian Federation of 30.12.2001 N 195-FZ (as amended on 18.02.2020) Electronic document http://www.consultant.ru/cons/cgi/online.cgi?base=LAW&dst=&n=34661&req=doc#05263267032124166
[5] Kuzminov Ya I, Bendukidze K A, Yudkevich M M 2006 Course of institutional economics: institutions, networks, transaction costs, contracts. M., Publishing house of the Higher School of Economics 426
[6] Natkhov T V, Polishchuk L I Political economy of institutions and development: how important to be inclusive (Journal of the New Economic Association) 2 12 - 38
[7] Orekhova S V 2016 Evaluation of the institutional effectiveness of wage indexation (Bulletin of SPbSU) 3 130-154
[8] Real monetary income in the Russian Federation. Electronic document http://old.gks.ru/wps/wcm/connect/rosstat_main/rosstat/ru/statistics/population/level/#
[9] Food consumption in households in 2018. Electronic document. https://www.gks.ru/bgd/regl/b19_101/Main.htm
[10] Labour Code of the Russian Federation of 30.12.2001 N 197-FZ (as amended on 16.12.2019) Electronic document http://www.consultant.ru/document/cons_doc_LAW_34683/