Economics and Business Management

17(2), 147-162

Journal homepage: https://economicscience.com.ua/en

Received: 24.12.2025 Revised: 17.04.2026 Accepted: 21.05.2026 Published: 03.07.2026

ISSN 2786-7390; e-ISSN 2786-7404

UDC 331.101.3:338.43(477)

DOI: 10.31548/economics/2.2026.147

Yevhenii Lanchenko*

Doctor of Economic Sciences, Associate Professor

National University of Life and Environmental Sciences of Ukraine

03041, 15 Heroiv Oborony Str., Kyiv, Ukraine

https://orcid.org/0000-0003-0894-4885

Mykola Yakymenko

Postgraduate Student

National University of Life and Environmental Sciences of Ukraine

03041, 15 Heroiv Oborony Str., Kyiv, Ukraine

https://orcid.org/0009-0007-5966-1267

Labour motivation in agricultural enterprises: Theoretical foundations and the state of development in Ukraine

Abstract. The relevance of this study stems from the fact that, despite the decisive role of motivation in ensuring labour productivity and socio-economic stability in rural areas, its level at Ukrainian agricultural enterprises remains low due to insufficient remuneration, seasonal work, and unstable employment. The aim of the study was to analyse the relationship between wages and employment in the agricultural sector of the economy and to determine the significance of economic and non-economic factors in employee motivation. The study employed structural and comparative methods, as well as statistical analysis. The research demonstrated that the components of labour motivation include incentives and interests, which may be influenced by employers or the state in order to motivate employees. At the same time, incentives may be both material and non-material. The approaches of various scholars to the study of labour motivation were also examined. An analysis of wage dynamics showed that during 1995-2024, nominal wages in agricultural enterprises increased by more than 120 times, while real wages rose by 9.7 times, indicating an improvement in material working conditions. Nevertheless, the wages of agricultural workers remained below the national average: in 1995 the gap amounted to -30%, while by 2024 it had narrowed to -16%. In the field of employment, a steady downward trend was observed: the share of employees in the agricultural sector within the overall employment structure decreased by 20.3%, driven by technological modernisation, seasonality, and demographic changes in rural areas. At the same time, the trends observed in the agricultural sector were more favourable compared with other sectors, namely construction and industry. Overall, the findings indicate that, despite improvements in financial and social conditions, labour motivation requires a comprehensive approach combining economic, social, and psychological factors. The obtained results are of practical significance for the development of

Suggested Citation:

Lanchenko, Ye., & Yakymenko, M. (2026). Labour motivation in agricultural enterprises: Theoretical foundations and the state of development in Ukraine. *Economics and Business Management,* 17(2), 147-162. doi: 10.31548/economics/2.2026.147.

*Corresponding author (*lanchenko@ukr.net*)

effective motivational mechanisms capable not only of increasing labour productivity but also of ensuring the sustainable socio-economic development of Ukraine's rural areas

Keywords: wages; employment; unemployment; agricultural sector of the economy; incentives; labour efficiency

INTRODUCTION

The relevance of the study is determined by the need to identify effective mechanisms of labour motivation in Ukraine's agricultural sector, which is characterised by low wage levels, seasonal production, and a high dependence of outcomes on natural, climatic, and market factors. Under current conditions of increasing competition for labour resources and growing migration processes, it is important to establish a comprehensive motivational system combining economic, social, and psychological factors influencing employees. In addition, the development of market relations, Ukraine's integration into the global economic environment, and the introduction of innovative technologies in agriculture impose new requirements on personnel management, particularly regarding approaches to labour incentives. Effective staff motivation is becoming a key factor in increasing labour productivity, strengthening enterprise competitiveness, and ensuring sustainable development. Thus, the study of labour motivation mechanisms in agricultural enterprises is timely and carries significant theoretical and practical importance for improving human resource management systems under modern economic challenges. The issue of labour motivation is of particular relevance within the context of strategic management in agribusiness. Modern agricultural enterprises operate under conditions of intensified competition in the labour market, the introduction of digital technologies, and the automation of production processes, all of which transform the requirements for personnel management. The establishment of effective motivational mechanisms is becoming an integral component of agribusiness strategy, as the level of employee engagement and productivity directly determines the competitiveness of an enterprise and its ability to adapt to market changes.

Z. Lyschenko (2024) investigated the motivational aspect of human resource management in agricultural enterprises. It was found that effective motivation helps to overcome difficulties and adapt to changes, particularly climatic, market and personnel-related ones. A.V. Herasymenko (2023) investigated the influence of socio-economic motivational factors on labour productivity within an effective agribusiness system. It was noted that labour productivity in Ukrainian agriculture is showing positive growth: in 2020, livestock production volumes exceeded those of crop production. However, wage growth is outpacing labour productivity growth, which may negatively impact the sector's economic potential. A.D. Chikurkova & Yu.M. Hray (2020) investigated improvements in the development of motivational policies at agricultural enterprises. They drew attention to the role of the individual and intellect in the economy, and consequently, to labour motivation. At the same time, the approach of enterprises and the state to this issue is often ineffective, resulting in a decline in the effectiveness of measures aimed at labour motivation. The researchers consider the study of factors influencing labour motivation in the agricultural sector to be particularly relevant. O.M. Bachynska (2024) assessed improvements in staff motivation methods. She noted that increased motivation contributes to the achievement of strategic goals and strengthens competitiveness in the market, helping to attract skilled workers and increase employee loyalty. K.A. Tkachenko & G.M. Kopteva (2023) demonstrated that a successful motivation system must be flexible, differentiated and tailored to the individual needs of employees, which vary depending on their stage of life, professional level and personal values. They also noted that in the current context of digitalisation and the intellectualisation of work, incentive systems must be based on knowledge, innovation and the development of employees' creative potential.

L.I. Zastavnyuk (2022) studied staff motivation as a factor in enhancing a company's competitiveness. The author noted that a company's

competitiveness depends on the level of motivation among its staff, as it is motivated employees who ensure the effective functioning and development of the organisation. An effective motivation system increases labour productivity, facilitates the realisation of employees' labour potential and provides competitive advantages. To enhance the effective utilisation of human potential, it is necessary to develop a company policy aimed at motivating staff. O.S. Mykhaylova *et al.* (2020) studied the use of software products to enhance work motivation in the dairy cattle sector. The researchers noted that to enhance the motivational impact on staff at dairy farms, a combination of material and non-material incentives is required, which will ensure a sustained motivational impact on production outcomes. It was proposed to create an organisational and economic mechanism for fostering employee motivation, based on the evaluation of specific motivational tools according to defined criteria and levels of their implementation.

