

Application of information technology of value-oriented management of art projects

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Paper received 14.12.19; Accepted for publication 28.12.19.

<https://doi.org/10.31174/SEND-NT2019-215VII26-11>

Abstract. This study contains material on the application of value-oriented project management methodology in artistic activities. The analysis of scientific publications revealed that modern information technologies do not simultaneously take into account the value and risks associated with stakeholders of the art project. The practical implementation of information technology of value-oriented art project management is offered, which allows to maximize value and minimize the negative impact of risks that may arise during the implementation of art projects and have both positive and negative impact on them. It is established that the results of the practical implementation of information technology will give the leader and his team members an effective tool for ensuring the value of each stakeholder of the art project.

Keywords: value-oriented project management, art project, information technology, stakeholders, value, risks.

Introduction. Introduction of project approach in any sphere of human activity gives a new impulse to its development, this also applies to artistic activity. [1]. Implementation of any project has a specific mission and goals of the customer in accordance with his position, which leads to the creation of new value, characterized by uniqueness, distinguishing features and innovations [2].

Review of publications on the topic. In previous studies, the author analyzed the application of the project approach to artistic activity, definitions of the term "art project" are given, its peculiarities and uniqueness are revealed [3]. In addition, art project stakeholders have been identified [4].

The purpose of this study is to conduct practical application of information technology value-oriented art project

management. is to assess the impact of personnel risks and conflicts in scientific projects using cognitive modeling.

Materials and methods. With a view to practical implementation of the author developed models and methods of value-oriented art project management, it is suggested to consider an example of an art project [4, 5]. In the first stage, we will analyze the environment of the art project, including the identification of stakeholders, their values and the risks associated with them.

Identification of stakeholders of an art project is to define and describe stakeholders who have both a positive and a negative impact on the project implementation. [4, 5, 6]. The list of stakeholders of the art project is given in Table 1.

Table 1. Description of art project's stakeholders

№	Stakeholder (role)	Performer	Value factors	Art project's risks
1	2	3	4	5
1	Art project manager	Tenga O.P.	E, S, G	force majeure, human, communication, financial, customer/consumer, valuable
2	Art project team	Artists	E, K, G, Pr	creative, psychological, human, communication, financial, customer/consumer, valuable
3	Initiator, customer, owner, investor	Ministry of Culture of Ukraine	S, Pr	force majeure, communication, financial, customer/consumer, valuable
4	Competitors of the main project stakeholders	Union of Artists of Ukraine	S, Pr	creative, psychological, communication
5	Authorities	Cabinet of Ministers of Ukraine, Verkhovna Rada of Ukraine, local authorities	S, P, Vh	social, force majeure, communication
6	Public groups and organizations, population	Ministry of Information Policy of Ukraine, National Art Museum of Ukraine, population	E, S, P, Vh	social, force majeure, communication
7	Contractors/Suppliers	Enterprises that provide material resources for the implementation of the art project will be determined by the results of procurement procedures	E, S, P, Vh	force majeure, technical/material, communication, financial
8	Consumers of final products	State, art critics, critics, population	E, S, G, P, Vh	psychological, social, human, communication, customer/consumer, valuable

Results and discussion. The second stage is to analyze stakeholders' impact on the project, taking into account their values and risks. To do this, we will rank the stakeholders of the art project by such criteria as: area of authority/responsibility; area of direct influence and area of indi-

rect influence [5, 6]. The results of this ranking will be presented as Fig. 1. In the third stage, we will identify the interests of each stakeholder with their values and risks in relation to the project and its tools to influence the project. The results are presented in the form of Table 2 [4, 6].

The fourth stage is to determine the degree of support and opposition to the stakeholders of the art project, taking into account their values and risks. [4, 6]. To do this, we will conduct a procedure for evaluating two parameters of stakeholder importance (X/Y): the level of sup-

port/opposition by stakeholder of the art project (X) and the level of stakeholder influence on the art project (Y). The results of expert assessment of the levels of support/counteraction and impact will be given in the form of a classic stakeholder map and presented as a fig. 2.

