

TERMS AND CONDITIONS

of the call for proposals for the implementation of research and developments of the National Research Foundation of Ukraine

«Infrastructures for Advanced Research»

I. GENERAL INFORMATION ON THE CALL

1.1. Name of the Call — «Infrastructures for Advanced Research».

1.2. The purpose of the Call: is to select projects for grant support for fundamental and applied research to ensure the development of the national research area and its integration into the global research area, development of research infrastructure as a set of means, resources and related services used by the research community to conduct research at the highest level, in particular for the creation of new and support of existing research divisions, their network structures, centers of collective use, archives and/or libraries of research information, etc. which as a result of the implementation of such projects can achieve the possibility of stable funding attraction on terms that will allow them to organize independent work on research at the level of the best global standards.

The competitive selection is carried out in accordance with the Procedure for competitive selection and financing by the National Research Foundation of Ukraine of projects, approved by the Decree of the Cabinet of Ministers of Ukraine № 1170 on December 27, 2019 (as amended by the Decree of the Cabinet of Ministers of Ukraine dated July 4, 2023 No. 742) .

The projects to be financed based on the results of this call shall be carried out by the most active, promising and productive researchers who have:

- (1) significant experience in fundamental and applied research in various fields of science;
- (2) opportunity and motivation to work according to the best global standards, as well as to create and develop leading teams of researchers.

The expertise of the authors of the project must be unquestionable regarding the prospects of obtaining advanced research results that will be highly appreciated by the global community. Such teams should become sprouts of the new research infrastructure of Ukraine and ensure its further development by their own example.

The National Research Foundation of Ukraine expects an even representation of winning projects in various thematic areas.

The call is also aimed at achieving the following unique tasks:

- (1) creation, functioning and ensuring the development of infrastructure centers for solving multidisciplinary research problems;

- (2) involvement of commercial structures for the introduction of high technology products;
- (3) ensuring the avoidance of research fragmentation and double use of funds;
- (4) unification of complementary expertise;
- (5) preparation of the material base of leading teams of Ukrainian researchers, as well as raising their research rating to the highest global standards for their further participation in the most prestigious European and global calls for research proposals;
- (6) preparation of the material base of leading teams of Ukrainian researchers, as well as increasing their research and administrative competence with the aim of creating key state laboratories in the future;
- (7) consolidation of research communities around advanced teams.

1.3. Thematic areas of the Call. The topics of the projects must correspond to at least one of the priority areas of research and technology development (in accordance with Article 3 of the Law of Ukraine ‘On Priority Areas of Science and Technology Development’). The application for receiving grant support (hereinafter – the Application) submitted to the Call must correspond to one of the thematic areas listed below:

1. Basic research in the field of natural sciences and mathematics.
2. Basic research in the field of life sciences.
3. Applied research aimed at creating technologies (including IT) and products based on the latest achievements of basic research.
4. Basic socio-humanitarian research on the most urgent issues of our time.
5. Multidisciplinary research.

The projects submitted under items 1, 2 and 4, must have a clear plan for attracting further financing of the activities of the research teams from national and foreign funds after the completion of the projects.

The projects submitted under item 3 must have a clear commercial perspective with profit which will ensure further activity of the research teams after the completion of the projects or the prospect of attracting investments in their activities, which will also allow their further functioning.

The projects submitted under item 5 must meet at least one of the requirements specified in the two previous items.

Projects may also aim to prepare the material base and increase the research level of leading research teams with the aim of further creating key state laboratories on their basis. In this case, the authors should substantiate the realism of such plans, as well as predict the risks of the lack of adequate budget funding for such laboratories and ways to mitigate the risks.

Applications must necessarily include extensive measures to consolidate the research community around the advanced team. In particular, a necessary condition is the development of clear rules that will ensure the access of researchers from other organizations to work on the purchased equipment. Projects may also provide for the organization of trainings, seminars, and other scientific meetings, which will significantly increase the level of Ukrainian researchers working in the respective field of research.

Projects whose content constitutes a state secret (in accordance with the Law of Ukraine ‘On State Secrets’) which is to be clearly confirmed in the text of the consent of the head of the institution (organization) on behalf of which the Application is submitted, for the implementation of the project, are not accepted for consideration at the Call.

Intellectual property rights created in the course of research at the expense of the grant support of the National Research Fund of Ukraine (hereinafter – the NRFU or the Foundation) belong to the grantee and/or project implementers, except for the cases provided for in the second part of Article 11 of the Law of Ukraine ‘On State Regulation of Activities in the Field of Technology Transfer’.

1.4. The duration of the implementation of the projects to be selected based on the results of the Call:

Implementation of projects is expected in 2024-2026 and will consist of two (in 2024-2025) or three (2024-2026) intermediate stages of project implementation.

Types of projects by duration of implementation:

1) projects with a duration of implementation (financing) in 2024-2025 are planned for two intermediate stages (provided there are appropriate budget allocations):

- the first stage of implementation (financing) of the project (approximately August-December 2024, 4.5 months);

- the second (final) stage of project implementation (financing) (approximately March-December 2025, 9 months);

2) projects with a duration of implementation (financing) in 2024-2026 are planned for three intermediate stages (provided there are appropriate budget allocations):

- the first stage of implementation (financing) of the project (approximately August-December 2024, 4.5 months);

- the second stage of implementation (financing) of the project (approximately March-December 2025, 9 months);

- the third (final) stage of project implementation (financing) (approximately March-December 2026, 9 months).

The end of each intermediate stage is correlated with the end of the respective financial year.

The project implementation is planned to start in August 2024; implementation of projects in 2025-2026 will be implemented taking into account and in accordance with budget allocations in the respective year.

Planning of the duration of the intermediate stages of project implementation should be carried out taking into account the specified deadlines for processing the reporting documentation provided by the grantee to confirm the completion of the first and second stages of project implementation and the third (final) stage of project implementation (14 calendar days from the date of completion of the respective intermediate stage of project implementation). The duration of the intermediate stages of project implementation planned in the Application may be adjusted at the time of concluding the Grant Agreement (hereinafter referred to as the Agreement) taking into account and in accordance with the budget allocations in the respective year.

II. FINANCING OF PROJECTS

2.1. The total amount of funding for projects in 2024, in accordance with budget allocations, taking into account the risk of possible redistribution of funds and threats related to the effect of martial law on the territory of Ukraine, amounts to UAH 50 million.

The planned maximum amount of funding for the call is up to UAH 300 mln (depends on the amount of budgetary allocations provided for in the state budget for the respective year to finance the activities of the NRFU).

The maximum amount of funding for one project with a project implementation period of:

- two stages of project implementation (in 2024-2025) is UAH 15 million, including UAH 5 and 10 million in the first and second years respectively;
- three stages of project implementation (in 2024-2026) is UAH 30 million, including UAH 5, 15, and 10 million in the first, second, and third years respectively.