Previous studies, despite a thorough analysis of motivational factors in agriculture, have mainly focused on individual aspects – economic or organisational – whilst neglecting the complex influence of social and psychological factors. Furthermore, the relationship between wage levels, employment and labour productivity in the agricultural sector of the economy has not been sufficiently investigated. The aim of this study was to identify patterns in the influence of wage levels on employment and unemployment indicators. To achieve this aim, the following objectives were set: to conduct an empirical analysis of the relationship between wage levels, unemployment and employment; to assess the effectiveness of economic factors in stimulating labour activity among agricultural workers; and to summarise theoretical approaches to the role of social and psychological factors in labour motivation.

MATERIALS AND METHODS

The study employed a structural method to analyse the internal structure of phenomena related to labour motivation. In particular, it was applied to study the structure of the motivation system, namely the relationship between material and non-material incentives and their functions in labour behaviour, as well as the classification of incentives by type (material/non-material, individual/collective, internal/external). Various approaches to labour motivation by scholars such as A. Smith (1776), A.H. Maslow (1954) and D. McGregor (1960) were also examined. Attention was also paid to the theories of motivation developed by F. Herzberg *et al.* (1959), V. Vroom (1964) and J.S. Adams (1965). The period used for the analysis was 1995-2024; at the time of writing, data for this period alone were available for analysis. For the level of employment in the agricultural sector of the economy, the period was from 2000 to 2021 due to the lack of relevant information on the website of the State Statistics Service of Ukraine (Ukrstat, n.d.) for the period after 2021 (following the outbreak of the war, the State Statistics Service of Ukraine began publishing less information freely available), which ceased publishing separate data from 2022 onwards due to the start of Russia's full-scale invasion. Data from 2022 onwards is presented excluding information from the temporarily occupied territories. Based on data regarding the number of employed persons, the figures for 2024 have been estimated, taking into account demographic changes resulting from the Russian-Ukrainian war.

As part of the study, a statistical analysis was conducted of indicators characterising wages and employment levels in Ukraine as a whole and in the agricultural sector of the economy in particular. The study analysed the level of employment in the agricultural sector, the dynamics of real wages in Ukraine and in specific sectors – agriculture, industry and construction – as well as the difference and ratio between wages in the agricultural sector and the national average and other sectors. Real wages were calculated from nominal wages, adjusted for inflation, based on data from the State Statistics Service of Ukraine (Ukrstat, n.d.). The approach to calculating real wages is shown in formula (1):

$$w_{r_N} = \frac{w_{n_N}}{I_N}, \quad (1)$$

where w_{rN} – the real wage level in period N; w_{nN} – the nominal wage level in period N; I_N – the cumulative inflation rate in period N. The initial value was the wage for 1995, whilst all other

values were adjusted for the cumulative inflation rate, calculated as the product of all inflation rates in the current and previous years (up to and including 1996). The ratio of the sector's average wage to the national average was calculated as the ratio of the sector's average wage to the national average wage, minus one, as shown in the formula (2):

$$w_{AT} = (\frac{w_T}{w_A} - 1) \times 100\%, \quad (2)$$

where w_{AT} – the ratio of the sector's wage level to the national average wage for the period; w_A – the sector's average wage level for the period; w_T – the level of the average wage in Ukraine during the period.

This indicator was assessed dynamically, as was the change in the employment level. A comparison of the data for these two indicators was used to evaluate the influence of the economic component on employee motivation. Within the framework of the study, the change in the ratio of wage levels in the sector was also calculated by comparing the values for 2024 and 2000. This was carried out using formula (3):

$$w_\Delta = \frac{w_{AT2024} - w_{AT2000}}{w_{AT2000}} \times 100\%, \quad (3)$$

where w_Δ – the indicator of change in the ratio of wage levels in the sector; w_{AT2024} – the ratio of the wage level in the sector to the average wage level in 2024; w_{AT2000} – the ratio of the wage level in the sector to the average wage level in 2000.

A comparative method was also used to analyse differences and dynamics in the key indicators of labour motivation across various sectors of the economy (agriculture, industry, and construction). This method was applied to compare nominal and real wage levels, deviations of sectoral wages from the national average, the dynamics of employed persons and their share within the structure of the economy, as well as the relationship between changes in wages and changes in the share of employees in the selected sectors.

RESULTS

Labour motivation is one of the key components of the personnel management system, as it determines the effective utilisation of labour potential and directly influences the results of the enterprise's activities (Poór *et al.*, 2025). It represents a combination of internal and external incentives for work that determine an employee's behaviour, the form, direction and intensity of their work, thereby directly influencing the enterprise's performance. In agricultural enterprises, the application of work motivation theories requires consideration of sector-specific factors that influence the effectiveness of staff incentives (Kanas & Steinmetz, 2021). Due to seasonality and the low capital intensity of the agricultural sector, wage levels here are lower than in industry or the information technology sector; therefore, financial incentives alone are insufficient. A comprehensive approach combining material and non-material motivators is required. The seasonal nature of the work leads to uneven workloads and the risk of underemployment, which requires flexible incentive systems – short-term contracts, seasonal bonuses, performance-related bonuses for production cycles, and social support (Manoharan *et al.*, 2023a). It is also important to retain skilled staff capable of working with machinery and natural resources. As results depend on external factors (weather, soil, prices), the link between workers' efforts and outcomes is weak. Thus, collective motivation based on shared responsibility is effective, as is the development of non-material incentives – a sense of belonging, professional pride, stability and opportunities for development (Johari & Jha, 2020; Westerman, 2020).

Theories of work motivation distinguish between incentives and interests. Incentives are material or non-material factors used by an organisation to influence employees' work behaviour with the aim of increasing their productivity and the efficiency of economic activity. An employee's interests, in turn, represent the sum of their needs, values and expectations, which determine their motivation to work and their level of engagement in work activities. These encompass material, social, psychological and professional development interests. Incentives are classified according to several criteria. By nature of their impact, they are divided into material (monetary and non-monetary) and non-material. Material monetary incentives include wages,

bonuses, allowances and profit-sharing. Material non-monetary incentives include benefits packages, perks, housing, meals and insurance. Non-material incentives include recognition, praise, career progression, professional training and improved working conditions. By level of application, a distinction is made between individual incentives (personal bonuses, pay rises), collective incentives (team bonuses, shared profit-sharing) and organisational incentives (corporate programmes). Based on the source of motivation, a distinction is made between external (extrinsic) incentives, which are based on material rewards and social guarantees, and internal (intrinsic) incentives, which are linked to job satisfaction, self-fulfilment and a sense of the significance of one's work (Ghasemi & Shakerian, 2025).