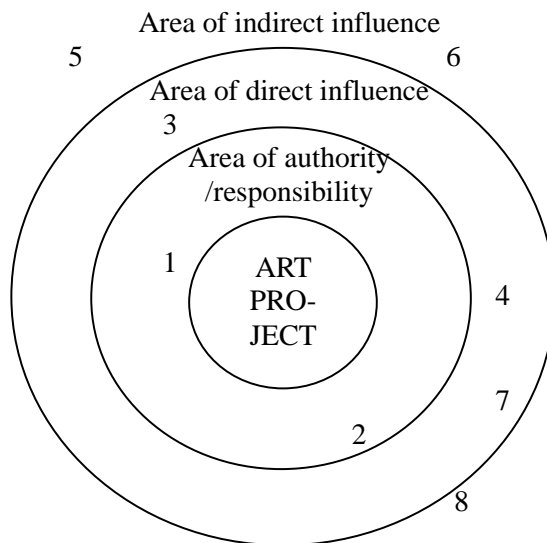


Fig. 1. Areas of stakeholders' influence on the art project

Table 2. Interests of art project's stakeholders

№	Stakeholder (role)	Interests/motives	Impact tools
1	2	3	4
1	Art project manager	Interested in successful and timely implementation of the art project	Ensuring quality and timely execution of the art project
2	Art project team	Interested in successful and timely implementation of the art project	Ensuring quality and timely execution of the art project
3	Initiator, customer, owner, investor	Interested in getting and enjoying an art product	Correct and clear wording of the idea of an art product, requirements for it and setting a task for its creation, timely allocation of funds
4	Competitors of the main project stakeholders	Interested in not receiving an art product	Making a negative impact on the creation of an art product
5	Authorities	Interested in getting an art product and replenishing the budget from its presentation	Creation of appropriate conditions by the State
6	Public groups and organizations, population	Interested in presenting an art product	Timely exhibit of the art product for review
7	Contractors/Suppliers	Interested in supplying goods, works and services and earning a profit	Timely delivery of goods, works and services
8	Consumers of final products	Interested in getting an art product, reviewing it and enjoying it	Timely purchase of tickets for review

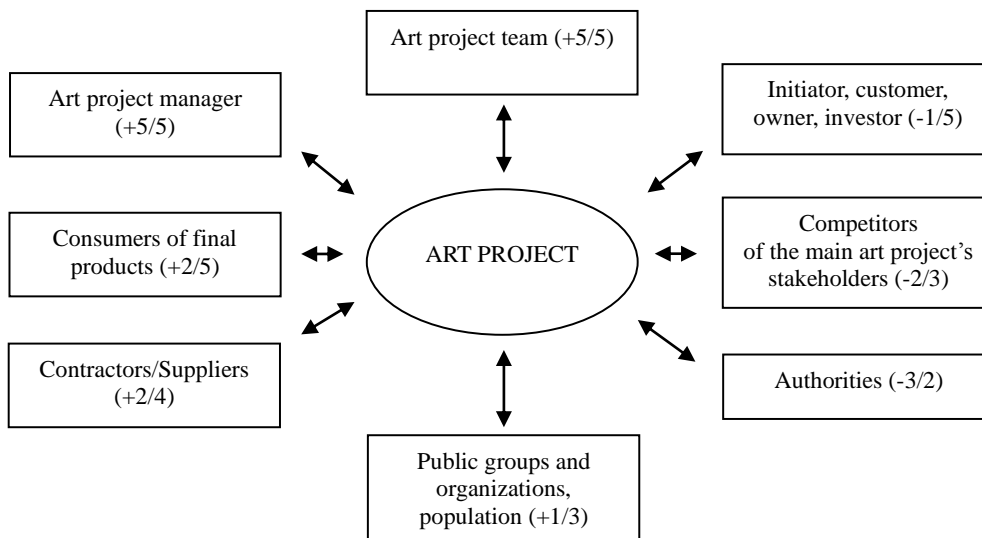


Fig. 2. A stakeholders' map of the art project with support/response and impact assessment

The fifth stage identifies problematic situations in the project implementation process, taking into account stakeholder's values and risks [4, 6]. Results of this stage are given in the form of Table 3.

The sixth stage is psychological analysis of project's stakeholders, taking into account stakeholder's values and risks. At this stage, the project manager and his team need

to have a psychological portrait of each stakeholder individually [7]. First of all, it is necessary to know that among the outward signs psychologically informative include: language; facial expressions, gestures, pose, pantomime, look; appearance; anatomical properties of the physical image.

Table 3. Identification of problematic situations of an art project related to the activity or inaction of stakeholders

No	Stakeholder (role)	Problem situations of an art project
1	2	3
1	Art project manager	Insufficient experience in performing art projects, inability to communicate with other stakeholders, inability to provide a sufficient psychological climate in the team of the art project
2	Art project team	Insufficient stress resistance, lack of communication skills, inability to comply with the requirements of an art product
3	Initiator, customer, owner, investor	Inability to articulate the idea and requirements for an art product, lack of funds
4	Competitors of the main project stakeholders	Lack of interest in the art product, creating obstacles in the process of art project's implementation
5	Authorities	Lack of political will to make necessary decisions regarding the art product, unwillingness to promote the art product's introduction
6	Public groups and organizations, population	Lack of quality content to promote an art project and an art product
7	Contractors/Suppliers	Poor quality, untimely delivery of goods, works, services
8	Consumers of final products	Dissatisfaction with the art product, low demand for the art product

The seventh stage develops stakeholder's engagement strategies, taking into account stakeholder's values and risks.

