



# Shota Rustaveli National Science Foundation

Examples of involving foreign experts in evaluating national project proposals in the Eap region

Maia Kajaia

Department of Scientific Programmes

www.rustaveli.org.ge

# LEPL Shota Rustaveli National Science Foundation

In accordance with the Presidential Decree #428 of June 16, 2010 Shota Rustaveli National Science Foundation (SRNSF) was established by merging two main funding entities: the Georgian National Science Foundation and the Rustaveli Foundation for Georgian Studies, Humanities and Social Sciences.



#### **Priorities of the Foundation's Activities**

- ► Supporting research
- ➤ Development of research infrastructure
  - Encouraging young scientists
  - Strengthening international cooperation in scientific research
  - ► Popularization of science

### **Supported Research Fields**



1. Georgian Studies;



2. Humanities and Social Sciences, Economical Sciences;



3. Engineering Sciences and High-tech Materials;



4. Information Technologies and Telecommunications;



5. Mathematics and Mechanics;



6. Physical and Chemical Sciences/Natural Sciences;



7. Life Sciences;



8. Medical Sciences;



9. Earth Sciences and Environment;



10. Agrarian Sciences.

## **Main National Programmes**



State Grants for Fundamental Research



State Grants for Applied Research



State Grants for Joint Research Activities with Foreign Scientists Originated from Georgia



Grants for Research Infrastructure

## Main National Programmes (Continuation)



State Grant for studying Georgian Material and Spiritual Heritage Available Abroad



Grants for Organisation of Conference



Summer School in Georgian studies



**Short-term Individual Travel Grants** 

### Support for Young Scientists and Schoolchildren



Grants for Outgoing Internship of Young Scholars



**Presidential Grants for Young Scholars** 



State Grant for Joint Supervision of PhD Programmes



Leonardo da Vinci Contest for Schoolchildren-Inventors



International Science Olympiads

#### Support for Young Scientists and Schoolchildren



PhD Fellowships



Organization of Summer Schools



Organization of Winter Schools

#### **International Cooperation Priorities**

#### Participation in Policy Dialogue on European and Regional Level

(mainly under FP7 and H2020) (IncoNet EECA and IncoNet CA/SC – in S&T Policy, BS-ERA.NET and Seas-ERA – networking of S&T funding agencies of the Black Sea Region

#### Facilitation of research-industry partnership

Involvement of young scientists in International S&T cooperation

#### **Support of National Thematic Priorities**

(Life sciences & biotechnology; new materials, ICT, etc)

#### Participation in cutting-edge research on International Level

(European wide programmes ATLAS and CMS being implemented by the European Organisation for Nuclear Research – CERN (Since 2007 Georgia provides an annual contribution to CERN).

# Priorities of International Cooperation (Programmes)



"Targeted R&D Initiatives Programme", partner STCU thematic priorities: A. Biotechnologies and Life Sciences; B. New Materials and Nanotechnologies; C. Information and Communication Technologies.



"International Exchange Programme", partner CNRS (France) thematic priorities: A. Mathematics, B. Physics, C. Life sciences.



Science and Technology Entrepreneurship Programme" partner CRDF (USA)

thematic priorities: A. ICT, B. Biotechnologies, C. Agrarian Sciences, D. New materials produced from local raw materials.



Programme "International Research Groups", partner CNRS thematic priority: Geosciences.



"International Exchange Programme", partner CNR (Italy) All thematic priorities.



"Joint Research and Education Programme", partner Forschungszentrum Jülich (Germany)

thematic priority: Mathematics; Information Technologies; Natural Sciences; Engineering Sciences; Life Science and Health

#### **Beneficiaries**

Scientific/academic staff

- University Academic Personnel
- Post-Doctoral Researchers
- Researchers / Engineers / Assistants at Universities and Research Institutions

Young Scientists/ researchers

- PhD Students
- MA Students
- BA Students
- Secondary School Pupils

Non-Permanent Staff

• Persons, participating in financed research projects on the Grant agreement basis

