CHAPTER 3
BASIC FUNDAMENTALS OF INVESTING
OF SOCIAL MODERNIZATION OF THE STATE

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INTRODUCTION
The effectiveness of social modernization of the state requires the formation of investment attractiveness of social sectors through state regulation of social investing. This process must be governed by two state principles: the principle of social equity and the principle of socio-economic efficiency. The essence of state regulation of investments in social modernization lies in the performance of functions of public authorities. These functions are the provision of public services to which social services belong; financing of social sectors; stimulation of attraction of investments in social development of the state (through realization of communication function) with the purpose of reception of social effect. The fulfillment of the communicative function in the process of attracting investments in social modernization is connected with the formation of attractiveness of social sectors. The amount of funds that the investor will finance depends on the investor's awareness of condition of the object of social sector. The main objective of social investing is to improve the quality of life of the population of the state, through the improvement of its components.

The object of research is social investing in the works of such foreign scientists as: Veblen T.\(^1\)(1984), Buchanan J.\(^2\)(1994), Rostow W.\(^3\). They viewed this type of investing as a tool for reproducing society, but this theory did not have much development.

Some results that were of importance for its development were not systematized, and the relevance of this development can be noted in the analysis of current views on social investing.

The study of scientific literature indicates that such ideas go through the perception of investment support in terms of creating conditions for

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sustainable growth of micro- and macroeconomic entities (4) through the prism of existing patterns in terms of the dependence of investing results on investment volumes as quantitatively limited resources (5). There are two sides of investment support: resource (in the most general view, investment support is treated by scientists as a set of tangible and intangible resources invested in implemented projects) (6) and organizational side as a set of investing methods used to achieve strategic goals and objectives aimed at increasing assets, generating revenue or achieving other positive effects, as well as the concentration and sale investment measures themselves (7). In some cases, the elements of investment support are: identifying the need for investment, sources of investment and methods of their involvement (4), the choice of rational management methods in the field of investing (7), conditions for the implementation of the investing process (6).

That is, as rightly stated by M.Yu. Kodenska, investment support as a category of economy reflects the multidimensional organizational and economic conditions, means, measures and economic relationships, which are manifested in the process of movement of value advanced in capital, with the purpose of accumulation, formation and use of investment resources (8).

In modern literature, there are two concepts of «social investment» and «social investing», if the first component of the phrase implies a direction on the development of society, the second component has differences. Based on the existing author's approaches, it can be noted that social investment is a collection of monetary, material, management, technological and other resources that are directed to the objects of social infrastructure for the purpose of obtaining primarily social effect. Social

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investing is the process of attracting investment resources to social infrastructure, which has stages and milestones\textsuperscript{9}.

3.1. The main tasks of social investing

In market conditions, forms and methods of coordinating public administration of social modernization are capable of solving those organizational and managerial tasks that are adequate to the level of their complexity. In our view, this class of tasks involves attracting investment in the social modernization of the state.

This task is possible through the following steps.

1. To create conditions for continuous improvement of forms and methods of organization of regulation in accordance with the level of complexity of the tasks to be solved, the requirements of the environment, using active means of eliminating dynamic contradictions in the system of state influence on the process of attracting investments in social modernization.

2. To ensure a clear delineation of the goals, functions, rights and responsibilities of each link, the subsystem of public administration of social modernization. It will create the conditions for attraction of investments.

Undoubtedly, building a quality system of attracting investing resources in social development requires determining the assessment of the effectiveness of social investment projects\textsuperscript{10}.

The scientific literature on management uses the following concepts: purposeful effectiveness, which is determined by the degree of alignment of the results of the action with the purpose intended; social efficiency characterizes the result of social work; organizational effectiveness determines the form of interconnections of the elements of the management system.

There are four main indicators of effectiveness that characterize the level of investment in the social sphere: social effect is an effect determined by the level of public satisfaction with the quality of life; social efficiency is the indicators of the level and quality of life in a particular territory; socio-economic efficiency is a monetary indicator, the income that an investor receives after the implementation of an


investment project; cost-effectiveness is a productive indicator that is calculated by dividing profit by cost.