To ensure the value management of the art project [4, 5], based on the data in Table 1, we will poll each stakeholder on its value in the future art product and present its results in the form of a Table 4.

Table 4 shows how valuable each project stakeholder is in quantitative terms.

The next step is to assess stakeholder's risks, we propose their practical application in terms of risk assessment that may arise from the activity or inaction of stakeholders of the art project. For this purpose, the project manager assesses the likelihood of risks for each stakeholder and their possible impact on the art project, the results of which are presented in Table 5.

Table 4. Values analysis for each stakeholder of art project

Stakeholders	Art Functions							Vi
	E	S	K	G	P	Pr	Vh	
Art project manager	1,4	1,5	2,0	0,6	1,2	0,7	1,2	8,6
Art project team	0,5	3,5	0,9	0,2	1,6	4,8	1,2	12,7
Initiator, customer, owner, investor	5,6	0,2	0,9	4,2	2,5	0,2	1,6	15,2
Competitors of the main project stakeholders	0,1	0,4	3,0	1,5	6,3	4,2	1,2	16,7
Authorities	3,5	6,3	0,6	0,8	1,2	0,1	4,8	17,3
Public groups and organizations, population	6,3	4,8	1,5	2,4	0,2	0,6	3,0	18,8
Contractors/Suppliers	0,8	2,4	6,3	3,5	4,8	1,2	0,2	19,2
Consumers of final products	5,6	5,4	1,2	2,0	0,1	0,4	3,5	18,2

Table 5. Risk analysis of each art project's stakeholder

Stakeholders	Risks										Ri
	Creative	Psychological	Social	Force majeure	Technical/material	Human	Communication	Financial	Customer/Consumer	Valuable	
1	2	3	4	5	6	7	8	9	10	11	12
Art project manager	0,08	0,48	0,20	0,02	0,12	0,35	0,35	0,12	0,06	0,20	1,98
Art project team	0,02	0,42	0,09	0,06	0,04	0,48	0,48	0,20	0,06	0,12	1,97
Initiator, customer, owner, investor	0,02	0,72	0,09	0,02	0,20	0,24	0,30	0,63	0,35	0,63	3,20
Competitors of the main project stakeholders	0,01	0,15	0,30	0,06	0,20	0,08	0,06	0,10	0,03	0,06	1,05
Authorities	0,20	0,30	0,06	0,04	0,02	0,08	0,20	0,28	0,02	0,09	1,29
Public groups and organizations, population	0,06	0,12	0,15	0,03	0,02	0,06	0,06	0,10	0,02	0,08	0,70
Contractors/Suppliers	0,02	0,16	0,63	0,15	0,72	0,30	0,42	0,30	0,30	0,20	3,20
Consumers of final products	0,72	0,56	0,12	0,02	0,02	0,06	0,15	0,02	0,06	0,72	2,45

Table 6. Determination of integrated value index of the i-th stakeholder

Stakeholders	V_i	R_i	VV_i
Art project manager	8,60	1,98	6,62
Art project team	12,70	1,97	10,73
Initiator, customer, owner, investor	15,20	3,20	12,00
Competitors of the main project stakeholders	16,70	1,05	15,65
Authorities	17,30	1,29	16,01
Public groups and organizations, population	18,80	0,70	18,10
Contractors/Suppliers	19,20	3,20	16,00
Consumers of final products	18,20	2,45	15,75

Table 5 shows what risks each stakeholder of an art project has in quantitative terms. Thus, assessing the risks associated with the activity or inactivity of an art project stakeholder gives information to the project manager not only about the risks that the project management requires, but also the consequences of their impact, which should be considered when developing comprehensive risk management measures for an art project.

The information technology of value-oriented art project

management is to calculate an integrated value indicator of the i-th stakeholder (VV_i), which is based on the value and risk calculations of each stakeholder. According to the data obtained in Tables 4 and 5, it is possible to calculate an integrated value index of each stakeholder of an art project, the results of which are presented in the form of Table 6.

Table 6 shows that all stakeholders of the art project, except the art project manager and his team, have a high level of integrated value, that is $VV_i > 12$, and, therefore, do not require additional measures to develop strategies to increase this level. Art project manager and his team received an average level of the Integrated Value Index, that is $6 < VV_i < 12$, therefore, strategies need to be developed to increase this level. In this case, strategies for increasing the level of the integrated value indicator include: financial incentives, organization of advanced training in psychology, business communication skills, cultural and aesthetic development.

Conclusions. From the above it is clear that information technology of value-oriented art project management provides an effective program product for quality and timely planning of the art project, as well as providing control and monitoring of its implementation.

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