### Three types of Evaluation/selection process

#### **Peer Review**

#### Mixed (Peer Review + Panel)

## Competition Panel / Scientific Board

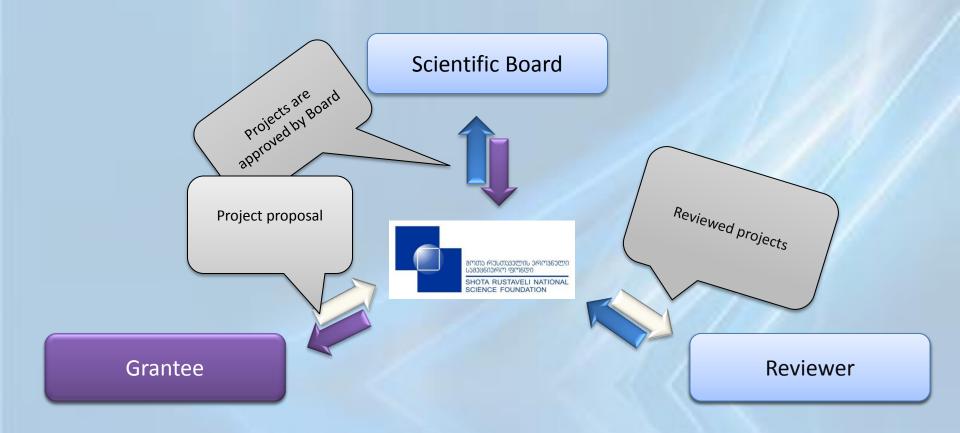
- Fundamental Research
- Presidential Grants
- PhD Students Grants
- Joint call with STCU
- Joint call with CNRS
- Joint call with Juelich

- Applied Reserach
- Joint with Foreign Scientists Originated from Georgia
- Internship of Young Scholars
- Equipment grants
- Joint call with GRDF
- Joint call withCNR

- Material and Spiritual Heritage Available Abroad
- Conference Grants
- Summer School
- Individual Travel Grants

## **Project Processing**

All programs of SRNSF are implemented through the calls for project proposals.



### **Grant-based Funding**

Essential step towards science funding reform

The foundation allocates funds only on a competitive basis. All procedures are transparent and impartial.

Nowadays scientific society has high credit to this system.

More than 4000 foreign high-level peer-reviewers are engaged in the merit-base and impartial evaluation of projects submitted to SRNSF's calls.

### **Project Evaluation Mechanisms**

Two-step mechanism for project evaluation has been exercised. I stage – experts evaluate scientific aspects of a project; II stage – scientific board evaluates project value for social and economic potential and its feasibility.

The project monitoring scheme has been simplified.

The electronic system for submission of project proposals, evaluation of project proposals and monitoring of ongoing projects has been introduced.

## **Project Evaluation**



- Registered projects being in compliance with the call requirements are submitted to international or local independent reviewers.
- The reviewers must hold PhD and Academic staff or researcher position at home institution.
- The identities of reviewers are confidential.
- The reviewers evaluate projects in compliance with the evaluation criteria
- Initially each project is submitted to two independent experts for evaluation.

## Example of request for peer review

Let me welcome you on behalf of the Shota Rustaveli National Science Foundation (SRNSF) – the main funding national agency in support of science and technological development of Georgia. The Foundation, in its endeavour to contribute to building up the country R&D potential tries to involve prominent international experts in peer reviewing of research projects.

Hereby, in my capacity of Director General of SRNSF, I dare to take your time and kindly ask you to consider possibility for **participation in evaluation of projects** proposals submitted to the call of SRNSF in the scope of you professional expertise including Demography.

If you accept our great request then please register yourself as a Peer Reviewer by using the following link:

www.rustaveli.org ge. After registration you will be able to get access to the proposal and on-line evaluation forms by means of your username and password.

Many thanks in advance for your kind cooperation.

Sincerely yours,

#### Sulkhan Sisauri

Director General Shota Rustaveli National Science Foundation 1 Aleksidze str. 0193, Tbilisi, Georgia

Tel: +995 32 233 45 95

E-mail: dep science@rustaveli.org.ge, sisauri@rustaveli.org.ge

Web: <a href="http://www.rustaveli.org.ge">http://www.rustaveli.org.ge</a>

## Reviewer Registration in database

 Potential evaluators are asked to register as a Peer Reviewer by using the link to the Foundation's webpage.