An employee's interests form the basis of their intrinsic motivation, influence their perception of incentives and determine their behavioural guidelines, in particular their drive for performance, willingness to take on responsibility and long-term loyalty to their employer. In agricultural enterprises, labour motivation is characterised by seasonality, high levels of physical exertion, and the dependence of work outcomes on natural and climatic conditions and fluctuations in agricultural market conditions. Consequently, the development of an effective labour motivation mechanism in agricultural enterprises has not only an economic but also a social dimension, as it concerns ensuring a decent standard of living for workers and the stable development of rural areas. The theoretical and methodological foundations of labour motivation have evolved through the development of economic thought and socio-psychological approaches. Classical economics, as exemplified by the work of A. Smith (1776), linked motivation primarily to material incentives and wages; however, this approach did not take into account the psychological and social multidimensionality of labour behaviour. Further development was driven by humanistic concepts, notably A.H. Maslow's hierarchy of needs (1954), the models of D. McGregor (1960) and F. Herzberg *et al.* (1959), which emphasised the importance of non-material incentives and intrinsic needs. Contemporary approaches integrate economic, behavioural and social factors, drawing on V. Vroom's expectancy theory (1964), J.S. Adams' equity theory (1965) and B.F. Skinner's reinforcement model (1953). The evolution of ideas about motivation reflects a shift from a purely materialistic to a comprehensive understanding of labour activity, encompassing interests, values, social ties and the need for self-actualisation.

The methodology for studying labour motivation in agriculture combines economic, sociological and psychological approaches (Xu *et al.,* 2022). The economic approach focuses on wages, bonuses and social security, establishing a direct link between work outcomes and remuneration whilst accounting for seasonality and collective forms of incentives (Nikolova & Cnossen, 2020; Manoharan *et al*., 2023b). The sociological approach views motivation as a result of social relations, norms and values, emphasising the importance of collective culture, trust and team spirit (McCollum & Findlay, 2019; Hyggen & Vedeler, 2021). The psychological approach focuses on internal behavioural factors – needs, values, recognition, development and comfort – taking into account the individual characteristics of employees. Such a comprehensive approach enhances emotional engagement, professional pride and resilience to seasonal challenges. Table 1 summarises the key features of these approaches.

Table 1. Approaches to understanding labour motivation

Approach to labour motivation	Examples of incentives in the agricultural sector	Purpose / effect on the employee
Economic	Wages, performance-related bonuses, incentives for exceeding targets, profit-sharing schemes (for managers), and social guarantees (insurance, housing, meals)	Increase in labour productivity, stimulation of performance through material rewards, and income stability
Social	Recognition within the team, support from colleagues and management, corporate events, development of team spirit, and participation in community life	Strengthening loyalty, cohesion, and a sense of belonging, as well as enhancing social stability

Table 1, Continued

Approach to labour motivation	Examples of incentives in the agricultural sector	Purpose / effect on the employee
Psychological	Opportunities to influence processes, recognition of achievements, professional development, training, self-realisation, and a sense of the significance of one's work	Enhancement of intrinsic motivation, emotional engagement, independence and responsibility, and satisfaction with work and its results

Source: compiled by the authors based on D. McCollum & A. Findlay (2019), M. Nikolova & F. Cnossen (2020), C. Schultz *et al.* (2020), C. Hyggen & J.S. Vedeler (2021), Y. Xu *et al.* (2022), K. Manoharan *et al.* (2023b)

As shown in Table 1, an effective motivational system in the agricultural sector requires an integrated approach combining economic, social, and psychological incentives. Economic instruments ensure employees' material interest and income stability, social incentives contribute to strengthening the workforce, loyalty, and social cohesion, while psychological incentives satisfy employees' internal needs, increase their emotional engagement, and enhance their sense of the significance of work. Thus, labour motivation in agricultural enterprises has a comprehensive nature and should be based on a combination of material and non-material incentives, the provision of social protection for employees, and the creation of conditions that increase the prestige of agricultural work. In Ukraine, the formation of a modern labour motivation system in agricultural enterprises remains at a stage of development characterised by the search for optimal incentive mechanisms capable of simultaneously ensuring production efficiency and improving employees' welfare.

From the perspective of strategic management in agricultural enterprises, an effective labour motivation system is not merely an instrument of personnel policy but also a key element of the overall entrepreneurial strategy. Agricultural enterprises implementing innovative approaches to employee incentives – including flexible wage systems linked to production cycle outcomes, competency development programmes, and employee participation in managerial decision-making – demonstrate greater adaptability to market fluctuations. The digitalisation of agricultural production and the implementation of precision farming are transforming the structure of labour functions, increasing the share of intellectual and technologically complex work, which requires a revision of traditional motivational models towards strengthening non-material and developmental incentives. Consequently, the management of labour motivation in modern agricultural enterprises is both an operational management task and an element of an innovative entrepreneurial strategy.

Given the key role of material motivation in shaping employees' labour activity, particular attention should be paid to the analysis of wages as the principal economic incentive. In the context of Ukraine, wage levels and their structural characteristics vary significantly across sectors and regions, which affects employees' perceptions of financial incentives and, consequently, their motivation and productivity. Agriculture is characterised by lower average wages compared with industry or the service sector, as well as by high seasonality and the dependence of income on natural, climatic, and market factors. This necessitates a statistical analysis of wage levels, their dynamics, and structural characteristics both nationally and within the agricultural sector in particular. Figure 1 presents nominal wages in Ukraine during the period 1995-2024 overall, as well as specifically in the agricultural sector, industry, and construction. As shown in Figure 1, the average wage in Ukraine during 1995-2024 increased hyperbolically. In 1995, the highest-paid sector was construction, while the lowest-paid was agriculture. During this period, wages in the agricultural sector increased from UAH 52 to UAH 18,012; in construction from UAH 103 to UAH 16,928; in industry from UAH 89 to UAH 23,150; while the national average wage increased from UAH 73 to UAH 21,473. The overall trend is characterised by steady growth with temporary slowdowns associated with the

financial crisis of 2008-2009, the COVID-19 pandemic, and the full-scale invasion in 2022. Despite the overall increase in nominal incomes, the agricultural sector remained throughout the entire period the sector with the lowest-paid labour, indicating the persistence of a significant wage gap between agriculture and the more capital-intensive sectors of the economy. An assessment of real wages during this period is presented in Figure 2, based on formula (1):

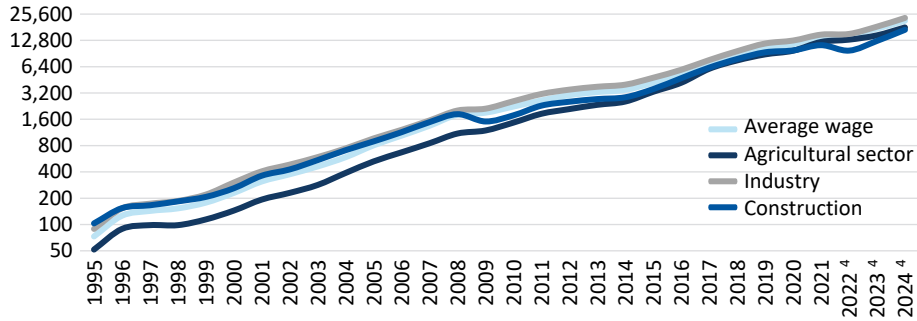

Figure 1. Dynamics of the average nominal wage in Ukraine by main sectors of the economy, 1995-2024, UAH

Note: [4] – excluding information from temporarily occupied territories

Source: compiled by the authors based on data from Ukrstat (n.d.)