2.2. By submitting an Application for the Call participants confirm that they have fulfilled the condition that the submitted project cannot be simultaneously submitted for participation in another Call in order to receive funding from the state budget, as well as when such a project is or has been funded at the expense of state budgetary funds based on the results of another call, including those conducted by the Ministry of Education and Science of Ukraine or other entities. Discovery of such a fact of violation at any stage of the Call is grounds for withdrawing the Application from consideration, and at the stage of project implementation is sufficient grounds for termination of the Agreement and refund.

2.3. The grant is awarded to the winner of the call (grantee) in the amount of the full or partial cost of the work necessary for the implementation of the project. Financing in full is carried out in case

of implementation of a project that is not financed from other sources. Partial financing is provided under the condition of the implementation of the project which is simultaneously financed from several sources. In this case, the NRFU determines the specific volume of part of the work and the amount of financial support that will be provided by the NRFU for the implementation of such a project, taking into account the total estimated cost of project implementation and the amount of funding from other sources.

2.4. To finance a project, the NRFU transfers funds from its registration account to the accounts of the grantee in accordance with the concluded agreements and the schedule of financing the project for the implementation of research and development, within the limits of the funding actually received by the NRFU.

Unused amounts of funds during the respective stage of project implementation shall be returned to the NRFU registration account within five working days after completion of the intermediate stage of project implementation.

2.5. Funding is allocated to the following cost items:

1) Direct costs:

- labor remuneration;
- payroll accruals;

Note: the maximum amount of labor remuneration together with the payroll accruals cannot exceed 30% of the maximum amount of project financing per stage (in accordance with the Terms and Conditions of this Call).

- materials required for the performance of work, except equipment and facilities;
- equipment and facilities;

Note: Call participants are to schedule the purchase of equipment during the entire project implementation period, justify the need for its purchase, and provide links that will allow estimation of the market prices of the equipment, as well as confirm that the Call participant does not avail of such equipment/facilities.

- Business trip expenses.

2) Indirect costs

The total volume of indirect costs (costs that are not directly related to research and development (hereinafter referred to as R&D) implementation, but are necessary to ensure the full implementation of R&D) cannot exceed 10% of Direct costs within each stage of the project implementation. Such costs may include:

- payment for utility costs related to the implementation of the R&D;

- payment for the rental of premises, in accordance with the procedure established by the Methodology for calculating the communal property rent rate, approved by the resolution of the Cabinet of Ministers of Ukraine ‘Some issues of calculating the communal property rent rate’ No. 630 as of 04.28.2021 (in case the participant is a subject of the public sector of the economy) or if the participant is a legal entity of non-state ownership at a price that does not exceed the average level of the rental price at the time of submission of the Application (in this case, the utility costs in the rented premises are not planned);
- remuneration and accruals for the remuneration of administrative personnel, in particular, employees of financial services, legal services, etc. who will be involved in servicing the Grant Agreement. Such costs cannot exceed 5% of Direct costs within each stage of the project implementation.

3) Other expenses (if necessary) – costs that are not reflected in the above-mentioned cost items, but are necessary for R&D implementation, in particular, costs of services. This cost item may include costs for: organization and conduct of research dissemination events, publications in scientific journals (including high-rated and Open Access), publication (editions) of research monographs, obtaining patents, translation, rental of research equipment, access to databases, libraries, software, etc.

Note: see ‘Methodical recommendations for estimated cost planning for the project implementation of research (developments) through grant support of the National Research Foundation of Ukraine (to the Terms and Conditions of the call ‘Infrastructures for Advanced Research’).

Costs for all items must be justified.

If the project involves the purchase of equipment and facilities through grant support from the Foundation, a document containing a detailed technical and economic justification of the need for its (their) purchase for the project implementation is attached to the Application, namely (requirements to the feasibility study (FS)):

- 1) confirmation that the Call participant does not have the equipment and facilities planned for purchase;
- 2) detailed justification of the necessity, suitability and effectiveness of the use of such equipment and facilities for the planned research (development), taking into account its impact on the research capacity of the Call participant;
- 3) a description of the main characteristics of the equipment and the facilities necessary for research (development);
- 4) detailed confirmation that the participant has the necessary conditions for installation, operation and maintenance of such equipment and facilities (premises, maintenance of the

necessary temperature mode/lighting/humidity/other conditions in it, respective qualified technical personnel, etc.). If the equipment and facilities require specially prepared premises/conditions – a description of the funds for which these works will be performed is to be included as well);

5) if the applicant plans the purchase of equipment and facilities outside of Ukraine, it is necessary to provide justification for the impossibility of purchasing such equipment on the territory of Ukraine and the possibility of its delivery from abroad in the appropriate period;

6) a description of the prospects for the use of the equipment and the facilities that is planned to be purchased, after the completion of the project;

7) commercial proposals (from at least 2 different suppliers)* detailing the cost, terms and conditions of the equipment delivery with a link to the suppliers' websites are to be attached to the FS. In case the equipment is unique (has no analogues on the market) and if it is impossible to provide two commercial offers, an appropriate justification must be provided (documentary confirmation of the competition for such equipment on the market);

8) if the applicant plans to purchase equipment and facilities with a total cost of more than UAH 600,000 through the Foundation's grant and which can potentially be used collectively, the FS must contain information on specific measures to ensure the collective use of this equipment after the completion of the project.

If the applicant plans to purchase of equipment and facilities at the expense of the Foundation's grant, the preparation of the technical and economic feasibility study should involve employees of financial services, structural divisions responsible for procurement (tenders) and other interested divisions of the institution participating in the Call.

The grantee, regardless of the form of ownership, purchases equipment/facilities taking into account the requirements of the Law of Ukraine 'On Public Procurement'.

Note 1: the FS of the need to purchase equipment and facilities for the implementation of the project is to be signed by the head of the institution (organization) on behalf of which the Application is submitted, the head of the financial division of the institution (organization) on behalf of which the Application is submitted, and the PI.

Note 2: Items 1-7 are mandatory for all applications that involve the purchase of equipment and facilities, item 8 is completed if necessary.

** The PI should inform the equipment supplier about the submission of a commercial offer to the Foundation as part of the Application. The supplier's refusal to confirm the offer is grounds for rejection of the Application on formal grounds (due to non-compliance with the terms and conditions of the Call).*

After the announcement of the results of the Call, the winning institution submits Declaration (if the project involves the purchase of equipment and facilities at the expense of the grant from the Foundation), in which the head of the call-winning institution and the PI confirm that the project will be implemented in full exclusively in the institution that was awarded the grant, in accordance with the submitted Application, and the institution has a material and technical base, organizational resources and a team of implementers which allows to ensure the full implementation of the project; the equipment to be purchased at the expense of the grant will be used for its intended purpose (for the purpose of completing project tasks and implementing the project in full).

The PI and project implementers may be involved in the implementation (receive funding) of a maximum of one other project financed by the Foundation in the respective year (according to the results of another NRFU call). At the same time, one individual can be a PI exclusively for one of the two projects. Within the framework of all (two) projects of the Foundation in which the PI and any implementer participate in the respective year, the maximum amount of the monthly wages of the PI and each implementer cannot exceed 10 minimum wages in Ukraine, established at the beginning of the year, in which the respective payment is made.