In addition, it is possible to provide a more complete definition of these categories in relation to the process of attracting investment in the social modernization of the state.

1. With regard to the process of attracting investment in the social modernization of the state, first of all, it determines the social effect, which can be estimated by economic and sociological indicators. These indicators are certainly indicators of the quality and standard of living of the population of the region or of the state as a whole: increasing employment rates, improving housing provision, increasing education and health care. All this can be the result of attracting additional investment in the social sectors.

When determining the level of social investing, it is possible to use social performance indicators. These indicators characterize the number of social problems that have been solved through the implementation of an investing project in one social sector or another. For example, offering additional social services, changing the consumer price index, the level of housing provision in the respective territory, reducing unemployment in the region, changing the demographic indicators of the region, etc.

Socio-economic efficiency can be used in assessing the level of investment. Indicators of this type of efficiency may be the number of people receiving social service, reducing the number of poor people, decreasing the operating costs of enterprises related to the social sphere, reducing the number of people receiving social unemployment assistance.

The last efficiency is economic. It is recognized on the basis of cost minimiz on the of development and implementation of an investment project of a social sector. Its indicators can be net present income, rate of return of a social project, payback period of a social project.

The efficiency of the investment resources receipt can be evaluated on the basis of the realization of the objectives of the investment project, the level of management of the management system, the effectiveness of management decisions on the implementation of the investment project. These decisions are made by state and local governments regarding the feasibility of investing in the social sectors of the respective region.

Performance evaluation can be carried out on the basis of the evaluation of the functioning of the public administration system of social modernization, then performance will be measured not only
mathematically, measures of performance of public authorities on effectiveness of realization the investment projects in a social sector can also be implemented.

In our opinion, the level of effectiveness depends on the growth of indicators of the level and quality of life of the population of a particular region.

If regional authorities cannot influence the establishment of state social guarantees, which are known to be approved at the state level (minimum wage, minimum living wage, minimum retirement age, social assistance level), then local public authorities can influence on several indicators of quality of life (level of health care, level of education, level of provision of housing and communal services, level of employment).

It is by the latter indicators that the level of performance of public authorities can be estimated, and on the basis of these indicators public authorities can determine the effectiveness of social policy implementation in a particular region of the state. These indicators should be decisive in the provision of public funds for the modernization of regional social sectors.

The complexity of assessing the effectiveness of management is also due to a number of specific reasons, such as: the lack of scientifically substantiated standards of management costs, poor control over the timing and quality of tasks, the lack of computer information technologies usage, etc. Governing decisions are related to the future, so goals are not always clearly defined, the resource management model includes complex social needs, political and organizational factors.

The effectiveness of public management of social modernization is the result of achieving the social goal with the maximum possible saving of labor and organizational and material costs. Actually, it is the activity of the management apparatus, which includes the purpose, methods, process and result. However, it is not possible to reduce the multidimensional notion of «management» only to the category «managerial work». Management is a complex phenomenon, a kind of art full of deep social content that is almost impossible to measure accurately, mathematically.

Obviously, there can be no single criterion of effectiveness for all levels of the management structure, they vary depending on the nature of the management body, its place in the management pyramid and social goals. There are no common estimates for social sectors.

It should be noted that organizational and technical actions of employees of public administration apparatus are more amenable to
measuring and determining the effect. However, it should be emphasized that the effectiveness of a regulatory system cannot be reduced to an assessment of its internal activity without evaluating the effectiveness of the impact on the management object.

When assessing the social impact of an investment project, the direct and indirect types of the investment project should be distinguished. By direct type the effect directly related to the implementation of the investment project – the construction (reconstruction, modernization) of the designed objects and their subsequent operation – is understood. The indirect effect is due to tax revenues, additional investments, production development, initiated by the project. As a result, investments made directly into the project induce an additional increase in investment in various social sector as directly in the project implementation region. The social effect of the implementation of a social sphere project on the basis of reproduction is increasing. As a result, the income from social investment is growing and channeled to other social sectors, which provides for higher incomes. This provides for an increase in population demand, an increase in the level of wages, a decrease in unemployment, and an increase in the revenue part of the regional and state budget.