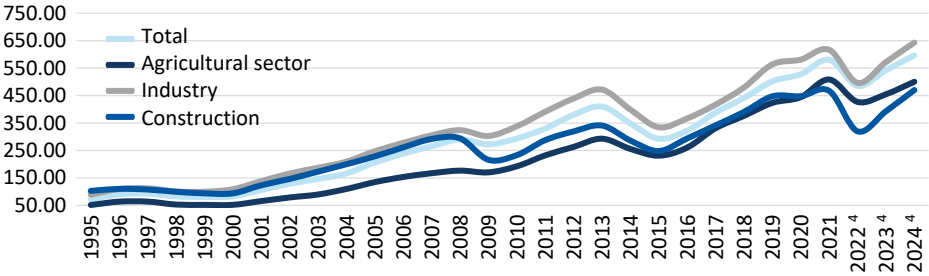

Figure 2. Real average wages in Ukraine by sector, 1995-2024, UAH

Note: [4] – excluding information from temporarily occupied territories

Source: compiled by the authors based on data from Ukrstat (n.d.)

The data presented in Figure 2 provide a clearer understanding of the extent to which each sector became better remunerated. Thus, the average real wage in Ukraine increased by 8.2 times, in industry by 7.2 times, in construction by 4.6 times, while in agriculture it increased by 9.7 times. The overall upward trend changed only in 2009 (a decline in the overall real wage by 6%, in the agricultural sector by 4%, in industry by 7%, and in construction by 27%) and in 2014-2015 (a decline in the overall real wage by 16%, in the agricultural sector by 10%, in industry by 16%, and in construction by 13%): in the first case, this was related to the global financial crisis, while in the second case it was associated with the occupation of Crimea and part of Donbas. Thus, although the average wage in agriculture in Ukraine remains below the national average wage, a positive trend can be observed in terms of the convergence of agricultural wages towards the national average. It should be noted that among the selected sectors, such a trend is observed only in the agricultural sector of the economy. It is also worth considering the indicator showing the extent to which wages in agricultural enterprises differ from the average wage in the country. Its dynamics are presented in Figure 3, calculated on the basis of formula (2):

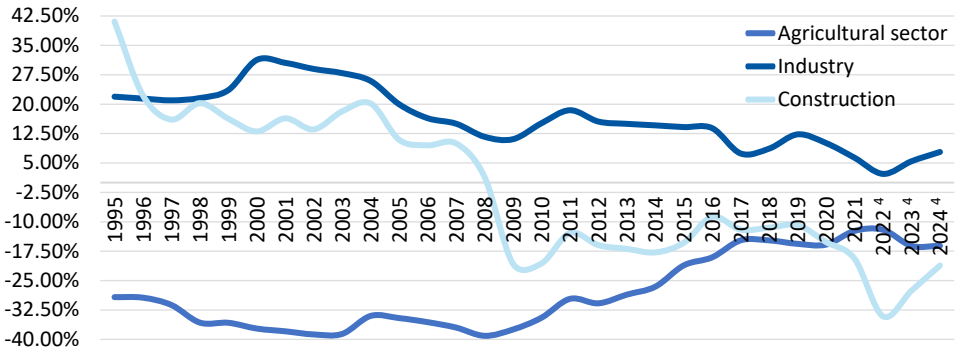

Figure 3. Deviation of the real average wage by sector from the national average in Ukraine, 1995-2024

Note: [4] – excluding information from temporarily occupied territories

Source: compiled by the authors based on data from Ukrstat (n.d.)

As can be seen from Figure 3, the gap between the average wage in the agricultural sector and the overall average wage narrowed from -30% to -16%, whilst in industry and construction it widened from 22% to 8% and from 41% to -21% respectively. A significant decline in construction occurred in 2008-2009 (from 1.44% to -20.72%), which was linked to the global financial crisis. The agricultural sector of the economy, on the other hand, began to grow from that point onwards. Another metric characterising labour motivation in agricultural enterprises is the level of employment in the real economy sectors. Thus, the absolute figures for the number of employed persons are shown in Figure 4:

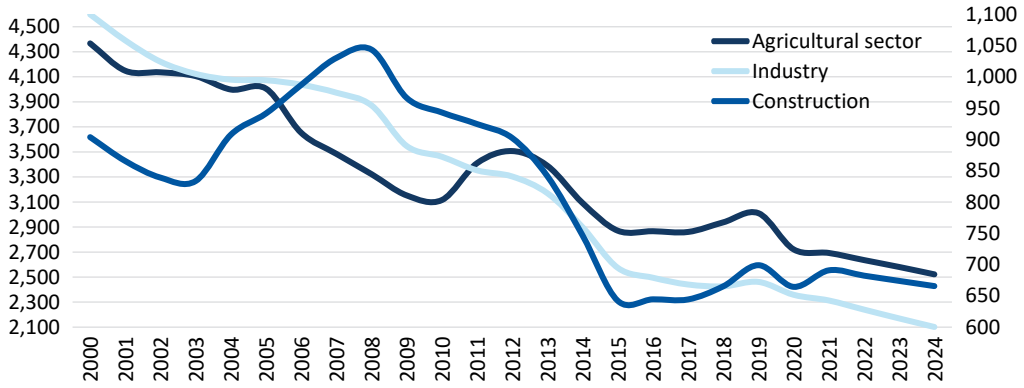

Figure 4. Dynamics of the number of employed persons in selected sectors of the Ukrainian economy during the period 2000-2021, thousand persons

Note: values for the construction sector correspond to the scale on the right-hand side, whereas values for the agricultural and industrial sectors correspond to the scale on the left-hand side

Source: compiled by the authors based on data from Ukrstat (n.d.)

As can be seen from Figure 4, the number of employed persons in Ukraine gradually declined in each of the sectors. In the agricultural sector, employment decreased from 4,367 thousand persons to 2,692.7 thousand persons (by 38.3%); in industry, from 4,598.3 thousand persons to 2,313.2 thousand persons (by 49.7%); and in construction from 903.6 thousand persons to 690.8 thousand persons during the period from 2000 to 2021 (by 23.6%). Nevertheless, this was largely

associated with the decline in Ukraine's overall population. The working-age population decreased by 4,565 thousand persons, or 23.6%. At the same time, the total population decreased by 5,258.06 thousand persons, or 10.61%. This indicates that the majority of the population decline involved economically active individuals, which may be associated with labour migration abroad. However, there are other explanations for this phenomenon, including technological development and automation, as well as structural changes in the economy (an increasing role of the service sector). Information for 2022, 2023, and 2024 is unavailable due to the limited release of statistical data by the State Statistics Service of Ukraine. Nevertheless, there are estimates regarding the overall population decline and general trends in these sectors, on the basis of which forecasts for 2022-2024 were made. According to these forecasts, the number of employed persons in the agricultural sector decreased by 20% during 2021-2024, in industry by 27.7%, and in construction by 30%. However, a more detailed analysis of these data will only be possible if official statistics are published by the State Statistics Service after the end of the full-scale invasion.

