

## ACTION PLAN “FOSTERING KNOWLEDGE BY FUNDING RESEARCH PROJECTS WITH THE POTENTIAL TO YIELD MAJOR INNOVATIVE APPLICATIONS”

### SCIENCE AND TECHNOLOGY RESEARCH ON ADVANCED MATERIALS

#### BACKGROUND

The profound reflection that has recently animated the scientific community on research topics now faces two kinds of problems: the endemic lack of funds allocated to research and the increasingly widespread need for a better definition of the roles and concrete commitments to be undertaken by the players in this field in their capacities as financiers or scientific production centres.

To underline the recent scientific and technological progress made, people talk increasingly often of knowledge companies; nevertheless, if this knowledge is not produced today, in the future it will have to be acquired from the outside and the socioeconomic systems that have not laid the bases for their growth will find themselves having to chase not those who have “spent” but those who have “invested” in research. The difference between the two approaches is substantial: some economic systems will be able to act on the basis of development plans and can count on a significant number of strategic options, while others will be forced to react by chasing after their competitors. The differences created by this competition will determine tomorrow’s social and work conditions, the economic structures and the attractiveness of each individual country.

In other words, research and technological development are not to be considered as problems to be solved, but as opportunities to be taken: in fact, research work, whether conducted at universities, public and private research centres or at companies, constitutes the strength and drive of tomorrow’s companies.

#### GOALS

With a view to reaching or maintaining levels of excellence in terms of competitiveness of the Lombardy system, the Foundation will concentrate its efforts on a limited number of multi-annual applied research projects in the field of material science. This domain is strategic and crucial to develop Lombardy’s economical system considering the possibility of applications cross-industrial sectors and the opportunity to develop multidisciplinary research approaches. More specifically the proposals will be selected in the following areas of technology:

- Biological and biomimetic materials
- Polymers and polymer science
- Electronic, optical and magnetic materials and devices
- Materials for medicine and health-care
- Materials and devices for environmental and energy applications

- Structural and functional materials
- Nanotechnology, nanodevices and nanomaterials
- Solid state physics and computational materials science.

The projects must be characterized by an exclusively pre-competitive approach that permits the creation of the premises on a system level for directing the research conducted at scientific production centres towards qualifying technologies, key factors for competitiveness in the medium term, which will play a decisive role in the economic and general development of our country. For this reason, Fondazione Cariplo will fund innovative and dynamic research projects made in universities or eligible research centres.

#### GUIDELINES

##### Eligible organizations

In agreement with the *Guidelines for projects’ presentation*, this call for proposals is addressed to organizations engaged in scientific research in the subject area set out in the call for proposals. These organizations will have human resources, equipments and infrastructures directly at their disposal.

To be eligible for funding the lead organization shall have project operational facilities within Fondazione Cariplo’s reference area (provinces of Lombardy and the Piedmont provinces of Novara and Verbano-Cusio-Ossola.). This requirement does not apply to partners.

Fondazione Cariplo shall not accept applications by PIs (lead PIs or partners’ PIs) of a project funded within the same call if still ongoing. A project is considered ongoing until the final grant report has been sent following the Foundation procedures. To be allowed to apply to this call, the final grant report shall be sent by the deadline.

##### Eligible projects

Fondazione Cariplo, with the advisory of an International Scientific Committee which ensures transparency and the application of objective scientific criteria in the assessment process, will select a limited number of projects that respect the scientific priorities set out in the call for proposals. At the end of the selection process the judgment of the International Scientific Committee shall be notified to the applicants.

The request for grant shall be of no less than € 100,000 and no more than € 300.000. Anyway the requested grant shall be no more than 80% of the total cost.

As to the project budget, the total cost shall relate to the proposed project and meet eligibility requirements, within the limits set out below:

- “Equipment and software”  
This item of expense shall not exceed 20% of the total cost. It shall relate exclusively to newly acquired equipment or software programs to be used for more than one year, according to their effective use.
- “Other amortizable costs”  
Expenses in this category shall relate exclusively to patenting costs, where applicable.
- “Permanent staff (salary)”  
This item of expenses shall relate exclusively to research staff. It shall not include administrative staff. This item shall be covered by the applicants as co-funding.
- “Temporary staff”  
This item of expenses shall relate exclusively to research staff. It shall not include administrative staff.
- “Sub-contractors and Consultants”  
This item of expenses shall include audit costs, where applicable.
- “Materials and supplies”  
This item of expenses shall not include stationary nor photocopy costs.
- “Other operating expenses”  
This item of expense shall not exceed 10% of the total cost. It shall relate to travel expenses, participation to congresses by the project staff, meeting between the project partners and publication costs, where applicable.

Please note that under this call for proposals the following items of expense shall be judged ineligible for funding:

- “Acquisition of property”
- “Property renovation, maintenance, restoration”
- “Overheads”.

#### Assessment criteria

In addition to the overall scientific quality of the research project, the proposals will be judged on the following criteria:

- the state of the art knowledge;
- the presence of preliminary data;
- the clarity with which the objectives are formulated, the effectiveness and detail of the strategies adopted;
- the originality and innovativeness of the research project proposed;
- the adoption of multidisciplinary approaches;

- the forecast results on scientific and technical domain;
- the impact on economical system;
- the authoritativeness of the scientific leadership and competence of the research team;
- the involvement of young investigators in the team and/or as project leaders;
- the presence of training actions for the young investigators involved in the project team;
- the structuring of the project partnerships and the collaboration between research centres on national or international level;
- the adequacy of the project’s duration and budget;
- the extent and nature of the applicants’ co-funding;
- the added value of the present application, in the case of the continuation of previously funded project.

#### Ineligible projects

Projects with the following characteristics will be considered ineligible for assessment:

- Financing requests for the set up of new research centres or for the fit out of laboratories
- Basic research projects without impact on the economic-industrial environment
- Technological transfer projects
- Projects involving profit organizations.

Applicants are invited to read carefully the following papers at the website [www.fondazionecariplo.it](http://www.fondazionecariplo.it):

- *Guidelines for projects’ presentation*;
- *Grant management and reporting Guide*;
- *Policy on Intellectual Property Rights*;
- *Policy on Open Access*.

Applicants agree that the grant will be subjected to the irrevocable acceptance of the two *Policies*.

Moreover, applicants are invited to:

- fill out entirely the on line forms, as follows:
  - Organization form (main applicant);
  - Project form (Italian language);
  - Complementary data (English language);
  - Budget form.
- upload the required documents, as stated in the *Guidelines for projects’ presentation*:
  - Project<sup>1</sup>;
  - Budget<sup>1</sup>;

<sup>1</sup> A dedicated template has been provided. It is downloadable at the Complementary data Section.

- Official submission letter;
- Partnership agreement and partner's official submission letter, where applicable;
- Organization related documents.

#### BUDGET

The Budget at disposal is 4,5 million euros.