The social effect can be both universal, arising from the implementation of any investment project, and specific, due to certain types of projects and features of the regions in which it is implemented. In addition, the social effect can be both positive and negative.

Let us consider the mechanism of occurrence of various positive social effects.

Creation (reconstruction) of workplaces. New workplaces appear at the projected facilities, as well as construction during the period of construction and assembly works. In addition, the implementation of projects initiates the creation of a large number of workplaces in related industries, depending on the specifics of the project (for example, in the construction industry, mechanical engineering, transport, production and non-production infrastructures in the project implementation areas). The effect of implementing a particular project in the form of profit reinvested in the economy generates a multiplicative effect; the construction and operation of facilities initiate in the long term the creation of new and the reconstruction of existing workplaces in various sectors of the economy.

The positive effect of workplace creation is expressed primarily in the expansion of employment and reduction of unemployment. The effect
of workplace reconstruction is manifested in improving working conditions and, as a consequence, in improving health, reducing cases of general and occupational morbidity, occupational injuries, invalidating the population, premature and avoidable mortality, and increasing life expectancy.

Increasing the standard of living of the population. The increase in household income and the expansion of solvent demand are the result of the remuneration of persons employed in workplaces created (reconstructed) at the projected facilities (direct effect) and the development of production initiated by the project (indirect effect).

Tax revenues from the project, and, in the long run, from the development of production as a consequence of reinvestment of profits. They allow for increased budgetary funding for education, health, culture, social policy, including state aid and compensation at various levels. Thus, wages of the employed in the budgetary sector increase, new workplaces are created in the social sectors, which affects the level and quality of life of the population: the situation on the labor market improves, the incomes from employment and social transfers to the population are increased, the accessibility and quality of the social sphere services provided are increased.

Receiving products (services) produced directly within the project (if directed) by the population in related industries, and as a result of further development of production.

Improvement of the ecological situation as a result of modernization of production, introduction of environmental technologies. This improves the quality of the living environment.

Promoting public health, improving demographics (as a result of reducing premature and avoidable mortality, increasing birth rates, increasing life expectancy). These long-term effects are the combined result of improved working conditions and environmental conditions, rising living standards, developing social infrastructure and innovating in the health care system.

Increasing the educational and qualification levels of workers, reducing the use of unskilled labor (if the projected (reconstructed) production is in demand for highly skilled labor). This effect is particularly evident in the implementation of projects aimed at creating (developing) elements of the national innovation system. Increasing vocational training requirements for employees is an incentive for the development of vocational education.
Reducing social tension in society, ensuring social stability and social support for institutional change.

As it was noted before, the social effect can be both positive and negative. Among the possible negative social consequences of the implementation of investment projects are the following: job cuts due to production modernization; the destruction of competing industries and, as a consequence, the release of labor, the displacement of cheap goods and services from the market; the occurrence of local labor shortages as a result of its outflow from neighboring regions, as well as from the enterprises of the region to the projected facilities; environmental degradation; the emergence of social tensions, social conflicts due to the following factors: increase in the density of development, migration inflow of population in densely populated regions (a similar situation may occur in sparsely populated regions, if the inflow of the population is not accompanied by sufficient development of the social sphere and increase the load on existing objects); the emergence of modern high-paying jobs in depressed and low-living regions, which is not accompanied by increased social needs and investment in local economies, which can lead to firm labor market segmentation and increased social tensions.

Some manifestations of social effect are subject to accurate measurement, in other cases only qualitative assessments and expert conclusions are possible.

When assessing the social effect, its macroeconomic and regional elements must be taken into account, bearing in mind that the social effect achieved at the regional level is an integral part of the macroeconomic effect. The scale of the regional social effect is determined not only by absolute but also by relative indicators that characterize the impact of the investment project on the socio-economic modernization of the regions. Thus, the extent of the social effect is largely determined by the socio-economic situation in the region. Thus, the effect of the establishment of new workplaces will depend on their percentage of existing workplaces in the region and on the situation in the regional labor market.