Thus, it is also worth considering the share of employed persons in each sector relative to the total number of employed persons during the analysed period. The share of employment in all three sectors generally declined, although the rates of decline differed, with the highest decline observed in industry. The share of employment in industry decreased from almost 23% to 14.8%; in the agricultural sector from 21.6% to 17.2%; while the situation in construction remained more stable, with 4-5% of all employed persons in the country working in this sector annually. This decline is associated not only with the overall decrease in the country's population but also with the reorientation of the economy towards the tertiary sector, which generally offers higher wages to employees. According to forecast data for the period 2022-2024, the share of employment in the agricultural sector decreased from 17.2% to 16.1%; in industry from 14.8% to 12.5%; and in construction from 4.4% to 3.6%. Data on employment shares were calculated on the basis of employment figures in each sector (Figure 4) and the total number of employed persons; all information was obtained from the official website of Ukrstat (n.d.). Although official data are unavailable, an increase in the share of employment would likely have occurred in the defence sector (due to an increase in the number of military personnel). The role played by changes in wages in such trends can be assessed by comparing changes in the share of employment with changes in the difference between average wages in the sectors and the national average. These data are presented in Table 2:

Table 2. Comparison of indicators of changes in the share of employment and the average wage

Indicator	Change in the share of employment	Change in the ratio of the sector's average wage to the national average wage
Agricultural sector	-25.6%	56.72%
Industry	-45.0%	-75.05%
Construction	-19.6%	-262.27%

Note: calculated on the basis of formula (2) and formula (3)
Source: compiled by the authors based on data from Ukrstat (n.d.)

As can be seen from Table 2, it is difficult to identify a clear relationship between changes in the ratio of average sectoral wages to the national average and changes in the share of employed persons. In construction, the average wage in the sector became significantly less attractive for employees, yet the decline in the share of employment amounted to only -1.2%, which was the smallest among all selected sectors of the real economy. At the same time, the change in agriculture reached -20.3%, despite the fact that the situation regarding average wages improved. The situation in industry was the worst in terms of employment, while remaining moderate in terms of wages. This indicates that other factors must play a role in the absence of a direct correlation, including both the social and psychological factors mentioned

above and those specific to each sector in relation to specialisation (the transition to a more highly paid field may be more difficult in some sectors than in others).

Thus, work motivation is a key factor in the effectiveness of human resource management, combining material and non-material incentives that determine employees' work behaviour. In the agricultural sector of the economy, due to seasonality and dependence on natural conditions, an integrated motivation system that combines economic, social and psychological approaches is effective. Statistical analysis for the period 1995-2024 showed an increase in real wages, particularly in agriculture; however, employment levels in the sector declined, highlighting the importance of non-material factors – self-fulfilment, social support and trust – in fostering sustainable employee motivation. Alongside the economic factors of labour motivation, which have traditionally remained the focus of academic research, social, psychological, and specific non-material aspects of labour motivation are becoming increasingly significant under the conditions of modern transformations in the agricultural sector. For agricultural enterprises, these aspects are of particular importance because the sector is characterised by seasonal production processes, increased levels of physical workload, dependence of labour outcomes on natural and climatic conditions, and relatively lower material remuneration compared with other sectors of the economy. Under such conditions, non-economic incentives are capable of ensuring the stability of labour behaviour, long-term employee engagement, and loyalty to the employer. All of the characteristics of labour motivation described above can be summarised in the form of a diagram (Fig. 5):

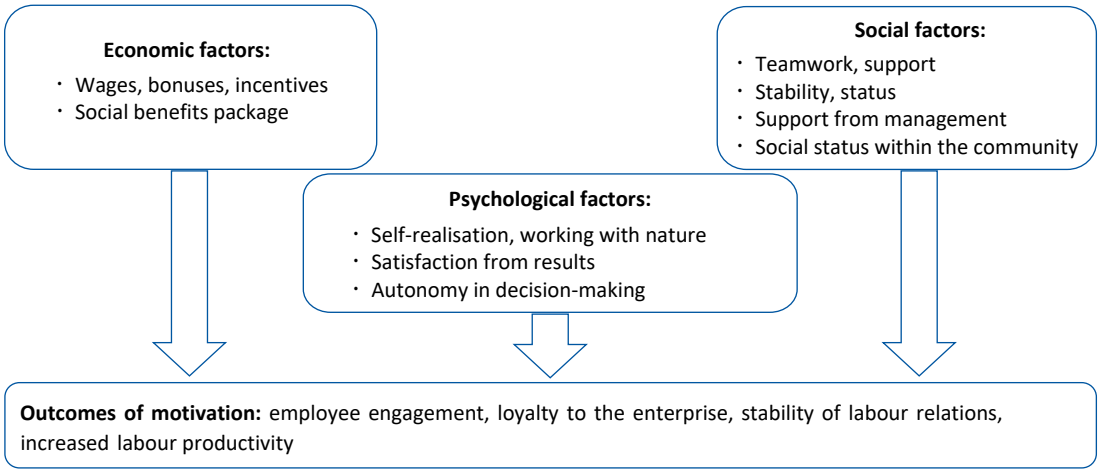

Figure 5. A model of labour motivation in agricultural enterprises

Source: compiled by the authors

The deepening of the theoretical foundations of labour motivation in agricultural enterprises requires moving beyond the traditional economic approach, which focuses primarily on wages and material incentives. The sector-specific nature of agricultural production limits the effectiveness of exclusively financial motivators, since labour outcomes largely depend on natural and climatic conditions, seasonality, and fluctuations in market conditions, while the relationship between an employee's individual efforts and the final result is weakened. Under such conditions, the role of social, psychological, and specific non-material factors increases, as they shape employees' intrinsic interest, ensure the stability of labour behaviour, and support long-term engagement in the production process. The social approach to labour motivation in agricultural enterprises is based on the specific organisation of work in the agricultural

sector, where production activities are carried out within relatively stable workforces closely connected with local communities. For employees, not only wage conditions are important, but also social recognition, support from colleagues and management, a sense of fairness, employment stability, and the opportunity to combine professional activity with family life. In rural areas, labour often has a pronounced social dimension, as it forms part of a way of life and an element of social identity, thereby strengthening the motivational effect of non-material social incentives. The psychological approach to labour motivation in the agricultural sector has a clearly defined sectoral specificity associated with the nature of work objects and the duration of production cycles. A significant proportion of agricultural workers demonstrate intrinsic motivation driven by the desire to work with plants and animals, care for them over an extended period, and observe the results of their own labour in the form of crop yields or livestock productivity. Achieving planned outcomes creates a sense of professional pride, job satisfaction, and self-realisation, which strengthens intrinsic interest in fulfilling work responsibilities regardless of fluctuations in material rewards.