## How to evaluate projects - manual

 The evaluators receive an e-mail declaring that project(s) have been assigned to them for evaluation. The detailed instruction follows asking reviewers to log-in into his account on the foundation's webpage

As a registered peer reviewer, you should go through authorization process in order to get access to you account and proceed with project evaluation.

Thus, please press FOR PEER REVIEWERS button on the upper right corner of our website's English version. <a href="http://www.rustaveli.org.ge/index.php.write">http://www.rustaveli.org.ge/index.php.write</a> your e-mail address as your username and password (the one you used when you created your peer reviewers on-line account in our electronic system). <a href="https://cited.com/clogin/">Click on "Login/"</a>.

Clicking "Login" button will transfer you to the list of the projects sent for your evaluation. You will see a new page, were there is provided the registration number of the projects to be evaluated, title, and the project itself (You need to view only English version of the project).

In order to see and read the project you have to click on "View Project in English" or on the PDF sign along the relevant title and you may read/print the project.

In order to evaluate the project you have to click on the **Evaluation** button. You will see the online registration form on the screen. The form shows the project evaluation criteria.

You have been assigned an Applied research for evaluation.

#### Project Evaluation Criteria for Applied Research Projects

**Notes:** 1.Please take into account that for the projects of applied nature being currently (in 2011) submitted to the "Call in Applied Research ( AR)" the rate higher than 85 points is required for passing to the second step of the evaluation - consideration by the Science Board of SRNSF;

- 2. In accordance with the evaluation procedure it is mandatory that:
- (i) each sub-criteria (e.g. "1.1 Preciseness in description of: the project purpose, stages of its implementation and indicators of expected outcomes) should be given respective point (printed in the column "Points" The final points are calculated automatically on the website evaluation form.)
- (ii) each point given by you should be commented (at least 20 characters/symbols of the text) and printed in the column "Comments".

When at the end you press the button SAVE, your evaluation is automatically submitted to the Rustaveli Foundation Database.

# Project Evaluation – one step evaluation procedure – Fundamental research

- ALL THE EVALUATIONS ARE MADE ONLINE VIA SPECIAL ELECTRONIC SYSTEM
- Before starting the evaluation of the project, an expert should answer the following question: ,,Before starting your evaluation please skip through the project proposal in order to make sure whether does it fall under the category of fundamental research or not."

According to the terms and conditions of the Call research is considered as a Fundamental if it aims at gaining new or more complete knowledge in a certain scientific field. The research should be aligned on theoretical and/or experimental study/analysis of: phenomena, data/facts, theories, models, new ideas and concepts. Direct commercial benefit from this research is not required, yet in a long-term outlook it should be a basis for sociopolitical, public, cultural and/or technological progress.

If your answer is negative, please press the button/or tick "NO" and provide general comment without fixing marks (please justify why the research is of non-Fundamental character).

If your answer is positive, please press the button/ or tick "YES" – the Evaluation Form will appear and then you can proceed with your evaluation in compliance with the criteria provided in the Form.

	NO .	
0	YES	

NOTE: Project proposal will be withdrawn from the Call if two evaluators consider it as a research of non-fundamental category.

- If only one expert out of two considers that the project is not in compliance with the call requirements, then the project will be submitted to the third expert and his assessment will be decisive.
- If two experts consider that the project does not comprise Fundamental Research, it will be withdrawn from the competition.