The project estimate should indicate the employment (by months) of the PI and each project implementer.

2.6. The following cannot be financed at the expense of grant funds: costs not directly related to the implementation of the project (in particular, payment of intermediary services, preparation of the project Application for receiving grant support; purchase of goods, performance of activities, provision of services not related to the project implementation; payment of goods, activities and services which were or will be financed from other sources before or after the signing of the Agreement). Maintenance of institutions (organizations), including those that are participants in the Call, cannot be financed from grant funds either.

III. REQUIREMENTS FOR PARTICIPANTS, PI AND PROJECT IMPLEMENTERS*

***Requirements formulated in accordance to the Agreements on Reforming Research Assessment**

3.1. General requirements

Applications can be submitted by legal entities of any form of ownership, carrying out scientific and technical activities and which are registered and operate in accordance with the legislation of Ukraine.

The project is implemented by implementers who are the authors of the project (the PI and 1-3 implementers) and other implementers. The replacement of the PI and the implementers who are the authors of the project at the time of concluding the Agreement and during the project

implementation is possible only in the event of exceptional circumstances and is carried out on approval by the Scientific Council of the Foundation.

The Application may also provide for the involvement of other implementers (who are not the authors of the project) with an indication of their positions and planned functions, while in the Application the data about such implementers may not be personalized (without specifying the full name). The application may also provide support for students of institutions of higher education and graduate students. Involvement of implementers who are not the authors of the project on a paid basis to perform research under the Agreement is carried out by the grantee in accordance with the procedure established by law and requires prior approval from the Foundation.

Researchers and other implementers (if involved) who represent one or more institutions (organizations) may be involved in the project implementation.

The PI must be a researcher who works **at the main place of work** in the institution (organization) that submits the Application for participation in the Call.

Employees of the Foundation's directorate, members of the Foundation's Scientific Council, the Scientific Committee of the National Council of Ukraine on Science and Technology Development, members of the Call Commission and reviewers involved in the scientific and technical review of projects under this Call cannot be a PI or project implementer.

One natural person cannot be represented in more than one Application submitted for this Call.

One individual can be involved in the implementation of a maximum of two projects financed by the Foundation in the respective year, while one individual can be involved in the implementation of only one project as its PI.

Persons who were the authors of projects whose grant support was terminated by the decision of the Scientific Council of the Foundation due to improper implementation of the terms and conditions of the Agreement on the implementation of the research and development at the expense of grant support, and to whom Clause 2 of the Restrictive Measures was applied are not eligible to participate in the Call, and based on the results of the quality assessment of project implementation and the publication/disclosure of the results (in the event that the respective limitation period has not expired).

Persons who were the authors and signed the final report on the implementation of projects to which Clause 1 of the Restrictive Measures Applied to the Authors of Projects whose grant support was terminated by the decision of the Scientific Council of the Foundation due to improper implementation of the research and development and based on the results of the assessment of the quality of project implementation and publication/disclosure of results are not eligible to participate in the Call until the Scientific Council of the Foundation makes the appropriate decision regarding the information and respective documents provided by such persons.

The PI is responsible for the reliability of the information contained in the application and the documents attached to it. The consequence of providing inaccurate information is withdrawal of the Application from consideration.

Violation of these requirements is grounds for rejection of all applications in which the person who has violated the above requirements is involved.

Involvement of a partner/partners in the formation of the Application (implementation of the project) is not foreseen by the terms and conditions of the Call.

3.2. The PI of the project which belongs to thematic areas 1 and 2 of clause 1.3 of these Terms and Conditions can only be a researcher who has a research degree obtained or recognized in Ukraine, works at the main place of work in the institution (organization), which submits an Application for participation in the Call, and meets the following criteria:

- 1) is the author of at least ten scientific publications over the past five years in highly rated international multidisciplinary or specialized periodicals belonging to the first and second quartiles of the Scimago search system and in which mandatory peer review is provided. In these publications, the applicant must be the PI of the respective research which is reflected either in the order of the authors of the publication or in the clearly indicated contribution. If 8 years or less have passed since the date of the PI's obtaining the research degree of Candidate of Sciences or Doctor of Philosophy, then this list may include publications in which the contribution of the applicant is decisive, which is reflected either in the order of the authors of the respective publication or in a clearly indicated contribution. At the same time, at least five such publications should be without co-authorship of the applicant's scientific supervisor or dissertation consultant for the research degree of Candidate of Sciences (Doctor of Philosophy);
- 2) has experience of two years (in total) of work or internship as a postdoc, researcher or teacher in foreign research institutions or institutions of higher education (with the exception of the aggressor country (further on in the entire text of these Terms and Conditions within the scope of the understanding of cooperation and the specified dates established by the paragraph of the Paragraph 2 of Clause 14 of the Regulations on compliance with the principles of research ethics and conflict of interests prevention during competitive selections, scientific and scientific-technical reviewing of projects and consideration of applications for grant support submitted to the National Research Foundation of Ukraine) and/or another foreign state against which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine);
- 3) has experience in managing research projects in Ukraine or abroad (with the exception of an aggressor country and/or another foreign state against which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine);
- 4) has experience in successfully managing post-graduate and/or master's students;
- 5) has high scientometric indicators for publications issued during the last 15 years (dynamics of scientometric indicators, if 8 years or less have passed since the date of the PI's obtaining the research degree of Candidate of Sciences or Doctor of Philosophy). The relevant justification is

an integral part of the PI's questionnaire which is submitted together with the Application. Scientometric indicators for articles within the framework of research that was performed as part of large research collaborations, or publications in which the number of authors exceeds 10, are not taken into account. Exceptions are cases when the applicant is the PI of the respective research or his/her contribution to it is decisive.

The implementer (author) of the project which belongs to thematic areas 1 and 2 of clause 1.3 of these Terms and Conditions can only be a researcher who has a research degree obtained or recognized in Ukraine and meets the following criteria:

- 1) is the author of at least seven research publications over the past five years in periodicals belonging to the first and second quartiles of the Scimago search system and in which mandatory peer review is provided;
- 2) has experience of research or teaching in foreign research institutions or institutions of higher education (with the exception of research institutions, institutions of higher education of the aggressor country and/or another foreign state against which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine).