Under modern conditions, the system of psychological and specific non-material motivational factors in agricultural enterprises should also include institutionally determined interests associated with the possibility and guarantee of exemption from military conscription during mobilisation. For male employees of working age, this factor acquires particular significance, as it directly influences their sense of personal security, employment stability, and ability to engage in long-term career planning. The existence of legally established mechanisms for reserving employees of agricultural enterprises recognised as critically important for maintaining the functioning of the economy and ensuring the state's food security creates an additional non-material motive for maintaining employment relationships and increases staff loyalty. From a motivational perspective, this factor combines institutional and psychological dimensions because, on the one hand, it is based on legal norms, while on the other hand it transforms into an employee's intrinsic interest in remaining within the agricultural sector and fulfilling professional duties under conditions of heightened social responsibility.

DISCUSSION

Thus, labour motivation in agriculture is a complex process incorporating economic, social, and psychological factors. Particular importance is attached to a sense of fairness, trust in management, corporate culture, and opportunities for professional development. An effective motivational system combines material and non-material incentives in order to increase loyalty, cohesion, and employees' intrinsic engagement. An analysis of wage and employment dynamics in the sector during 1995-2024 demonstrates a 9.68-fold increase in real wages and a reduction in the gap with the national average from -30% to -16%; at the same time, the share of employed persons decreased by 20.3%, indicating the significance of non-material factors. Thus, although wage increases are important, they are insufficient on their own, and the sustainable development of the agricultural sector requires a combination of economic, social, and psychological motivational mechanisms. From the perspective of agribusiness management, the establishment of an effective labour motivation system constitutes a strategic objective of the enterprise. Managers of agricultural enterprises who apply modern management approaches – including differentiated motivational programmes focused on individual and collective performance, the implementation of innovative HR tools, and transparent systems for evaluating labour efficiency – achieve higher levels of staff loyalty and reduce employee turnover. The obtained results indicate that entrepreneurial decisions in the field of personnel management should be considered comprehensively: from establishing competitive remuneration to developing an organisational culture that supports the engagement and development of every employee.

In Ukraine, social and psychological factors play a significant role in labour motivation. Although the situation in the agricultural sector has improved over time, unlike the two other sectors used for comparison – namely manufacturing and construction – wage levels remain

below average. S.S. Maican *et al.* (2021) conducted a study on a small sample of farmers and demonstrated the following pattern: worker motivation is a key factor in increasing the productivity and economic efficiency of agricultural enterprises. In the Romanian model, farmer motivation has both a direct and an indirect impact on economic outcomes through increased job satisfaction, which ensures the stability of production processes. This approach is fully consistent with the findings of the Ukrainian analysis, where wage levels are an important but not the sole determinant of stable employment. This points to a trend common to Central and Eastern European countries – a gradual shift from a purely economic to a comprehensive approach to motivation management, combining material, social and psychological factors. Thus, the empirical results of both studies confirm the validity of an integrated approach to the development of a labour motivation system in agriculture, which takes into account the interaction of material and non-material factors.

The results of this study confirm that economic factors remain a fundamental, but not exhaustive, element of the labour motivation system in Ukraine's agricultural sector. It was shown that wages are not the primary cause of changes in the country's employment levels, indicating the presence of other factors, particularly social and psychological ones. In turn, M. Heřmanová *et al.* (2024) investigated the motivational factors of Generation Z in agriculture and demonstrated a common trend towards a shift in emphasis from material incentives to non-material factors aligned with the values of the new generation of workers. Whilst the Ukrainian model demonstrates the predominance of economic motivational mechanisms, research on Generation Z shows that for young people, the key determinants of engagement are work-life balance, autonomy, flexible working hours, personal development and social support. This indicates a fundamental shift in the perception of work: for the new generation, it ceases to be merely a source of income and becomes a space for self-fulfilment and psychological well-being.

This study has shown that economic incentives remain a key driver of employment and labour productivity in Ukraine's agricultural sector. In particular, it has been established that an increase in real wages and the share of agricultural income in the overall national wage structure contributes to a reduction in unemployment and a strengthening of labour motivation. C. Schaffer *et al.* (2024), in turn, investigated farmers' motivation and perceptions of the benefits and challenges of agroforestry in Northern Europe, particularly Sweden. It was shown that the multifunctionality of agroforestry stems from farmers' diverse motivations: income generation, environmental sustainability, climate adaptation and landscape management. Farmers deliberately design their systems to provide a range of ecosystem services (provisioning, regulating, supporting and cultural). They demonstrate innovation, strategic thinking and adaptability, which are influenced by dispositional, social and cognitive factors. Many combine several agroforestry systems to optimise land use, increase productivity, diversify income and strengthen resilience to market changes. However, challenges include management complexity, a lack of appropriate technologies, limited plant materials and insufficient practical knowledge. Comparing these findings with current research reveals that in both countries, the understanding of work in the agricultural sector is viewed through the prism of multifunctional activities that combine economic, environmental and social objectives. This approach forms an integrated model of motivation, in which behavioural, cognitive and ethical factors are no less important than material incentives.

The current study demonstrated that the primary driver of labour motivation in Ukraine's agricultural sector remains the economic factor, particularly the level of wages and social-labour guarantees. V. Marinoudi *et al.* (2024) examined adaptation to the agricultural labour market shaped by robotisation. It was shown how automation and digital technologies are transforming the agricultural labour market and redefining the skills required for future work; automation not only replaces repetitive tasks but also reshapes labour roles towards more complex, intellectual, and socially oriented activities. This shift increases demand for higher-order cognitive and soft skills, such as

critical thinking, problem-solving, adaptability, and collaboration, while simultaneously reducing the demand for physical labour and increasing wage inequality between skilled and unskilled workers, thereby contributing to economic polarisation.

J. Ognjanović *et al.* (2023) demonstrated that the efficiency of human capital significantly improves the financial performance and productivity of agricultural enterprises, in particular by increasing net profit, operating profit and labour productivity per worker. However, this does not have a significant impact on value added per employee. This indicates that investment in employees' knowledge, skills and development is a key factor for success and competitiveness in agriculture, particularly when combined with modern technologies and favourable working conditions. The findings of this and the current study are consistent in recognising human capital as a central factor in the efficiency of agricultural production, yet they approach this issue from different academic perspectives. This article focuses on motivational mechanisms in the workplace as the basis for improving productivity and sustainability in agriculture, whereas the Serbian study analyses the effectiveness of human capital utilisation in financial terms – net profit, operating profit and labour productivity per employee. The similarity between the two works lies in the recognition that investment in human capital – through skills enhancement, motivation and competence development – has a direct positive impact on the performance of agricultural enterprises. Both studies demonstrate that effective human resource management contributes to increased labour productivity and the competitiveness of the sector. At the same time, the Serbian article empirically confirms the impact of human capital on enterprise profitability, whilst the Ukrainian study emphasises the socio-psychological aspects of motivation.