3.2. Stages of assessment of social effect of investing

The assessment of the social effect of the investing process should include the following components.
Stage 1. Determining the correlation of effects that will occur at macro- and regional levels, identifying the regions that are mostly affected by the project.

In most cases, the investment project is implemented in one or more regions, with the direct effect of workplaces creation and payroll on them, tax revenues appear primarily at the regional level, and indirect effects are redistributed to the macro level. The effect of production of the products envisaged by the project (infrastructure, elements of the innovation system) depending on the scale of the project can be observed both in the region and at the macro level.

For example, when creating social sector objects of local importance in the region, the effect of the services they produce will be manifested at the regional level, at the erection of objects of interregional or state value (university, hospital or consulting and diagnostic center of state subordination, etc.) at the macro level. The effect of the construction of a large transport artery crossing a large territory will be affected both at the macro level and at the level of the respective regions.

If, for example, a large pharmacological production is created, the effect of the products on the consumer market will be at the macro level, and the effect of new workplaces will be mainly at the regional level, the effect of tax revenues will be distributed according to the proportion of contributions to state, regional and local budgets.

Stage 2. Analysis of the initial state of the social sphere and the labor market in the respective regions and forecast trends in their development without taking into account the impact of the investment project.

As the manifestation of regional social effect depends not only on the type of project, but also on the level of socio-economic development of the region, the characterization and forecast of the state of the labor market and social sphere is the starting point for evaluating the investment project.

For this purpose, indicators based on national statistical data should be used, in particular:

- state of the labor market (employment rate, general unemployment, share of unemployed, who have been seeking for a workplace for 12 months and more; level of registered unemployment; forced part-time employment, expressed by the proportion of part-time employees on the initiative of the administration and employees who have been granted leave on the initiative of the administration during the
year, in total; the proportion of those who work in conditions that do not meet the hygiene standards);

‒ the standard of living of the population (average income per capita, their ratio to the subsistence level; specific gravity and number of the population with incomes below the subsistence level; average monthly salary);

‒ development of social sphere (in comparison with normative or average indicators of living conditions of population; provision of population with hospitals and outpatient clinics, medical staff, educational institutions, cultural institutions, social services, transport and communication services);

‒ demographic situation (population reproduction: fertility, mortality, natural increase; migration growth; incidence and disability; population structure by sex and age; average life expectancy);

‒ environmental situation in the region;

‒ other indicators specific to certain regions and investment projects (provision of products, services produced at projected productions, etc.).

Stage 3. Carrying out calculations (or, in case of their impossibility, qualitative estimates) by types of social effect, comparison with baseline and forecast regional indicators, and if the scale of types of effect is significant, then with national indicators.

After distinguishing between macroeconomic and regional manifestations of social effect, as well as an analysis of the socioeconomic situation and development trends in those regions where the impact of the project is most affected, we should proceed directly to quantitative and qualitative assessments of different types of social effect.

Creation (reconstruction) of workplaces. Direct effect. The rationale for the investment project should include the number of workplaces created, upgraded, reconstructed, as well as the number of employees fired due to modernization. In the absence of such data, the total number of employees required for the construction and operation of the projected facilities (the proportion of employees being fired) may be determined on the basis of applicable industry standards, analog projects, model projects, experimental and peer assessments.

Indirect effect. The number of jobs initiated by the project is calculated by the formula:

\[ W = \frac{I \times d}{P}, \]  

(1)
where \( W \) – number of workplaces created (reconstructed); \( L \) – volume of combined and multiplicated investments; \( d \) – the share of investments aimed at workplace creation (according to expert estimates is about 0.8); \( P \) – the average cost of establishment the workplace.

Employment expansion through workplaces creation is calculated as the ratio of the number of new workplaces created to the total number of people employed in the region (for large-scale projects in Ukraine as a whole).

In calculating the reduction in the unemployment rate, it is necessary to expertly estimate the share of workplaces created by the unemployed in the region at the time of project implementation, taking into account their vocational qualification and age-sex composition. Then the possible reduction in the number of unemployed and the unemployment rate are determined.

The possible dismissal of competing enterprises due to their destruction and the corresponding increase in unemployment are also assessed by experts, taking into account the fact that part of the dismissed workers can find employment in the projected facilities.