3.3. The PI of the project which belongs to thematic area 3 of clause 1.3 of these Terms and Conditions can only be a researcher who has a research degree obtained or recognized in Ukraine, works at the main place of work in the institution (organization) which submits an Application for participation in the Call and meets the following criteria:

- 1) is the author of at least four research publications during the last five years in highly rated international multidisciplinary or specialized periodicals belonging to the first and second quartiles of the Scimago search system, and in which mandatory peer review is provided, and/or patents in the USPTO or EPO databases. In the publications, the applicant must be the PI of the respective research which is reflected either in the order of authors of the respective publication or in an explicitly stated contribution. If 8 years or less have passed since the date of the PI's obtaining the research degree of Candidate of Sciences or Doctor of Philosophy, then this list may include publications in which the contribution of the applicant is decisive, which is reflected either in the order of the authors of the responding publication or in a clearly indicated contribution. At the same time, at least two such publications must be without the co-authorship of the applicant's scientific supervisor or dissertation consultant of the candidate for the research degree of Candidate of Sciences (Doctor of Philosophy);
- 2) has proven experience in the commercialization of scientific research: a leading role in the creation and introduction to the market of commercial high-tech products or services; experience in creating a startup, building value propositions and validating technological solutions on the market; successful experience of attracting investments in high-tech projects or implementing high-tech solutions in corporations. If 8 years or less have passed since the date of the PI's obtaining the research degree of Candidate of Sciences or Doctor of Philosophy, then it is possible to have documented experience of active participation in such projects at the stage of their creation;
- 3) has the experience of one year (in total) of work or internship as a postdoc, researcher or teacher in foreign research institutions or institutions of higher education or the same experience

of work as an engineer, researcher or manager in the research field in a foreign high-tech company (with the exception of the aggressor country and/or another foreign state against which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine);

4) has high scientometric indicators for publications issued during the last 15 years (dynamics of scientometric indicators, if 8 years or less have passed since the date of the PI's obtaining the research degree of Candidate of Sciences or Doctor of Philosophy). The appropriate justification is an integral part of the PI's questionnaire, which is submitted together with the Application. Scientometric indicators for articles within the framework of research that was performed as part of large research collaborations, or publications in which the number of authors exceeds 10, are not taken into account. Exceptions are cases when the applicant is the PI of the respective research or his/her contribution to it is decisive.

The implementer (author) of the project which belongs to thematic area 3 of clause 1.3 of these Terms and Conditions can only be a researcher who has a research degree obtained or recognized in Ukraine and meets the following criteria:

1) is the author of at least two publications during the last five years in periodicals belonging to the first and second quartiles of the Scimago search system and in which mandatory peer review is provided, and/or patents in USPTO or EPO databases;

2) has experience of research or teaching in foreign research institutions or institutions of higher education or experience in the position of an engineer, researcher or manager in the research field (with the exception of the aggressor country and/or another foreign state in respect of which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine) or in a Ukrainian high-tech company.

3.4. The PI of the project which belongs to thematic area 4 of clause 1.3 of these Terms and Conditions can only be a researcher who has a research degree obtained or recognized in Ukraine, works at the main place of work in the institution (organization) which submits an Application for participation in the Call and meets the following criteria:

1) satisfies one of the conditions:

- is the author of at least seven publications during the last five years in multidisciplinary or specialized periodicals, in which mandatory peer review is provided. In these publications, the applicant must be the head of the respective research, which is reflected either in the order of authors of the respective publication or in an explicitly stated contribution. If 8 years or less have passed since the date of the PI's obtaining the research degree of Candidate of Sciences or Doctor of Philosophy, then this list may include publications in which the contribution of the applicant is decisive, which is reflected either in the order of the authors of the respective publication or in a clearly indicated contribution. At the same time, at least five such publications must be without co-authorship of the PI or dissertation consultant of the applicant for the research degree of Candidate of Sciences (Doctor of Philosophy);

- is the author or one of at most three co-authors of a monograph published within the last five years (or prepared for publication and announced by the publishing house) in a foreign language outside of Ukraine (except in the aggressor country and/or another foreign state in respect of which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine) including translations;
 - is the author or one of at most three co-authors of a monograph published within the last five years (or prepared for publication and announced by the publishing house) in Ukraine, which won an award (prize, distinction) of national or international calls/competitions, or received at least three positive reviews published in specialized research periodicals;
- 2) has experience of six months (in total) of work or internship as a postdoc, researcher or teacher in foreign countries (with the exception of the aggressor country and/or another foreign state in respect of which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine) to research institutions or institutions of higher education or work abroad in research positions in the projects of international organizations;
 - 3) has experience in managing research projects in Ukraine or abroad (with the exception of the aggressor country and/or another foreign state in respect of which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine);
 - 4) has experience in successfully managing graduate students who have defended their dissertations;
 - 5) has high scientometric indicators for publications in the last 15 years (dynamics of scientometric indicators, if 8 years or less have passed since the date of the PI's obtaining the research degree of Candidate of Sciences or Doctor of Philosophy). The appropriate justification is an integral part of the PI's questionnaire which is submitted together with the Application. Scientometric indicators for articles within the framework of research as part of large scientific collaborations, or those in which the number of authors exceeds ten are not taken into account. Exceptions are cases when the applicant is the PI of the respective research or his/her contribution to it is decisive.

The implementer (author) of the project which belongs to thematic area 4 of clause 1.3 of these Terms and Conditions can only be a researcher who has a research degree obtained or recognized in Ukraine and meets the following criteria:

1) satisfies one of the conditions:

- is the author of at least five publications during the last five years in multidisciplinary or specialized periodicals in which mandatory peer review is provided;
- is the author or one of at most three co-authors of a monograph published in the last five years (or prepared for publication and announced by the publishing house) in a foreign language outside of Ukraine, except for the aggressor country and/or another foreign state in respect of which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine), including translations;
- is the author or one of at most three co-authors of a monograph published in the last five years (or prepared for publication and announced by the publishing house) in Ukraine

which won an award (prize, distinction) of national or international calls/competitions, or received at least three positive reviews published in professional scientific periodicals;

2) has work experience or internship as a postdoc, researcher or teacher in foreign countries (with the exception of the aggressor country and/or another foreign state in respect of which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine) research institutions or in institutions of higher education or work abroad in research positions in projects of international organizations.

3.5. The PI of the project which belongs to thematic area 5 of clause 1.3 of these Terms and Conditions can only be a researcher who has a research degree obtained or recognized in Ukraine, works at the main place of work in the institution (organization) which submits an Application for participation in the Call and meets the criteria for the PI of the project listed in one of paragraphs 3.2 - 3.4 of these Terms and Conditions.

The implementer (author) of the project which belongs to thematic area 5 of clause 1.3 of these Terms and Conditions can only be a researcher who has a research degree obtained or recognized in Ukraine and meets the criteria for compliance of the implementer (author) of the project, listed in one of paragraphs 3.2 - 3.4 of these Terms and Conditions.

3.6. A break in a scientific career related to service in the Armed Forces of Ukraine or in other security and law-enforcement agencies, treatment, pregnancy, maternity leave or care for a sick relative is not included in the period of 8 years from the defense of a dissertation for obtaining the academic degree of Candidate of Sciences or Doctor of Philosophy in the context of paragraphs 3.2 - 3.5 of these Terms and Conditions (automatically added to the specified term).

3.7. Specific aspects of project implementation

During the implementation of the project, the PI or project implementers may work in foreign institutions with monetary remuneration for no more than three months in total per year and during this time cannot receive remuneration or other payments from the Foundation's grant funds. In the event of such circumstances, the PI must inform the Foundation of the terms and conditions of such work.

A project submitted for participation in the Call may not be simultaneously submitted for participation in another Call in order to receive funding from the state budget, as well as in case when such a project is or has been funded from the budget as a result of another Call.