Thus, labour motivation in agriculture is shaped by a combination of economic, social and psychological factors. Material incentives remain important, but their effectiveness is significantly enhanced when complemented by non-material forms of encouragement – recognition, support, opportunities for development and a supportive social environment. A comparison of the agricultural sector with other industries has shown that, despite a gradual improvement in working conditions, it is precisely non-material factors that often determine staff engagement and retention. Thus, improving work performance in agricultural enterprises requires a comprehensive labour motivation system that combines financial incentives with the development of corporate culture, support for employees and the building of trust in the employer.

CONCLUSIONS

Labour motivation in agricultural enterprises is a key factor in the effective utilisation of labour potential and the development of the sector. The evolution of theoretical approaches demonstrates a transition from classical models focused primarily on material incentives to integrated concepts combining economic, social, and psychological factors. Within the motivational system of agricultural enterprises, an important role is played not only by incentives – material and non-material, individual and collective – but also by employees' interests, which determine their engagement and attitude towards work. The combination of economic, sociological, and psychological approaches makes it possible to create a balanced motivational model capable of increasing productivity, loyalty, and staff resilience to the specific challenges of agricultural production.

An empirical analysis of wage dynamics and employment levels in Ukraine's agricultural sector during the period 1995-2024 revealed a positive trend in the growth of real wages in the agricultural sector by 9.68 times, which reduced the gap with the national average wage from -30% to -16%. In industry, wages also increased, though at a slower rate (by 7.22 times in real terms from 1995 to 2024), resulting in the persistence of significant disparities between individual subsectors. In the construction sector, the dynamics were stable but less pronounced compared with the agricultural sector, indicating lower elasticity to changes in market conditions. The rate of wage growth in the agricultural sector was the highest among the analysed sectors. At the same time, the share of employment in the sector decreased by 20.3%, indicating the significance of non-ma-

terial motivational factors and the specific nature of the sector; moreover, such a decline was also characteristic of both industry and construction. The research findings demonstrate the need to implement flexible motivational systems combining material incentives (wages, bonuses, social guarantees) with collective forms of encouragement, seasonal bonuses, non-material incentives, opportunities for professional development, and social support for employees. Such a comprehensive approach makes it possible to increase productivity, strengthen staff loyalty, retain qualified personnel, and contribute to the socio-economic stability of rural areas. For entrepreneurs and managers in the agricultural business, this means a practical need to move from reactive personnel management to proactive strategic planning of the motivational system as a competitive advantage of the enterprise under conditions of the digital transformation of the agricultural sector.

The limitation of the study lies in the fact that economic models explain only part of the changes in employment, while other factors, predominantly socio-psychological, determine the need to establish an effective labour motivation system in the agricultural sector as a key condition for improving labour productivity, enterprise stability, and the welfare of the rural population. Further research may focus on integrated motivational models taking into account regional characteristics, employee qualifications, and seasonal production cycles, as well as on assessing the effectiveness of incentives through labour productivity, job satisfaction, and social stability within communities and the state as a whole.

ACKNOWLEDGEMENTS

None.

FUNDING

None.

CONFLICT OF INTEREST

None.

REFERENCES

[1] Adams, J.S. (1965). Inequity in social exchange. *Advances in Experimental Social Psychology*, 2, 267-299. doi: 10.1016/S0065-2601(08)60108-2.

[2] Bachynska, O.M. (2024). Motivation of enterprise personnel in today's realities. *Inclusion and Society*, 3(8), 7-14. doi: 10.32782/2787-5137-2024-3-1.

[3] Chikurkova, A.D., & Hray, Yu.M. (2020). Improvement of the formation of motivation policy on agricultural enterprises. *Podilian Bulletin: Agriculture, Engineering, Economics*, 32, 155-165.

[4] Ghasemi, M., & Shakerian, S. (2025). Incentives on the motivation and job performance; insights from community health workers in Iran. *BMC Health Services Research*, 25, article number 1429. doi: 10.1186/s12913-025-13543-6.

[5] Herasymenko, A.V. (2023). Economic content and analysis of the influence of factors on the development of socio-economic factors of labor motivation in agricultural business entities. *Economic Space*, 187, 44-48. doi: 10.32782/2224-6282/187-7.

[6] Heřmanová, M., Kuralová, K., Prokop, M., & Pilař, L. (2024). The attractiveness of employee benefits in agriculture from the perspective of Generation Z. *Agriculture*, 14(7), article number 1204. doi: 10.3390/agriculture14071204.

[7] Herzberg, F., Mausner, B., & Snyderman, B.-C. (1959). *The motivation to work*. New York: John Wiley & Sons. doi: 10.7202/1022040ar.

[8] Hyggen, C., & Vedeler, J.S. (2021). Employer engagement and active labour market policies. Evidence from a Norwegian multi-method study. *Social Policy and Society*, 20(4), 548-560. doi: 10.1017/S1474746420000421.

[9] Johari, S., & Jha, K.N. (2020). Impact of work motivation on construction labor productivity. *Journal of Management in Engineering*, 36(5). doi: 10.1061/(ASCE)ME.1943-5479.0000824.

[10] Kanas, A., & Steinmetz, S. (2021). Economic outcomes of immigrants with different migration motives: The role of labour market policies. *European Sociological Review*, 37(3), 449-464. doi: 10.1093/esr/jcaa058.