	Criteria	Evaluation		
1	Novelty, goals and objectives of research		Comments	
1.:	Topicality of the problem and novelty of research	14	The problems are both old and new - meaning: well rooted in the past research and promising its new paths. There is theory, and there are applications, the best mix possible. There might be a possible connection (not mentioned) to SDE's.	
1.3	Preciseness in description of the research subjects and tasks	14	Tha authors plan so much that they made this reviewer a little lost. The references in the text clutter the clarity, and should be collected together at the end.	
:	2 Research methods and expected outcomes			
2.:	Compliance of research methods with the objectives of the project	13	The problems are a continuation of the problems that were investigated previously. Many have been solved and published.	
2.2	Expected outcomes of the research and their impact on research topic/s cosidered	23	As in 2.1, the area is promising, and the PI and researchers are very active in producing publishable results. Many great mathematicians actively work in this area. There is a worldwide competition and the Authors are active players.	
3	3 Expertise of the project's participants			
	Adequacy of the principal investigator's and key personnel's expertise for effective implementation of planned research	20	All Researchers are very competent, proved by the presented evidence.	
4 Management of the project				
	Optimal planning in time spending and in use of human and technical recourses	14	In my predicition, the timeframe may be not enough to do all what was planned, since most likely with every question answered new ones immediately emerge. This line of research has a future.	
	სულ	98		

#### Comment

The team was very successfull in the past. The proposal is bursting with problems. Not necessarily all, but likely at least some will be solved. Possibly quite a few unexpected problems will be formulated and solved as well.

If the difference among two peer reviewers' evaluations is less than 15 scores, the average is calculated for the final score.

If the difference among two evaluations is 15 or more, the project is submitted to the third reviewer.

Appropriately, among three evaluations the two - more close in amount - are selected and their average will be the final score of the project and the third one will not be taken into account.

- The projects scored less than 86 will not be funded.
- After announcing results of the call, The Principal Investigator is able to view a Proposal evaluation and peer-reviewers comments via his/her personal account.
- Relying on reviewers' assessments the Foundation makes a rankordered list of project proposals and submits it to the scientific board for final appraisal and validation.
- The Scientific Board of the Shota Rustaveli National Science Foundation considers distribution of funds among scientific directions according to each year's/call's total budget and approves the ranked list of project proposals without identification of the projects and their participants.

# Project Evaluation – two stepped evaluation procedure – Applied Research

- Registered projects being in compliance with the call requirements are submitted to international independent experts.
- The experts evaluate projects in compliance with the evaluation criteria.
- Normally two reviewers are designated for each proposal. If the difference among their evaluations is 25 scores or less, the average is taken for the final score. Otherwise a third referee is involved.

## **Project Evaluation - Applied Research**

ı		Criteria	Evaluation		
		Essence of the Project and its Scientific Value		Comments	
ŀ	1.1	Preciseness in description of: the project purpose, stages of its implementation and indicators of expected outcomes	13	The proposal in prepared carefully, the goal is properly described and the methods are realistic.	
ŀ	1.2	Innovative character of research, scientific justification of used methods and their compliance with the project's goals	14	The proposal is innovative and interesting also from the theoretical point of view.	
П	2 Applied potential of the project				
ŀ		Compliance of the research's product with demands of local and/or world market	21	The institutions willing to participate at the utilization of the results are explicitly listed in the proposal. However, the complex use of the proposed methodology requires wider research.	
:	2.2	Applicability of the research's outcomes in terms of their real and sustainable use in nearest future	22	The results are usable almost immediately.	
П	3 Competence of the project's participants				
ı		Adequacy of the principal investigator's and key personnel's expertise for effective implementation of planned activities	8	The scientific background of the team is a weak point of the proposal. The team members do not present too much outputs in classical scientific journals, on the other hand, the relative number of proceedings papers is high, including even quite doubtful and suspicious (WSEAS) proceedings.	
ı	4 Management of the project				
		Optimal planning in time spending and in use of human and technical recourses	12	The time and financial management seems to be reasonable.	
П		სულ	90		
	Comment				

# Project Evaluation - Applied Research 2<sup>nd</sup> step

- The Scientific Board decides the threshold score (not less than 85) for projects to proceed to the second stage of evaluation.
- The project managers are invited to make the short (10-15min) presentation before the SRNSF'S Scientific Board.
- The Scientific Board selects best projects for funding.

As an expression of gratitude to reviewers involved in evaluation SRNSF award them with the special certificate. Regrettably, nowadays SRNSF lacks the funds to remunerate contribution of evaluators.





Department of Scientific Programmes
Shota Rustaveli National Science Foundation

dep science@rustaveli.org.ge