The fact that the project is funded from the state budget by the NRFU, the project number and title must be indicated in all publications, official communications, media information, social media, other open sources, and during speeches at scientific events to present research results.

Grantees are responsible in accordance with the legislation of Ukraine for allowing the simultaneous financing of the work done to implement the project from different sources of funds from the state budget of Ukraine (for example, within the framework of projects financed by the Foundation and the Ministry of Education and Science of Ukraine, Ministry of Health of Ukraine, etc.).

Grantees must take all available measures to promote the project to the general public and the results obtained during its implementation.

3.8. Projects the authors of which have been involved in confirmed cases of cooperation with representatives of the aggressor country and/or another foreign state in respect of which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine or with representatives working on temporarily occupied territories, as specified in paragraph 14 of the Regulations on compliance with the principles of research ethics and conflict of interests prevention during competitive selections, scientific and scientific-technical reviewing of projects and consideration of applications for grant support submitted to the National Research Foundation of Ukraine, approved by the decision of the Scientific Council of the Foundation (minutes of the meeting No. 21 of 08/25/2023), are not allowed to participate in the Call.

If the fact of such cooperation is discovered at any stage of the Call, this is grounds for withdrawing the Application from further consideration.

If the fact of such cooperation is discovered during the implementation of the project, the Scientific Council of the Foundation can make a decision to stop providing grant support and return funds to the grantor.

IV. PROJECT ADVISORY BOARD

4.1. Purpose and principles of activity of the Advisory Board

The project Advisory Board is a collective body consisting of leading Ukrainian and foreign researchers who work in the relevant field of knowledge and whose contribution to world research is decisive and universally recognized at the world level, and/or leading Ukrainian and foreign specialists (for projects in thematic area 3) who have made a generally recognized contribution to the development of the respective sector of the high-tech industry.

The Advisory Board performs the following functions:

- helps the PI and the implementers who are the authors of the project to organize the work of the research team in accordance with the best international practices;
- conducts an analysis of the research activity of the project team and annually informs the Foundation about the compliance of the obtained research results with the best international standards;

- provides an opinion on the replacement of the PI and can provide an opinion on the replacement of the implementers who are the authors of the project (in case of exceptional circumstances);
- other advisory functions found by the authors of the project necessary.

The Advisory Board consists of at least four researchers/specialists at least three quarters of which must be foreign researchers/specialists*. Researchers/specialists who are officially connected to legal entities of the aggressor country and/or other foreign state against which sanctions have been applied in accordance with the procedure established by the legislation of Ukraine, or created by the occupying power in the temporarily occupied territory of Ukraine cannot be members of the Advisory Board.

**A foreign researcher/specialist is a researcher/specialist who has been working outside of Ukraine at least for the last 15 years. The confirmation of the researcher's work outside of Ukraine is that all his/her research publications for the last 15 years mention his/her affiliation exclusively with institutions outside of Ukraine. Confirmation of the specialist's work outside Ukraine is that he/she has worked exclusively in enterprises/organizations/institutions outside Ukraine for the last 15 years. A member of the Advisory Board of the project submitted for participation in this Call cannot be a member of the Call Commission or a reviewer who reviews projects for this Call.*

The Advisory Board has a management structure and principles of activity according to the rules defined by the authors of the project in the Application. The authors of the project independently decide on and describe in the Application the degree of involvement of the Advisory Board in the formation of the team of implementers who are not the authors of the project.

If unforeseen circumstances arise in the course of project implementation, which do not allow the further performance of duties by a member of the Advisory Board, he/she may be replaced by the decision of the project authors and with the consent of the Scientific Council of the Foundation.

If the project provides for attraction of further funding from foreign funds in cooperation with foreign researchers/specialists, they may be involved in the project as members of the Advisory Board.

4.2. Application for participation in the Advisory Board

An integral part of the Application is the written consent of potential members of the Advisory Board to participate in it which are submitted together with the Application in Ukrainian or English. In the consent letter, the researcher/specialist must also indicate the name of the project, the names of the PI and other authors of the project, the full name of the organization participating in the Call, provide a description of the competence and research output of the PI, as well as express his/her own opinion about the research perspective of the planned research. If a potential member of the Advisory Board plans further cooperation with the project team within the framework of

funding received from foreign funds, then the respective intention must be clearly indicated in the written consent of researchers/specialists to participate in the Advisory Board of the project.

V. DOCUMENTS TO BE SUBMITTED FOR PARTICIPATION IN THE CALL

5.1. Documents to be submitted by the participant of the Call together with the Application (in the electronic system of the Foundation):

1. Consent of the authors of the project to its implementation (marked in the electronic system of the Foundation using a qualified electronic signature in the personal account of the implementer).
2. Consent of the head of the institution (organization) on behalf of which the Application is submitted for the implementation of the project (in Ukrainian) signed by the head of the institution (organization) (a scanned copy) with mandatory confirmation of the fact that the project does not contain data that constitute a state secret and the PI of the project has experience in the management of research projects that were financed including at the expense of budget funds ([sample](#)).
3. Certificate (in Ukrainian) from the place of work of the PI of the project with the mandatory indication that the PI of the project works at the main place of work in the institution (organization) on behalf of which the Application is submitted (a scanned copy).
4. Statement signed by the head of the institution (organization), on behalf of which the Application is submitted regarding the compliance of the participant of the call with paragraph 5 of the criteria for assessing the admissibility of state support to economic entities for conducting research, technical development and innovative activities, approved by the Decree of the Cabinet of Ministers of Ukraine No. 118 of February 7, 2018 ([Ukrainian language](#)) (a scanned copy).
5. CV of the project authors (scanned copies, in Ukrainian ([sample](#)) and in English ([sample](#))).
6. Questionnaires of the authors of the project (scanned copies, in Ukrainian and English (samples of the PI's questionnaire in [Ukrainian](#) and [in English](#) and sample questionnaires of the implementer (author) of the project in [Ukrainian](#) and [in English](#))).
7. Written consent of researchers to participate in the Advisory Board of the project in accordance with Clause 4.2 of these Terms and Conditions. Submitted in Ukrainian or English (any form).
8. Technical and economic justification of the need to purchase equipment (in Ukrainian) signed by the head of the institution (organization) on behalf of which the Application is submitted, the head of the financial division of the institution (organization) on behalf of which the Application is submitted and the PI of the project (if the project involves the purchase of equipment) (a scanned copy) ([sample](#)).