[11] Lyschenko, Z. (2024). Motivational aspect in personnel management of agricultural enterprises. *Herald of Khmelnytskyi National University. Economic Sciences*, 332(4), 327-331. doi: 10.31891/2307-5740-2024-332-50.
[12] Maican, S.S., Muntean, A.C., Paștiu, A.C., Stępień, S., Polcyn, J., Dobra, I.B., Dârja, M., & Moisă, C.O. (2021). Motivational factors, job satisfaction, and economic performance in Romanian small farms. *Sustainability*, 13(11), article number 5832. doi: 10.3390/su13115832.
[13] Manoharan, K., Dissanayake, P., Pathirana, C., Deegahawature, D., & Silva, R. (2023a). Assessment of critical factors influencing the performance of labour in Sri Lankan construction industry. *International Journal of Construction Management*, 23(1), 144-155. doi: 10.1080/15623599.2020.1854042.
[14] Manoharan, K., Dissanayake, P., Pathirana, C., Deegahawature, D., & Silva, R. (2023b). Organisational elements controlling labour efficiency in building construction operations – a construction supervisors' perspective. *International Journal of Industrial Engineering and Operations Management*, 5(1), 54-73. doi: 10.1108/IJIEOM-10-2022-0052.
[15] Marinoudi, V., Benos, L., Villa, C.C., Lampridi, M., Kateris, D., Berruto, R., Pearson, S., Sørensen, C.G., & Bochtis, D. (2024). Adapting to the agricultural labor market shaped by robotization. *Sustainability*, 16(16), article number 7061. doi: 10.3390/su16167061.
[16] Maslow, A.H. (1954). *Motivation and personality*. New York: Harper & Row.
[17] McCollum, D., & Findlay, A. (2019). Oiling the wheels? Flexible labour markets and the migration industry. In S. Cranston, J. Schapendonk & E. Spaan (Eds.), *Exploring the migration industries* (Chapter 2). London: Routledge. doi: 10.4324/9780429199660-1.
[18] McGregor, D. (1960). *The human side of enterprise*. New York: McGraw-Hill.
[19] Mykhaylova, O.S., Pisarenko, S.V., & Vakulenko, Yu.V. (2020). Use of software products during work motivation in the dairy farming industry. *Black Sea Economic Studies. Economics and Enterprise Management*, 53, 109-114. doi: 10.32843/bses.53-16.
[20] Nikolova, M., & Cnossen, F. (2020). What makes work meaningful and why economists should care about it. *Labour Economics*, 65, article number 101847. doi: 10.1016/j.labeco.2020.101847.
[21] Ognjanović, J., Slavković, M., & Bugarčić, M. (2023). Managing employee performance in the agricultural sector: Importance of human capital development. *Economic of Agriculture*, 70(1), 237-252. doi: 10.59267/ekoPolj2301237O.
[22] Poór, J., Juhász, T., Caha, Z., Stor, M., & Haromszeki, L. (2025). Factors influencing labour shortages in Visegrad (V4) countries with regard to difficult economic environments. *Regional Statistics*, 15(1), 90-116. doi: 10.15196/RS150105.
[23] Schaffer, C., Elbakidze, M., & Björklund, J. (2024). Motivation and perception of farmers on the benefits and challenges of agroforestry in Sweden (Northern Europe). *Agroforestry Systems*, 98, 939-958. doi: 10.1007/s10457-024-00964-1.
[24] Schultz, C., Lutz, P., & Simon, S. (2020). Explaining the immigration policy mix: Countries' relative openness to asylum and labour migration. *European Journal of Political Research*, 60(4), 763-784. doi: 10.1111/1475-6765.12422.
[25] Skinner, B.F. (1953). *Science and human behavior*. New York: The MacMillan Company.
[26] Smith, A. (1776). *An inquiry into the nature and causes of the wealth of nations*. London: W. Strahan & T. Cadell.
[27] Tkachenko, K.A., & Kopteva, G.M. (2023). Motivation and stimulation of personnel work in enterprise management. *Bulletin of the National Technical University "KhPI". Series: Economic Sciences*, 4, 33-38. doi: 10.20998/2519-4461.2023.4.33.
[28] Ukrstat. (n.d.). Retrieved from https://stat.gov.ua/en.
[29] Vroom, V. (1964). *Work and motivation*. New York: John Wiley & Sons.
[30] Westerman, J. (2020). Post-educational motivation to learn cognitive skills in three European labour markets. A comparative analysis of the PIAAC. *Journal of Education and Work*, 34(4), 459-471. doi: 10.1080/13639080.2021.1953693.

[31] Xu, Y., Liu, D., & Tang, D.S. (2022). Decent work and innovative work behaviour: Mediating roles of work engagement, intrinsic motivation and job self-efficacy. *Creativity and Innovation Management*, 31(1), 49-63. doi: 10.1111/caim.12480.
[32] Zastavnyuk, L.I. (2022). Staff motivation as a factor increasing competitiveness of the enterprise. *Economy and Society*, 45. doi: 10.32782/2524-0072/2022-45-54.

Євгеній Ланченко
Доктор економічних наук, доцент
Національний університет біоресурсів і природокористування України
03041, вул. Героїв Оборони, 15, м. Київ, Україна
https://orcid.org/0000-0003-0894-4885
Микола Якименко
Аспірант
Національний університет біоресурсів і природокористування України
03041, вул. Героїв Оборони, 15, м. Київ, Україна
https://orcid.org/0009-0007-5966-1267

Мотивація праці в сільськогосподарських підприємствах: теоретичні засади й стан розвитку в Україні

Анотація. Актуальність дослідження зумовлена тим, що попри визначальну роль мотивації у забезпеченні продуктивності праці та соціально-економічної стабільності сільських територій, її рівень на аграрних підприємствах України залишається низьким через недостатню оплату, сезонність і нестабільну зайнятість. Метою роботи було проаналізувати взаємозв'язок між оплатою праці та зайнятістю в аграрному секторі економіки й визначити значення економічних і неекономічних факторів у мотивації працівників. У рамках дослідження було використано структурний та порівняльний методи, а також метод статистичного аналізу. У процесі дослідження було показано, що складовими мотивації праці є стимули та інтереси, вплив на які можуть здійснювати роботодавці чи держава для того, щоб мотивувати працівника. При цьому стимули можуть бути як матеріальними, так і нематеріальними. Було також розглянуто підходи різних учених щодо дослідження мотивації праці. Аналіз динаміки заробітної плати показав, що у 1995-2024 роках номінальна зарплата в сільськогосподарських підприємствах зросла більш ніж у 120 разів, а реальна – у 9,7 раза, що свідчить про поліпшення матеріальних умов праці. Попри це, заробітна плата працівників сільського господарства залишалася нижчою за середню по країні: у 1995 році розрив становив -30 %, а у 2024 році скоротився до -16 %. У сфері зайнятості спостерігалася стійка тенденція до скорочення: частка працівників аграрного сектору економіки в загальній структурі зайнятості зменшилася на 20,3 %, що зумовлено технологічною модернізацією, сезонністю та демографічними змінами у сільській місцевості. При цьому тенденції, що спостерігалися в аграрному секторі економіки, були найкращі порівняно з іншими секторами, а саме будівництвом та промисловістю. Загалом отримані дані свідчать, що, попри поліпшення фінансових і соціальних умов, мотивація праці потребує комплексного підходу, який поєднує економічні, соціальні й психологічні чинники. Отримані результати мають практичне значення для розроблення дієвих механізмів мотивації, здатних не лише підвищити продуктивність праці, а й забезпечити сталий соціально-економічний розвиток сільських територій України

Ключові слова: заробітна плата; зайнятість; безробіття; аграрний сектор економіки; стимулювання; ефективність праці