The number of reconstructed workplaces with improved working conditions is indicated in the project justification or determined expertly.

Increasing the standard of living of the population. Direct effect. The level of average wages of workers at the created (reconstructed) places, divided by categories of personnel, is indicated in the justification of the project or determined expertly, taking into account the average wage, in the relevant industry (region) and the specifics of the project.

The ratio between the projected average wage and the corresponding industry and regional average is then determined, the cumulative annual staff income is calculated, its ratio to the monetary income of the population at the regional (or macro) level, and the estimated increase in solvent demand of the population. The cumulative annual staff income is calculated by the formula:

\[
D = \sum_i Z_i \times Q_i \times 12
\]  

(2),

where \( D \) – total annual staff income; \( Z_i \) – the average monthly salary of \( i \)-th category of personnel; \( Q_i \) – quantity of \( i \)-th category of personnel.

Indirect effect. Growth in incomes of people employed in workplaces created as a result of reinvestment of income is estimated on the basis of the average Ukrainian wage level.

The proportion of tax payments to the budgets of all levels that can be used to finance social expenditures, including education, health,
culture, social policy, including state aid and compensation to the population at local, regional and state levels, is expertly assessed.

Then, there is estimated the total increase in population income from employment (at projected enterprises, places created by reinvesting workers' earnings, created by increasing budget financing for social workplaces) and social transfers. Expert assessment of the possible reduction in scale and level of poverty.

Tax revenues from the implementation of the investment project.

Their volume is calculated on the basis of the estimated production parameters in accordance with the tax legislation. Tax revenues from the development of production due to the reinvestment of profits are expertly assessed.

Qualitative assessments and, where possible, quantitative indicators are used to determine the effect of providing products (services) produced directly within the project to the public.

Improvement (deterioration) of the environmental situation is evaluated according to the relevant indicators, depending on the type of project.

Improving public health, increasing demographics. In some cases, quantitative estimates can be obtained. For example, the reduction of occupational disease and occupational injuries as a result of improved working conditions is estimated on the basis of similar projects and data on occupational and traumatic injuries in the enterprise in the base period (prior to reconstruction).

Reduction of the population morbidity due to the improvement of the ecological situation (reduction / termination of discharge of polluted wastewater, emissions of pollutants into the atmosphere, utilization of toxic waste, increase of the degree of their purification) is estimated by comparing the data on the morbidity of the population in the given region and on the territory. However, it should be kept in mind that improving health can go with a longer time lag, since the population has been subject to adverse environmental factors for a long period of time (pollution of the territory can persist for a long time even after the cessation of harmful emissions).

Impact on the demographic situation of factors such as raising the standard of living of the population, development of social infrastructure can only be assessed qualitatively.

Increasing the educational and qualification level of the workforce and the population as a whole. Direct effect. It is determined by the number of workplaces created for skilled workers and specialists of
higher and secondary qualification. When it comes to job reconstruction, the number of workplaces that will increase the skills requirements for entry-level workers will be determined.

Indirect effect. The cumulative indirect effect is due to the reinvestment of profits into the development of high-tech industries with high-skilled labor demand; development of in-house training and retraining systems; development of the educational sphere at the expense of additional tax revenues to the budget; increasing the availability of educational services through increasing the standard of living (reducing the need for paid work for non-primary workers in the family and, accordingly, the opportunity to continue education, increasing the availability of paid educational services, the opportunity to go to study in another city).

Reducing social tension in society, ensuring social stability.

Improving the social climate due to factors that increase the quality of life of the population, as well as the possibility of occurrence of foci of social tension is evaluated at a qualitative level.

Stage 4. Comparison of positive and negative effects manifested at macro- and regional levels, conclusion of an integrated assessment of social effect, conclusion about the degree of social efficiency of a regional investment project.

In some cases, direct comparison of homogeneous indicators is possible: creation of new workplaces and reduction of existing ones, reduction of emissions of waste of one type and increase of another, etc.