5.2. Documents to be submitted by a winner of the Call in paper form (originals certified by signatures and seals):

1. The Agreement signed by the authorized person.

2. Consent of the head of the institution (organization) to the implementation of the project (in Ukrainian) signed by the head of the institution (organization) with mandatory confirmation of the fact that the project does not contain data that constitute a state secret, as well as with mandatory confirmation of the experience of the PI from the management of research projects which were financed including at the expense of budget funds.
3. Certificate (in Ukrainian) from the place of work of the PI with a mandatory indication that the PI works at the main place of work in the institution (organization) on behalf of which the Application is submitted.
4. Statement signed by the head of the institution (organization) on behalf of which the Application is submitted regarding the compliance of the participant of the call with paragraph 5 of the criteria for assessing the admissibility of state aid to economic entities for conducting research, technical development and innovative activities, approved by the Decree of the Cabinet of Ministers of Ukraine No. 118 of February 7, 2018 (in Ukrainian).
5. CV of the project authors (scanned copies, in Ukrainian and English).
6. Questionnaires of all project authors (scanned copies, in Ukrainian and English).
7. Written consent of researchers to participate in the Advisory Board of the project in accordance with clause 4.2 of these Terms and Conditions. Such consent shall be submitted in Ukrainian and/or English.
8. Technical and economic justification of the need to purchase equipment and facilities (in Ukrainian) signed by the head of the institution (organization) on behalf of which the Application is submitted, the head of the financial division of the institution (organization) on behalf of which the Application is submitted and the PI (if the project involves the purchase of equipment and facilities) (a scanned copy).
9. A declaration (if the project involves the purchase of equipment and facilities at the expense of grant funds from the Foundation) in which the head of the Call-winning institution and the PI confirm that the project will be fully implemented exclusively in the institution that was awarded the grant, in accordance with the submitted Application, and that the institution has a material and technical base, organizational resources and a team of implementers, which allows to ensure the full implementation of the project; the equipment, which will be purchased at the expense of grant funds, will be used for its intended purpose (for the purpose of performing tasks under the project and implementing the project in full) ([sample](#)).

In the case of partial financing of the project, the participant of the Call provides a guarantee letter (in Ukrainian) about the commitment to provide financing and its volume from a legal entity that is interested in implementing the results of the project, signed by the head or other authorized person of such an institution (organization), the head of the financial division of such an institution (organization).

VI. TERMS AND CONDITIONS OF THE CALL SELECTION, TIME AND VENUE OF THE CALL

The terms and conditions of the Call are specified in all paragraphs of this document compliance with which is mandatory.

The call will be held from December 31, 2023 to July 1, 2024 (approximately).

Venue: Kyiv, Ukraine, Borys Hrinchenko str., 1.

VII. PROCEDURE FOR ACCEPTANCE (RECEPTION), REGISTRATION AND PRELIMINARY CONSIDERATION OF APPLICATIONS

In order to submit an Application, the PI and project implementers are to go through the pre-registration procedure on the official website of the Foundation. Identification of the person submitting the Application is carried out during registration by using a qualified electronic signature.

The Application received through the software NRFU Call for Projects and signed with a qualified electronic signature is considered submitted.

An applicant has the right to withdraw the Application before the end of the deadline for application submission, about which the PI notifies the Foundation by e-mail to support@nrfu.org.ua.

It is recommended to submit the completed Application no later than 48 hours before the submission deadline. This will help you avoid technical errors when submitting your Application for the Call.

The Directorate of the Foundation within the framework of providing organizational support for the conduct and organization of the NRFU calls checks applications for compliance with formal requirements within 10 working days after the application submission deadline.

Grounds for rejecting an Application on formal grounds:

- non-compliance of the Application submitted by a participant with the form established by the Foundation;
- absence of documents required by the terms and conditions of the Call in the application package;
- lack or incomplete information required by the terms and conditions of the Call in the documents submitted by the applicant;
- non-compliance of the information provided in the application with the requirements set in the terms and conditions of the Call;

- the PI and/or implementer (author) of the project is involved in more than one application submitted to the Call;
- the PI and/or implementer (author) of the project is the implementer of more than one project which is financed through the grant support of the NRFU in the respective year;
- the PI and/or implementer (author) of the project are subject to the Restrictive Measures in force at the time of submission of the Application.

The Directorate of the NRFU notifies the relevant applicant of the decision to reject Applications on formal grounds in electronic form within three working days after the expiration of the deadline for verification of Applications for compliance with formal grounds.

Within 10 working days after the completion of the verification of applications by the NRFU Directorate for compliance with formal grounds, the Call Commission shall conduct a preliminary analysis of their compliance with the purpose, subject matter and terms and conditions of the Call, in particular the criteria determined by the Scientific Council of the NRFU, in case of detection of inaccurate information in the documents submitted by the applicant.

Grounds for withdrawing Applications from consideration based on the results of their preliminary analysis by the Call Commission:

- non-compliance of the submitted project with the purpose, thematic areas of terms and conditions of the Call (justification of such compliance must be provided in the text of the Application);
 - the applicant submitted inaccurate information;
 - non-compliance of the submitted project with the requirements of the Regulations on compliance with the principles of scientific ethics and prevention of conflict of interests during competitive selection, scientific and technical review of projects and consideration of applications for grant support submitted to the National Research Foundation of Ukraine;
 - the qualification level of the PI and other authors of the project does not meet the criteria defined by the terms and conditions of this Call (Chapter III);
 - the qualification level and composition of researchers/specialists who agreed to participate in the Advisory Board, as well as the content of letters of consent to participate in it, do not meet the terms and conditions of the Call.

Non-compliance of the documents submitted by an applicant with the terms and conditions of the Call, in particular with the criteria for selecting projects determined by the Scientific Council of the NRFU or detecting inaccurate information in the documents submitted by a participant shall be the grounds for withdrawal of the application from consideration based on the results of its preliminary analysis.

Detecting inaccurate information in the documents submitted by a participant shall be grounds for withdrawal of the application from consideration throughout the entire period of the competitive selection.

Based on the results of the preliminary review of the Applications for compliance with the terms and conditions of the Call, in particular the criteria determined by the Scientific Council of the NRFU, in case of detection of inaccurate information in the documents submitted by the

participant, the Call Commission approves the list of applications that are withdrawn from consideration. The decision of the Call Commission to withdraw an application from consideration on the grounds of noncompliance with the terms and conditions of the Call, in particular the criteria for selecting projects determined by the Scientific Council of the NRFU, or the detection of inaccurate information in the documents submitted by the applicant, shall be communicated by the Directorate of the NRFU to the respective applicant in electronic form no later than three working days after such a decision is made.

VIII. REPORTING

After completion of each intermediate stage of project implementation (except for the final stage) specified in the Agreement, the grantee submits the following documents to the NRFU:

- 1) a report on the intermediate results of project implementation (an annotated report on the work performed within the framework of the implementation of the stage). The structure and form of the report on the intermediate results of project implementation are determined by the Order of the Ministry of Education and Science of Ukraine No. 1495 of 08.12.2023;
- 2) financial report on the annual use of budget funds for the year;
- 3) a report on the research and organizational work within the project stage which includes a description of the organizational work carried out, work on attracting additional funding, measures to consolidate the research community and results, measures to disseminate project results, etc. (in an arbitrary form, up to 10 pages, in Ukrainian);
- 4) a written opinion of the Advisory Board of the project (in an arbitrary form, up to 5 pages, in English) which, in particular, should reflect the following:
 - a general description of the research results obtained and publications, as well as their potential impact on the respective field of knowledge;
 - a conclusion regarding the compliance of the organization of the project team's work with the best international standards;
 - if available, separate opinions of the members of the Advisory Board which do not coincide with the decision of its majority;
- 5) other documents provided for in the Agreement concluded between the Foundation and the Grantee.