But it is mostly about heterogeneous characteristics, such as job cuts combined with higher wages in the remaining places. Therefore, it is advisable to present the process of assessing effects in a formalized way:

– each type of effect is evaluated by three criteria: the direction of action (positive – negative), the degree of expressiveness of the effect (weak, moderate, significant) and the extent of population coverage;
– a rating scale is introduced, for example, a weak effect covering a small part of the population is estimated at 1 point, a significant effect covering the majority of the population has 5 points (with a corresponding sign);
– summaries of estimates for different types of effect and an integrated assessment of social effect.

In situations where formalized methods cannot be applied, qualitative evaluations should be used to compare different types of effect.
Stage 5. Comparison of social and economic efficiency of the project, development of measures to neutralize negative social effects.

It should be noted that the social effect achieved in turn increases the economic efficiency of the project. It has a manifestation in the growth of the wages of the population, which leads to an increase in the purchasing power of citizens. This increases the level of production of goods and services, the number of poor people decreases, which leads to a decrease in the state's expenditure on the maintenance of people on lower incomes.

At the macro level, the development of human potential as a result of improving the quality of life of the population is one of the factors for ensuring economic growth and competitiveness of the economy. Increasing the educational level and improving the health of the population allow to meet the needs of the economy in skilled labor force, possessing the knowledge and specialties required in modern conditions, high mobility, ability to adapt quickly to intensive structural, technological, information changes in the economy.\textsuperscript{11}

Forms and instruments of assistance to investors from the state authorities are the state support, financial and organizational preferences, as well as means of reaching the interests of the subjects of investment activity (public, group, private). Public investment entities are investment funds and investment companies. Group investment entities are enterprises and banking institutions engaged in investment activities. Private investment entities are foreign and domestic private investors.

Preferences are given to those investors the projects of which are socially defined. A project is recognized as social, if its implementation will contribute to the effective functioning of the social sectors and achieve social impact.

Public Private Partnership (PPP) mechanism may be used to effectively channel investments into the social development of the state. It is a medium- or long-term institutional and organizational alliance for the implementation of socially significant projects at all levels in a wide range of activities based on the sharing of results and risks between partners.

The signs of public private partnership are urgency, objectivity, self-financing, equality, sharing of responsibilities, risks and

\textsuperscript{11}Volska O.M. (2012). Derwavnogo uprвлnya sostialnim rozvitkom [Public administration of social development]. Donetsk: VIK.
outcomes. Forms of PPP are contractual relations, joint ventures, rent and leasing, concessions, product sharing agreements, etc.

**CONCLUSIONS**

The most effective form of public private partnership aimed at the social sector, which is suitable for institutional investors, is a concession, among the features of which are: durability; finding the object in the property of the grantor at any time of the transaction; competitive procedure for determining a private partner; simultaneous consideration of the interests of the public and private parties of the partnership, as well as direct consumers of services.

The implementation of a public private partnership mechanism through rent and leasing relationships often causes a conflict of interest, since the property may be used by the recipient not for its intended purpose. The rent cannot at the same time take into account the interests of the public and private parties of the partnership, as well as direct consumers of services.

However, in order for the PPP mechanism to function more effectively, it is necessary to supplement the Law of Ukraine “On Public Private Partnership” with a list of tax benefits for social investors.

With sufficient long-term capital, institutional investors are able to diversify their investment in low-risk social assets. At the same time, they receive tax, legal, economic preferences from the state and positive public opinion. Such activities will also help to raise the standard of living of the population, increase human capital and capacity for its reproduction. In turn, the PPP mechanism will make it profitable, capable of generating income for both the private investor and the state. It will help to transform the economic and organizational mechanism of public administration of social modernization and to build the Ukrainian innovative model of social modernization of the state.

**SUMMARY**

The article deals with the theoretical principles of social investing. A theoretical definition of the concepts of «social investment» and «social investing» is provided. The main tasks of social investing and a complex of actions are directed at achievement of social effect from attraction of this kind of investments in the work. Social performance indicators are used to assess the level of impact. There are also types of
social effect: direct and indirect. The second part describes the stages of the process of assessing the social impact of investing. There are five main stages of assessment that will help to attract investment resources to social infrastructure.

REFERENCES:
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