The report on the intermediate results of the project implementation and the financial report on the use of budget funds are a prerequisite for the decision making on the continuation or termination of grant support for the project.

The Foundation controls the fulfillment by the grantee of the obligations specified in the Agreement, analyzes reports on the results of project implementation and the use of budget funds aimed at their implementation, and ensures the publication of the results of project implementation by placing on the official website of the Foundation an annotated report on the work performed with links to published research papers.

The authors of the project report on its implementation at the meeting of the Scientific Council of the Foundation. The procedure for such reporting involves a brief report by the PI and answers to the questions of the members of the Scientific Council.

The decision to continue or terminate grant support is made by the NRFU Scientific Council on the proposal of the respective Scientific Council of the NRFU section. The basis for the termination of grant support should be a reasoned decision regarding the non-targeted or inefficient use of funds by the grantee and/or improper implementation of the Agreement, the calendar plan for project implementation, the inability of the grantee to implement the project.

In the case of termination of grant support by the decision of the Scientific Council of the Foundation, the report on the intermediate results of the project implementation and the financial report on the use of budget funds within the stage are posted on the official website of the Foundation within five working days after the approval of the reporting documentation.

In the case of establishing the fact of misuse of budget funds within the framework of project implementation, the amount of funds that were not used for their intended purpose shall be returned to the NRFU in accordance with the procedure established by law.

After the completion of the project implementation (the final intermediate stage in accordance with the Agreement), the grantee submits the following documents to the NRFU:

- 1) the final report on the results of the project implementation according to the structure and rules determined by DSTU 3008-95 'Documentation. Reports in the field of science and technology. Structure and registration rules'. In the structure of the final report the abstract is submitted in Ukrainian and English;
- 2) the report on the use of budget funds within the framework of the project implementation;
- 3) the report on the research and organizational work within the project which should contain information on the work carried out to ensure the sustainable development of the research team, in particular after the end of the project. This can be information on the applications submitted for other calls and the results of their review, information on the launching of startups and spinoffs, attracting investments, measures to create state key laboratories, etc. This report should also contain detailed information on the measures taken to consolidate the research community and disseminate the results of the project (in an arbitrary form, up to 15 pages, in Ukrainian);
- 4) the annotated report on the work performed within the framework of project implementation according to the template;
- 5) copies of publications, preprints (with a mandatory indication of the fact that the project was implemented with the support of the Foundation), patents, etc. which were published/obtained as a result of the project implementation;
- 6) a written opinion of the Advisory Board of the project (in an arbitrary form, up to 10 pages, in English) which, in particular, should reflect the following:

- a general description of the research results obtained and publications, as well as their potential impact on the respective field of knowledge;
 - a conclusion regarding the compliance of the organization of the team's work with the best international standards;
 - if available, separate opinions of the members of the Advisory Board which do not coincide with the decision of its majority;
- 7) other documents provided for in the Agreement concluded between the Foundation and the Grantee.

The PIs and implementers of the project report on its implementation at the meeting of the Scientific Council of the Foundation. The report consists of the report of the PI on its implementation, as well as providing answers to the questions of the members of the Scientific Council.

Information on the results of the project implementation, together with the final report on its implementation, the report on the use of budget funds within the framework of the project implementation and the annotated report on the work performed within the framework of the project implementation within five working days are posted on the official website of the Foundation for free access in the form of open data according to the Law of Ukraine 'On access to public information'.

IX. DEADLINES FOR THE SUBMISSION AND CONSIDERATION OF APPLICATIONS, SCIENTIFIC AND TECHNICAL REVIEWING OF PROJECTS AND SUMMARIZING OF THE CALL RESULTS

Date and time of the beginning of applications submission: 31.12.2023, 00:01 Kyiv time.

Date and time of completion of application submission: 14.02.2024, 23:59 Kyiv time.

Scientific and scientific and technical reviewing and summarizing the results of the Call: until 01.07.2024 (approximately).

Information on the results of the Call is posted on the official website of the Foundation and includes:

- 1) the decision of the Scientific Council of the Foundation to approve the results of the Call;
- 2) the list of projects recommended for implementation at the expense of grant support from the Foundation;
- 3) the sums for financing the projects recommended for implementation at the expense of grant support from the Foundation;
- 4) the rating list of projects with an indication of the scores received by each project.

A text justification of the scores for the project based on the results of scientific and technical reviewing is e-mailed to applicants.

After the Foundation has made the grant award decision, the Agreement is concluded between the Foundation and the institution that is a winner of the Call. The Agreement defines all the necessary terms and conditions for the implementation of the project, including the responsibility of the Grantee and the application of fines for non-fulfillment or late fulfillment of its obligations.

The term of conclusion of the Agreement should not exceed 30 calendar days from the moment of adoption of the grant award decision. If due to the fault of the winning institution the Agreement between it and the Foundation is not concluded within the specified period, it is considered that the winning institution has refused further implementation of the project.

X. NUMBER OF REVIEWERS EVALUATING A PROJECT

The scientific and technical reviewing of the project submitted to the Call is carried out by three reviewers.

XI. CRITERIA FOR PROJECT SELECTION AND NUMERICAL ASSESSMENT, INDICATING THE PRIORITY ORDER AND COEFFICIENTS OF INDIVIDUAL CRITERIA

The selection of projects is carried out in accordance with the procedure defined in the Procedure for review and evaluation of research and development projects submitted to the National Research Foundation of Ukraine for participation in competitive selections, approved by the decision of the Scientific Council of the Foundation (minutes of the meeting No. 21 of 25.08.2023, as amended by the decision of the Scientific Council of the NRFU of 26.10.2023, Minutes No. 28).

1. The projects are assessed by independent reviewers in accordance with the form and criteria approved by the Scientific Council of the NRFU.
2. Each project is assessed on the following aspects with appropriate weighting factors:
 - quality of the planned research;
 - significance of the project for the further development of research/technology/society (according to the field of the project);
 - quality and realism of the proposed project implementation plan;
 - research achievements of the project implementers.
3. Each aspect includes several assessment criteria with their own weighting factors.
4. The assessment of each criterion is carried out by a reviewer with a 5-point scale with obligatory appropriate justification.
5. The number of points for an aspect is calculated as the arithmetic mean of the weighted points for the assessment criteria for this aspect.
6. The total number of points of the project is calculated as the weighted arithmetic mean of the points by aspects, multiplied by 20.

During project assessment, a 5-point scale with the following points value is used for each criterion:

0	The project does not meet the criterion or cannot be assessed due to the absence or incompleteness of the information provided for by this criterion.
1 - Unsatisfactory	Information on the assessed criterion is inadequately presented or has critical shortcomings.
2 - Satisfactory	In general, the project meets the criterion, but at the same time there are significant shortcomings.
3 - Good	The project meets the criterion, but there are some shortcomings.
4 - Very good	The project meets the criterion very well, but improvement is possible.
5 - Excellent	The indicator fully meets the criterion.

The following criteria, weights and form are used to assess the project for the implementation of research and development:

Assessment criteria	Rating scale	Weighting factor
<p>1. Quality of the planned research</p> <p>This section provides for the assessment of the justification of the research project, its focus on solving an actual (urgent) scientific problem, the clarity of the goal and objectives, their compliance with the current level of scientific achievements, the novelty of the scientific idea, the originality of the scientific hypothesis, the correct choice of methodology and research methods for testing the scientific hypothesis.</p>	<p>From 0 to 5</p> <p>Number of points per aspect is calculated as an arithmetic mean of the weighted points according to the criteria</p>	0.2
<p>1.1. Motivation and validity of the research concept:</p>	0-5	0.3

whether the current state of research and the problems to be solved are adequately described and referenced.		
1.2. Novelty of research ideas (including from the standpoint of interdisciplinarity if the research is multidisciplinary).	0-5	0.3
1.3. Clarity and relevance of the formulated purpose and objectives of the study.	0-5	0.2
1.4. Adequacy of the proposed research approaches and methods, their relevance of the project goal and objectives.	0-5	0.2
	Weighted arithmetic mean	

<p>2. Significance of the project for the further development of science / technology / technology / society (according to the field of the project)</p> <p>Within this section, an assessment of the clarity of the definition and reasoning of the prospects of further application of the research results for the development of science and new technologies, as well as the possibilities of implementing the research results in the economic and social spheres is provided. The completeness and potential effectiveness of the publication of research results, the possibility of commercialization of the project's achievements are taken into account.</p>	<p>From 0 to 5</p> <p>The number of points for aspect is calculated as a weighted arithmetic mean of the points according to the criteria</p>	<p>0.3</p>
<p>2.1. The potential importance of the expected results and the acquisition of new knowledge, the development of new approaches and technologies and/or their importance for solving actual practical scientific / technical / social problems.</p>	<p>0-5</p>	<p>0.5</p>

<p>2.2. Effectiveness and appropriateness of planned ways of publicizing/using research results (expected professional publications, patents, presentations at international scientific conferences, dissemination of research results among the public).</p>	<p>0-5</p>	<p>0.5</p>
	<p>Weighted arithmetic mean</p>	
<p>3. Quality and realism of the proposed project implementation plan</p> <p>This section assesses the validity of the work plan and the clarity of the intermediate goals, their logical sequence; clarity of the description of the planned tasks with specific verifiable results; consistency of the complexity of the tasks with their timeframe; correspondence of the need to use world-class research infrastructure, as well as the need to purchase equipment and materials specified as necessary for the project, the implementation of its purpose and objectives; clarity of the description of equipment and materials and adequacy of their price in the budget.</p>	<p>From 0 to 5 The number of points on the aspect is calculated as the weighted arithmetic mean of the points according to the criteria</p>	<p>0.2</p>

<p>3.1. The validity of the work plan, the correspondence of the timeframe to the complexity of the formulated stages and tasks, the clarity of intermediate goals, and their logical sequence.</p>	<p>0-5</p>	<p>0.25</p>
<p>3.2. Compliance of the material and technical base and equipment (existing and planned) with the tasks set.</p>	<p>0-5</p>	<p>0.25</p>
<p>3.3. Balance and reasonableness of the total project budget.</p>	<p>0-5</p>	<p>0.25</p>
<p>3.4. Availability and validity of the assessment of possible risks and provision of ways to prevent and resolve them.</p>	<p>0-5</p>	<p>0.25</p>
	<p>Weighted arithmetic mean</p>	
<p>4. Scientific achievements of the project authors</p>	<p>From 0 to 5 The number of points on the aspect is calculated as the weighted arithmetic mean of the points according to the criteria</p>	<p>0.3</p>

4.1. Quality of the publications of PI over the past 5 years.	0-5	0.3
4.2. Quality of publications by project implementers (authors) over the past 5 years.	0-5	0.3
4.3. Balance of the team of implementers (authors): compliance of the number of implementers (authors) and their level of qualification with the goals and objectives of the project.	0-5	0.2
4.4. Participation of the PI and implementers (authors) in research programs funded by domestic and international organizations and institutions (in particular, grants) over the past 5 years.	0-5	0.2
	Weighted arithmetic mean	
	Overall score of the project: weighted arithmetic mean by aspects multiplied by 20	

Algorithm for generating the final numerical assessment of applications

The curators analyze the set of reviewer opinions on the project and report the results at the Panel meeting. For each project, the R-value of the discrepancy between the S1, S2, and S3 scores given by the three reviewers is calculated:

$$R = \frac{SD}{S} \cdot 100\%,$$

where S is the arithmetic mean of the grades given, i.e.

$$S = \frac{S_1 + S_2 + S_3}{3},$$

SD - standard deviation:

$$SD = \sqrt{\frac{(S_1 - S)^2 + (S_2 - S)^2 + (S_3 - S)^2}{3}}.$$

1. If the discrepancy R-value does not exceed the critical value of 20%, the final numerical score of the application is determined as the arithmetic mean S of the reviewer assessments.

2. If the discrepancy exceeds the critical value of 20%, then:

a) each member of the panel ($j=1, \dots, N$, where N is the number of panel members) determines the degree of validity k_{ij} of each of the reviewer opinions S_i , $i=1, \dots, 3$ in points from 0 (bad) to 2 (good);

b) the final numerical score of the application is calculated as a weighted average of the reviewer scores:

$$S = S_1\beta_1 + S_2\beta_2 + S_3\beta_3,$$

where

$$\beta_i = \frac{\sum_{j=1}^N k_{ij}}{3 \sum_{i=1}^3 \sum_{j=1}^N k_{ij}}, \quad i = 1, 2, 3.$$

XII. CONTACT INFORMATION

For information related to the competitive selection and project submission, please contact the following NRFU communication channels:

Subject matter Contact department	Subject matter Contact department
Questions on submitting projects in the Natural and Technical Sciences and Mathematics	Grant Support Department in the Field of Technical and Natural Sciences, Mathematics and IT natsci.infastructure@nrfu.org.ua
Questions on submitting projects in Biology, Medicine and Agricultural sciences	Grant Support Department in the Field of Biology, Healthcare and Bioresources lifesci.infastructure@nrfu.org.ua
Questions on submitting projects in Social Sciences and Humanities	Grant Support Department in the Field of Social Sciences and Humanities socsci.infastructure@nrfu.org.ua

For technical support and submission of applications through the NRFU electronic system, please contact us via e-mail address: support@nrfu.org.ua

E-mail for general inquiries – nrfu@nrfu.org.ua

Telephone number for general inquiries: +(38) 044 298 16 29

Note: these communication channels are only available during business hours

Website: <https://nrfu.org.ua/>

Mailing address: Kyiv, Ukraine 01001, Borys Hrinchenko str., 1

XIII. Appendixes

1. Application form for grant support ([link](#)).
2. Guidelines for filling out the Application ([download](#)).
3. Sample form of the Agreement ([download](#)).